EQMS – Auto Scan Formula Details



For assistance, please contact Online System Services at 544-5555 (Opt.1, Opt.2) Instructional Technologies & Implementation Services

Overview

The Auto Scan document provides users with the Formula Details table. It includes the rule name and its corresponding description.

Formula Details

Quick Reference Guide

Rule Name	Rule Description
Independent Brake	Brake cylinder > 15 and speed > 15 and speed < 70 for at least 30 seconds and not DPU.
FCS 50	Speed > 55 and throttle > T5 for at least 240 seconds.
Centering of Reverser	(Reverser is in forward or reverse) and speed =0 and (Tractive effort or load if present is 0) for at least 3600 seconds.
Power Brake	Speed > 20 and throttle > T6 and brake pipe < 80 and brake pipe > 0 and PCS is off for at least 30 seconds.
Northern Region Power Brake	(ATC cab signal = arm or clear) and speed > 20 and throttle > T5 and brake pipe <76 for at least 30 seconds.
Heavy Reduction	Speed > 20 and brake pipe < 69 and brake pipe > 0 and PCS is off for at least 15seconds.
Western Region Heavy Reduction	Speed > 20 and brake pipe < 72 and PCS is off for at least 15 seconds.
Northern Region Heavy Reduction	ATC cab signal = clear and speed > 20 and brake pipe < 72 and PCS is off for at least 15 seconds.
FT Brakes for 600 seconds (BP Continuity 10 minutes)	'Brakes Applied' then Stopped With Brakes released for > 600 seconds then speed > 20 and (Tractive effort > 20 or load > 300) for at least 1 second.
CVE Motion	Conductor Valve Emergency is on and speed > 8 and speed < 70 for at least 20 seconds.
Speeding	Speed > 75 and speed < 80 for at least 30 seconds.
HTUA (Crude Oil or Flammable Train)	Speed > 43 and train consist = Crude Oil train or High Hazard Flammable train.
Key Train	Speed > 53 and train consist = Key train.
Engineer Induced Emergency 10 Seconds	EIE is on and (TLEM is off and PCS is off) 1 second prior and speed > 8 and speed < 70 for at least 10 seconds.
UDE 10	PCS is on and speed > 9 and speed < 20 and Brake pipe > 45 and EIE is off and CVE is off for at least 1 second.
UDE 20	PCS is on and speed > 19 and Brake pipe > 45 and EIE is off and CVE is off for at least 1 second.

For more information, click **Additional Help**.

Page 1 of 1

Copyright © Union Pacific Railroad 2014 Revision Date: January 15, 2016