Design Exception by Controlling Criteria

DS - Design Speed

A DE is required if the design speed does not meet the requirements set forth in EI C3 – Design Speed.

A DE for Design Speed would cover the speed of the roadway as well as any other controlling criteria that are reliant on the Design Speed. If a DE for DS is required, then HC, SR, SSD, and CZ, among others, would then need to meet the criteria for the new DS.

LW - Lane Width

A DE is required if the lane width does not meet the requirements set forth in EI C1 – Lane and Shoulder Widths.

SW - Shoulder Width

A DE is required if the shoulder width does not meet the requirements set forth in EI C1 – Lane and Shoulder Widths.

HC - Horizontal Curve Radius

A DE is required if the minimum radius for the DS is not met as set forth in EI C7 – Horizontal Curve Radius or in the AASHTO Green Book.

SR - Superelevation Rate

A DE is required if the SE for the DS, as set forth in EI C6 – Superelevation Rate or in the AASHTO Green Book, is not met or exceeded.
MG - Maximum Grade

A DE is required if the MG for the roadway exceeds the allowable grades in EI C5 – Maximum Gradient, or if the minimum grade is not met.

SSD - Stopping Sight Distance

A DE is required if the SSD for crest vertical curves for the DS is not met. See EI C8 – Stopping Sight Distance and Design Guidance - Sag Vertical Curves for additional information. A DE is required if the SSD (HSO) Horizontally for the DS is not met.

CS - Cross Slope

A DE is required if the CS does not meet the requirements as set forth in EI C4 - Cross Slope.

VC - Vertical Clearance

A DE is required if the VC is less than the requirements as set forth in EI C9 – Vertical Clearance or in the AASHTO Green Book.

SC - Structural Capacity

A DE is required if the SC does not meet the requirements as set forth in the Bridge Design Guide or according to AASHTO.

CZ - Clear Zone

A DE is required if the CZ does not meet the requirements as set forth in EI C2 - Clear Zone.