

# MEMORANDUM

## State of Alaska

Department of Transportation & Public Facilities  
Design and Engineering Services – Central Region

TO: Distribution

DATE: April 16, 2019

THRU: Wolfgang Junge, P.E.  
Preconstruction Engineer  
Central Region

TELEPHONE NO: 907-269-0639

FROM:  Jim Amundsen, P.E., Chief  
Highway Design

SUBJECT: Set aside RSAP for Calibration  
Use ROADSIDE in interim

VIA ROUTE SLIP

Central Region is setting aside the RSAP cost-effective analysis program as the primary guardrail analysis tool until it can be acceptably calibrated to resolve common roadside slope problems. The Highway Preconstruction Manual does not mandate RSAP usage. Other analysis can be used with engineering judgment.

We are returning to DOTPF's previous ROADSIDE version 1.2 as the primary roadside analysis program. This program is demonstrated to meet AASHTO's method for more than a decade prior to RSAP issuance. It provides acceptable evaluation of roadsides versus guardrail for high volume, high speed, high risk roadsides. ROADSIDE also requires user input of severity indices using engineering judgment.

RSAP may still be used to test concepts, but ROADSIDE must be run in Central Region as the first tool. Use engineering judgment in making final guardrail selections and document design choices.

For design work the following documents will be made available to all Central Region designers:

ROADSIDE Version 1.2  
1998 ROADSIDE User's Manual  
1996 AASHTO Roadside Design Guide Severity Index Tables  
NCHRP 202 Severity Indices for Roadside Safety Features

Distribution:

Joel St. Aubin, P.E., Chief, CR Construction  
Luke Bowland, P.E., Chief, Statewide Aviation Design  
Eric Miyashiro, P.E., Chief, CR Preliminary Design & Environmental Section  
Todd Vanhove, Chief, CR Planning and Administrative Services  
Charles Wagner, P.E., Chief, CR Maintenance and Operations  
Scott Thomas, P.E., Regional Traffic & Safety Engineer

## PREWOK ROUTE SLIP

19-7225 AASHTO Roadside Guardrail  
Analysis Reinstatement

Route	Initial	Date	Name	Title	Comments
<input type="checkbox"/>					
<input checked="" type="checkbox"/>	JA	4/16	Jim Amundsen, P.E.	Highway Design Chief	Recommend Approval
<input type="checkbox"/>			Luke Bowland, P.E.	Aviation Design Chief	
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<input type="checkbox"/>			John Linell, P.E.	ROW Chief	
<input type="checkbox"/>			Melanie Arnolds, P.E.	Utilities Engineer	
<input checked="" type="checkbox"/>	4/16	SET	Scott Thomas, P.E.	Regional Traffic Engineer	
<input type="checkbox"/>			Mike Yerkes, P.E.	Acting Materials Chief	
<input type="checkbox"/>			Greg Williams	Project Control Chief	
<input type="checkbox"/>			Joel St. Aubin, P.E.	Construction Chief	
<input type="checkbox"/>			Bob Anderson, P.E.	M&O Chief	
<input type="checkbox"/>			Todd Vanhove	Planning Chief	
<input checked="" type="checkbox"/>	e	4/17	Wolfgang Junge, P.E.	Preconstruction Engineer	
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