



## CMF / CRF Details

CMF ID: 8428

### Improve angle of channelized right turn lane

**Description:** Changes made to the study approaches include: sharpening the flat approach angle typical in traditional designs, reducing the radius, adjusting the stop bar position, and modifying the corner island to increase the line of sight of approaching through traffic.

**Prior Condition:** Varied depending on intersection

**Category:** Intersection geometry

**Study:** [\*Safety Impacts of a Modified Right Turn Lane Design at Intersections, Schattler and Hanson, 2016\*](#)

Star Quality Rating:



[\[View score details\]](#)

### Crash Modification Factor (CMF)

**Value:** 0.558

**Adjusted Standard Error:**

**Unadjusted Standard Error:** 0.114

### Crash Reduction Factor (CRF)

**Value:** 44.2 (This value indicates a **decrease** in crashes)

<b>Adjusted Standard Error:</b>	
<b>Unadjusted Standard Error:</b>	11.4

### Applicability

<b>Crash Type:</b>	All
<b>Crash Severity:</b>	All
<b>Roadway Types:</b>	Not specified
<b>Number of Lanes:</b>	1 to 3
<b>Road Division Type:</b>	
<b>Speed Limit:</b>	
<b>Area Type:</b>	Not specified
<b>Traffic Volume:</b>	
<b>Time of Day:</b>	All

#### *If countermeasure is intersection-based*

<b>Intersection Type:</b>	Roadway/roadway (not interchange related)
<b>Intersection Geometry:</b>	Not specified
<b>Traffic Control:</b>	Other
<b>Major Road Traffic Volume:</b>	
<b>Minor Road Traffic Volume:</b>	

### Development Details

<b>Date Range of Data Used:</b>	2003 to 2016
<b>Municipality:</b>	Peoria

<b>State:</b>	IL
<b>Country:</b>	USA
<b>Type of Methodology Used:</b>	Before/after using empirical Bayes or full Bayes
<b>Sample Size Used:</b>	

<b>Other Details</b>	
<b>Included in Highway Safety Manual?</b>	No
<b>Date Added to Clearinghouse:</b>	Jan-17-2017
<b>Comments:</b>	Total intersection AADT ranged from 3300 to 41300. Group of intersections analyzed included both signalized and stop-controlled intersections.

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