# Known Errors in the 2009 MUTCD As of 3/26/2014

The FHWA intends to correct these errors via a future rulemaking action. This list of known errors is provided solely for the information of MUTCD users and does not constitute official changes to the MUTCD at this time.

# **Introduction**

## Page ii

• The following should be added as a second paragraph at the bottom of the page under the "Acknowledgment" heading:

Cover photographs © istockphoto.com/"Open Road" by: narvikk; "Road Closed Sign" by: Fred Hall; "Railroad Crossing" by: Michael Krinke. "Green Light" courtesy of Scott Wainwright. "Express Lane Entrance" courtesy of Kevin Sylvester.

## Table I-2 (Sheet 2 of 3)

• In the first column, "2H.02, 2H.03" should be replaced by "2H.05, 2H.06" in Row 11, "2I.07" should be replaced by "2I.09" in Row 12, and "2I.08" should be replaced by "2I.10" in Row 13.

## Table I-2 (Sheet 3 of 3)

- In the first column, "8B.03" should be replaced by "8B.03, 8B.04" in Row 8.
- In the second column of Row 6 (the row for Section 7B.16), the word "school" is misspelled.

# <u>Part 1</u>

### Section 1A.09

• In Paragraph 5, the word "Technology" should be changed to "Technical" in two places.

### Section 1A.10

• In Paragraph 14, the word "the" should be changed to "The" at the beginning of the last sentence.

### Section 1A.14

• "LRT—light rail transit" should be added as a new Item 27, and the numbers for the existing Items 27 through 43 should each be increased by one.

# Table 1A-1

- In the row for "Lane", the entry in the second column should be changed to "LA\*, LN\* (See Table 1A-2)".
- In the row for "US Numbered Route", the "US" in the second column should be changed to "(See Table 1A-2)".

# Table 1A-2

• In the row for "State, county, or other non-US or non-Interstate numbered route", the double asterisk in the second column should be replaced with a single asterisk, and a double asterisk should be added after "[Number]" in the fourth column.

• A new row should be added between the rows for "Upper" and "Vehicle(s)" that has "US Numbered Route" in the first column, "US\*" in the second column, a dash in the third column, and "[Number]\*\*" in the fourth column.

# <u>Part 2</u>

## Section 2A.18

• In Paragraph 12, the reference to "Section 2D.31" should be changed to "Section 2D.12."

## Section 2A.22

• In Paragraph 1, the reference to "Section 2A.09" should be changed to "Section 2A.08."

## Section 2B.11

• The last sentence of Paragraph 1 should be moved to become a new second paragraph, which should be labeled as an "Option" paragraph. The paragraph numbers for existing Paragraphs 2 through 8 should each be increased by one number.

## Section 2B.12

• In Paragraph 14, the word "seasonably" should be changed to "seasonally."

## Section 2B.26

• In Paragraphs 6, 7, and 8, the reference to the "R3-9d sign" should be changed to the "R3-9e sign."

## Section 2B.40

• In Paragraph 14, the word "to" should be added between the words "used" and "notify" in both sentences.

# Section 2B.41

• In Paragraph 7, the reference to "Section 2B.41" should be changed to "Section 2B.42."

# Section 2B.47

- In Paragraph 3, the reference to the "R7-201aP" plaque should be changed to "R7-201P."
- The third sentence of Paragraph 14 should be a continuation of the third line of this paragraph rather than being placed at the beginning of a new fourth line.
- In Paragraph 15, the two references to the "R7-201P" word message plaque should be changed to "R7-201aP," and the two references to the "R7-201aP" symbol plaque should be changed to "R7-201P."

### Figure 2B-18

• Delete the asterisks for the two ONE WAY signs that are shown on the southeast corner (assuming north to be in the up direction on the figure), as Paragraph 1 in Section 2B.41 requires at least one ONE WAY sign for each direction of travel on the crossroad.

### Figure 2B-26

• On Sheet 1, the WALK signal representations for the R10-3c and R10-3g signs should be shown with a white legend on a black background. These signs are shown correctly in the 2012 Supplement to the 2004 Standard Highway Signs book, which is available at <a href="http://mutcd.fhwa.dot.gov/SHSe/shs\_2004\_2012\_sup.pdf">http://mutcd.fhwa.dot.gov/SHSe/shs\_2004\_2012\_sup.pdf</a>.

## Figure 2B-27

• The sign image for the R10-15 sign should include a black horizontal separator line between the upper yellow portion of the sign and the lower white portion of the sign. This sign is shown correctly in the 2012 Supplement to the 2004 Standard Highway Signs book, which is available at <a href="http://mutcd.fhwa.dot.gov/SHSe/shs">http://mutcd.fhwa.dot.gov/SHSe/shs</a> 2004 2012 sup.pdf.

# Figure 2B-27 and Table 2B-1 (Sheet 3 of 4)

• The STOP HERE ON FLASHING RED (R10-14b) sign should be added to the figure and table. The size of the R10-14b sign in Table 2B-1 should be "24 x 36" in the Single Lane and Multi-Lane Conventional Road columns and should be "36 x 48" in the Oversized column. The design for the R10-14b sign is included in the 2012 Supplement to the 2004 Standard Highway Signs book, which is available at <a href="http://mutcd.fhwa.dot.gov/SHSe/shs\_2004\_2012\_sup.pdf">http://mutcd.fhwa.dot.gov/SHSe/shs\_2004\_2012\_sup.pdf</a>.

### Table 2B-1 (all four sheets)

• The asterisks associated with the message to see Table 9B-1 for minimum sign sizes for bicycle facilities should be shown next to the size in the Minimum column for only the following signs: R1-1, R1-2, R4-1, R4-2, R4-3, R4-7, R4-16, and R5-6.

## Table 2B-1 (Sheet 3 of 4)

- In the Sign or Plaque column, the name of the R9-3 sign should be changed from "No Pedestrian Crossing (symbol)" to "No Pedestrians" to be consistent with the names of the R9-13 and R9-14 signs.
- The size of the Right on Red Arrow After Stop (R10-17a) sign should be "30 x 36" instead of "36 x 48" in both of the Conventional Road columns.

# Section 2C.02

• In Paragraph 6, the reference to "Parts 5 through 10" should be changed to "Parts 5 through 9."

### Section 2C.19

• In Paragraph 3, the reference to "Sections 2B.63 through 2B.65" should be changed to "Sections 2C.63 through 2C.65."

# Section 2C.65

• In Paragraph 3, the word "appurtances" should be changed to "appurtenances."

# Table 2C-2 (Sheet 1 of 3)

- In the Sign or Plaque column, the name of the W3-1,2,3 signs should be changed from "Advanced Traffic Control" to "Stop, Yield, or Signal Ahead" to be more descriptive and to be consistent with Table 9B-1.
- In the Sign or Plaque column, the name of the W4-1 sign should be changed from "Merge" to "Merging Traffic" to be more descriptive and to be consistent with Table 6F-1.

### Table 2C-2 (Sheet 2 of 3)

• In the Freeway column, the size of the W13-2, 3 signs should be "48 x 60" instead of "36 x 48."

# Table 2C-4

• In Footnotes 2 and 3, "2005 AASHTO" should be changed to "2004 AASHTO."

### Table 2C-5

• In the first column of the first row beneath the header, "(W10-1)" should be changed to "(W1-10 series)."

#### Section 2D.08

• In Paragraph 12, the reference to "Paragraph 15" should be changed to "Paragraph 16."

#### Table 2D-1

- In the Section column, the Section numbers in the last 34 rows (beginning with the Advance Turn Arrow (M5-1,2,3) sign) of the table should be changed to the following: 2D.26, 2D.27, 2D.28, 2D.37, 2D.37, 2D.38, 2D.37, 2D.37, 2D.38, 2D.41, 2D.41, 2D.41, 2D.43, 2D.44, 2D.44, 2D.44, 2D.47, 2D.48, 2D.55, 2D.49, 2D.49, 2D.49, 2D.54, 2D.46, 2D.46, 2D.33, 2D.51, 2D.51, 2D.52
- In the Conventional Road column, the asterisks should be deleted from the sizes for the 2line and 3-line D3-2 signs, and the size of the 4-line D3-2 sign should be "Varies x 54" instead of "Varies x 60\*."

### Section 2E.24

• In Paragraph 11, the reference to "Section 2C.42" should be changed to "Section 2C.43."

#### Table 2E-1 (Sheet 2 of 2)

In the Minimum Size column, the size of the D1-1 sign should be "Varies x 24" instead of "Varies x 30," the size of the D1-1a sign should be "Varies x 24" instead of "Varies x 30," the size of the D1-2 sign should be "Varies x 42" instead of "Varies x 54," the size of the D1-2a sign should be "Varies x 42" instead of "Varies x 54," the size of the D1-3 sign should be "Varies x 60" instead of "Varies x 72," the size of the D1-3a sign should be "Varies x 60" instead of "Varies x 72," the size of the D1-3a sign should be "Varies x 30," the size of the D2-1 sign should be "Varies x 24" instead of "Varies x 72," the size of the D1-3a sign should be "Varies x 60" instead of "Varies x 72," the size of the D2-1 sign should be "Varies x 24" instead of "Varies x 30," the size of the D2-2 sign should be "Varies x 36" instead of "Varies x 54," the size of the D2-3 sign should be "Varies x 48" instead of "Varies x 72," the size of the 2-line D3-2 sign should be "Varies x 48" instead of "Varies x 42", "the size of the 3-line D3-2 sign should be "Varies x 48" instead of "Varies x 42", "the size of the 4-line D3-2 sign should be "Varies x 66" instead of "Varies x 84"."

### Table 2E-5

- In Item L, Overhead Arrow-Per-Lane Signs, in the 12<sup>th</sup> row beneath the heading, the word "plaques" should be changed to "Panels."
- In Item L, Overhead Arrow-Per-Lane Signs, the following changes should be made to the values in the Minimum Size column: the Arrowhead (Type D Directional Arrow) should be 21 instead of 21.625, the Arrow Shaft Width should be 7.75 instead of 8, the Arrow Height for the Through Arrow should be 66 instead of 72, the Arrow Heights for the Left Only and Right Only Arrows should be 45 instead of 48, the Arrow Height for the Optional-Diverge (Through with Left or Right) Arrow should be 66 instead of 72, the Arrow Height for the Optional-Split (Left and Right) Arrow should be 55 instead of 66, the Horizontal Space between Arrow Shaft and EXIT and ONLY Panels should be 12 instead of 10, and EXIT and ONLY Panels should be 54 x 18 instead of 60 x 18.

#### Section 2F.10

• In Paragraph 1, the reference to "Sections 2E.30 and 2E.33" should be changed to "Sections 2E.33 and 2E.36."

### Section 2G.08

• In Paragraph 5, the phrase "that that are wider" should be changed to "that are wider".

#### Section 2G.12

• In Paragraph 4, delete "Option:" at the end of the paragraph.

### Section 2G.14

• In Paragraph 2, the reference to "Figure 2G-14" should be changed to "Figure 2G-13."

#### Figure 2G-26

• In the fifth line of Note 4, the phrase "tot he" should be changed to "to the."

#### Figure 2G-27

• The note that is numbered as Note 5 should be changed to be numbered as Note 3.

#### Section 2I.02

• In Paragraph 19 at the end of the first line and in the second occurrence in the second line, the word "sign" should be changed to "plaque." In Paragraph 19, the designations "D9-13a," "D9-13b," "D9-13c," and "D9-13d" should be changed to "D9-13aP," "D9-13bP," "D9-13cP," and "D9-13dP," respectively.

#### Section 2I.05

- In one place in Paragraph 6 and in two places in Paragraph 9, the reference to the "D5-1b sign" should be changed to the "D5-1a sign."
- In Paragraph 8, the reference to the "D5-2 sign" should be changed to the "D5-2a sign."

### Figure 2I-8

• In the note, the reference to "Section 2I.08" should be changed to "Section 2I.10."

#### Table 2I-1 (Sheet 2 of 2)

• The size of the D12-5 sign should be "48 x 60" instead of "42 x 60" in the Conventional Road column, and should be "66 x 72" instead of "66 x 78" in the Freeway or Expressway column.

#### Section 2M.04

• In Paragraph 2, the second sentence should be deleted.

#### Figure 2M-7

• The Radiator Water sign that is designated as RS-114 should be changed to be designated as RS-124.

#### Table 2M-1

• The Radiator Water (RS-124) sign should be added to the table immediately following the Post Office sign in the "Services" portion of the table.

### Part 3

### Section 3B.04

• Paragraph 24 should be deleted, as it is a duplication of Paragraph 19.

### Section 3B.07

• In Item B of Paragraph 2, the word "At" should be changed to "On."

#### Section 3B.23

• In Paragraph 12, the phrase "curbed as of" should be changed to "curbed noses of."

#### Figure 3B-8 (Sheet 2 of 2)

• The label for the "Theoretical gore" and the leader line and arrowhead pointing at the location where the solid lane line begins to curve should be deleted, and a short dimension line should be placed at the top of the "Varies" dimension.

#### Figure 3B-10 (Sheet 2 of 5)

• The label for the "Theoretical gore" and the leader line and arrowhead pointing at the location where the solid lane line begins to curve should be deleted, and a dimension line should be placed at the top of the "Varies" and the "1/2 mile MIN." dimensions.

#### Figure 3B-21

• In three places near the bottom of the figure, the references to the "UCV" should be changed to "UVC."

#### Figure 3C-1

• The "Optional" label on the left-hand side of the figure should point only to the yellow edge line next to the central island and should not point to the white edge line around the outside of the circulatory roadway. The "Optional" label and leader lines near the bottom of the figure that point to the edge lines along the approach roadway should be deleted.

### Figure 3C-13

• A note that says, "Optional diagonal yellow crosshatch markings" and a leader line should be added to the figure in a similar manner as the note and leader line in Figure 3C-12.

#### Section 3D.02

• In Sub-item 3 in Item E of Paragraph 3, the word "solid" should be changed to "broken."

#### Section 3I.03

• The "Guidance" header prior to Paragraph 2 should be changed to an "Option" header and Paragraph 2 should not be shown in italics.

### Part 4

#### Section 4D.09

• In Paragraph 5, Figures 4D-8, 4D-15, and 4D-20 should be added to the list of figures that are cross-referenced at the end of the sentence.

#### Section 4D.13

• In Paragraph 10, the word "post-mounted" should be deleted from the first line to make this paragraph consistent with Paragraph 8 in Section 4D.05.

### Figure 4D-17

• In the ninth line of the asterisk note, the phrase "sometimes displayed when the signal faces for the adjacent through lane(s) are not displaying a red indication and the red indication in the right-turn signal face is" should be added after the word "is."

#### Figure 4D-19

• In the ninth line of the double asterisk note, the phrase "sometimes displayed when the signal faces for the adjacent through lane(s) are not displaying a red indication and the red indication in the right-turn signal face is" should be added after the word "is."

### Section 4E.11

• In Paragraph 15, the reference to "Section 4D.13" should be changed to "Section 4E.13."

#### Figure 4E-3

• A 4-foot by 4-foot gray square representing a level landing area should be shown next to each ramp (see Drawing F on Figure 4E-4 for an example of how these landing areas would be positioned), and the landing area should not be shown as a recommended area for pushbutton locations.

#### Figure 4E-4 (Sheet 2 of 2)

• In Note 2, the first word should be "These."

#### Section 4F.03

• In two places in Paragraph 2 and one place in Paragraph 3, the phrase "pedestrian clearance interval" should be changed to "pedestrian change interval."

#### Figure 4F-3

• In Step 5 of the sequence, the phrase "Pedestrian Clearance Interval" should be changed to "Pedestrian Change Interval."

### Section 4G.04

• In Paragraph 18, the word "WHEN" should be changed to "ON" and the reference to "Section 2B.53" should be changed to "Figure 2B-27."

# <u>Part 5</u>

#### Table 5A-1 (Sheet 1 of 2)

• In the Sign or Plaque column, the "(English)" parenthetical word should be deleted after the name of the R2-1 sign, and the size of the "W14-1a,2a" sign in the Typical column should be "36 x 8" instead of "36 x 9."

# <u>Part 6</u>

### Section 6C.09

• Paragraph 2 should be italicized.

### Section 6F.74

• In Paragraph 2, the phrase "2.5 inches" should be changed to "2 inches" to be consistent with Paragraphs 5 and 6 in Section 6F.63.

### Figure 6F-4 (Sheet 3 of 3)

• The image for the W20-5 sign is shown incorrectly. The correct image is shown in the 2012 Supplement to the 2004 Standard Highway Signs book, which is available at <a href="http://mutcd.fhwa.dot.gov/SHSe/shs\_2004\_2012\_sup.pdf">http://mutcd.fhwa.dot.gov/SHSe/shs\_2004\_2012\_sup.pdf</a>.

### Table 6F-1 (Sheet 1 of 3)

- In the Sign or Plaque column, the name of the R3-7 sign should be changed from "Mandatory Movement (text)" to "Right (Left) Lane Must Turn Right (Left)" to be consistent with Table 2B-1.
- In the Sign or Plaque column, the name of the W1-8 sign should be changed from "Chevron" to "Chevron Alignment" to be consistent with Table 2C-2.

#### Table 6F-1 (Sheet 3 of 3)

• In the Sign or Plaque column, the name of the W24-1cP plaque should be changed from "All Lanes" to "All Lanes (plaque)". The size of the W24-1cP plaque should be "24 x 18" instead of "24 x 24" in the Conventional Road column, and "30 x 24" instead of "30 x 30" in the Freeway or Expressway column.

## <u>Part 7</u>

#### Section 7B.03

• In Paragraph 3, the reference to Section "7B.08" should be changed to Section "7B.11."

### Figure 7B-1

• The image for the S3-1 sign is shown incorrectly. The correct image is shown in the 2012 Supplement to the 2004 Standard Highway Signs book, which is available at <a href="http://mutcd.fhwa.dot.gov/SHSe/shs\_2004\_2012\_sup.pdf">http://mutcd.fhwa.dot.gov/SHSe/shs\_2004\_2012\_sup.pdf</a>.

### <u>Part 8</u>

#### Section 8B.06

• In the first line of Paragraph 1, the phrase "Highway-Rail" should be deleted.

#### Section 8B.07

• In the title of this section, the phrase "Highway-Rail" should be deleted.

#### Section 8B.09

• Paragraphs 1 and 2 (and the "Guidance" header that precedes these paragraphs) should be shown in italics.

#### Section 8B.22

• In the first line of Paragraph 1, the word "sign" should be deleted.

#### Figure 8B-2

• The dimension from the roadway to the bottom of the YIELD sign should say "See Notes 2 and 3."

#### Figure 8B-3 (Sheet 1 of 2)

• In the drawing at the bottom of the sheet, the label for the red retroreflective strip on the YIELD sign support should say "Optional 2-inch red retroreflective strip on front."

# <u>Part 9</u>

### Section 9A.07

• In Paragraph 1, the phrase "The introduction to this Manual" should be changed to "Paragraph 1 of Section 1A.13."

## Table 9B-1 (Sheet 1 of 2)

• In the Sign or Plaque column, the name of the W1-1,2,3,4,5 signs should be changed from "Turn and Curve Warning" to "Horizontal Alignment" to be consistent with Table 2C-2.

## Table 9B-1 (Sheet 2 of 2)

• In the Sign or Plaque column, the numbers of digits for the D10-1a, D10-2a, and D10-3a signs should be changed to 2, 3, and 4, respectively, to be consistent with Table 2H-1.

## Section 9C.03

• In Paragraph 4, the reference to "Figure 9C-2" should be changed to "Figure 9C-8."

## Appendix A2

# Table A2-2

• The entries in the Meters column for 130, 140, 150, and 180 feet should be changed to "40", "43", "45", and "55", respectively.

### Table A2-4

- The "010" in the mph column should be changed to "10."
- A conversion showing 7 mph to 11 km/h should be added to the table.
- The conversion showing 65 mph to 110 km/h should be deleted from the table.