

50 System Architecture Description CCS System - Annex B Traceability Report Risk



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Preamble

The Risk Tracing Report shows all system functions and their related risks that need to be allocated to the corresponding exchanges and functions on System Level 4 (logical architecture).

The report contains the following information:

- System Function (Level 3): System function (SL3)
- Risk: The related risks to the system function
- Functional Exchange SL3: Functional exchanges of the logical function (SL3) related to the risk
- Functional Exchange SL3: Functional exchange on logical level (SL4) that realises the functional exchange on system level (SL3). There is a checkmark when the risk is linked to the exchange.
- Constraint: Constraint that mitigates the risk. If the risk is not related to a hazard, then there is no constraint defined.
- Constraint Allocation SL3: Allocation of the constraint to a system function
- Constraint Allocation SL4: Allocation of the constraint to a logical function

Please note: Some functional exchanges are not yet traced in the model. Then an allocation to SL4 is not possible yet and will be performed later.



















Instructions to use the report:

































- One or multiple system functions can be selected at the top.































- The completeness state of the tracing of the risks can be verified.
- The coherence of the tracing for the constraints can be verified.

Traceability Report

Functions:

System Function (Level 3)	Risk	Functional Exchange SL3	Functional Exchange SL4	Constraint	Constraint Allocation SL3	Constraint Allocation SL4
 SPMS-2106 - Control relative traction and braking effort manually	No linked risks					
 SPMS-2107 - Control state of train doors	No linked risks					
 SPMS-2108 - Sense+Observe point status	 SPRM-1287 - Early indication of Observed point status to Signaller	•  SPMS-2312 - Observed point status	•  SPMS-3189 - Observed point status ✔ Linked to Risk	No constraints		
	 SPRM-1288 - Incorrect indication of Observed point status to Signaller	•  SPMS-2312 - Observed point status	•  SPMS-3189 - Observed point status ✔ Linked to Risk	No constraints		
	 SPRM-1289 - Early indication of Observed point status to TMS	•  SPMS-5329 - Observed point status	•  SPMS-5339 - Observed point status ✔ Linked to Risk	No constraints		
	 SPRM-1290 - Incorrect indication of Observed point status to TMS	•  SPMS-5329 - Observed point status	•  SPMS-5339 - Observed point status ✔ Linked to Risk	No constraints		
	 SPRM-1291 - Late indication of Observed point status to Signaller	•  SPMS-2312 - Observed point status	•  SPMS-3189 - Observed point status ✔ Linked to Risk	No constraints		
				No constraints		

	 SPRM-1292 - Late indication of Observed point status to TMS	<ul style="list-style-type: none"> SPMS-5329 - Observed point status	<ul style="list-style-type: none"> SPMS-5339 - Observed point status<ul style="list-style-type: none">✔ Linked to Risk			
 SPMS-2109 - Toggle train cab	 SPRM-2291 - Cab status is sent to train interface earlier than expected when the driver toggled the desk closing switch	<ul style="list-style-type: none"> SPMS-2235 - Required cab status	<ul style="list-style-type: none"> SPMS-2992 - Required cab status<ul style="list-style-type: none">✗ Not linked to Risk	No constraints		
	 SPRM-2292 - Cab status is not sent to the train interface when the driver toggled the desk closing switch	<ul style="list-style-type: none"> SPMS-2235 - Required cab status	<ul style="list-style-type: none"> SPMS-2992 - Required cab status<ul style="list-style-type: none">✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	<ul style="list-style-type: none"> SPMS-2158 - Supervise guideway of one train	<ul style="list-style-type: none"> SPMS-2933 - Supervise guideway of one train
	 SPRM-2294 - Cab status is sent to train interface incorrectly when the driver toggled the desk closing switch	<ul style="list-style-type: none"> SPMS-2235 - Required cab status	<ul style="list-style-type: none"> SPMS-2992 - Required cab status<ul style="list-style-type: none">✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	<ul style="list-style-type: none"> SPMS-2158 - Supervise guideway of one train	<ul style="list-style-type: none"> SPMS-2933 - Supervise guideway of one train
				 SPRM-517 - No accident	No allocations found	No allocations found
 SPMS-2110 - Control voice communication	 SPRM-2282 -	<ul style="list-style-type: none"> SPMS-6967 - Indicated functional number	<ul style="list-style-type: none"> SPMS-6975 - Indicated functional number<ul style="list-style-type: none">✗ Not linked to Risk	No constraints		
	 SPRM-2284 -	<ul style="list-style-type: none"> SPMS-6967 - Indicated functional number	<ul style="list-style-type: none"> SPMS-6975 - Indicated functional number<ul style="list-style-type: none">✗ Not linked to Risk	No constraints		
	 SPRM-2283 -	<ul style="list-style-type: none"> SPMS-6967 - Indicated functional number	<ul style="list-style-type: none"> SPMS-6975 - Indicated functional number<ul style="list-style-type: none">✗ Not linked to Risk	No constraints		
 SPMS-2111 - Plan maintenance tasks+Manage asset	No linked risks					
 SPMS-2114 - Implement specific doors state	No linked risks					
 SPMS-2116 - Paused Control+Actuate specific level crossing protection facility state	No linked risks					
 SPMS-2119 - Root System Function	No linked risks					

























 SPMS-2121 - Monitor+Evaluate system asset state	No linked risks					
 SPMS-2125 - Exert force on point rails	No linked risks					
 SPMS-2126 - Control start of mission activities manually	No linked risks					
 SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates	 SPRM-1173 - (N/A) Early acceleration information from Rolling Stock Reference Point	•  SPMS-2234 - Actual acceleration	•  SPMS-2989 - Actual acceleration ✔ Linked to Risk	No constraints		
	 SPRM-1174 - Incorrect acceleration information from Rolling Stock Reference Point	•  SPMS-2234 - Actual acceleration	•  SPMS-2989 - Actual acceleration ✔ Linked to Risk	{C} SPRM-1738 - Integrity of provided information for determining train motion state	•  SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates	•  SPMS-2937 - Has acceleration vector in relation to rolling stock coordinates
				{C} SPRM-1736 - Integrity of received information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information
	 SPRM-1175 - Late acceleration information from Rolling Stock Reference Point	•  SPMS-2234 - Actual acceleration	•  SPMS-2989 - Actual acceleration ✔ Linked to Risk	{C} SPRM-1738 - Integrity of provided information for determining train motion state	•  SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates	•  SPMS-2937 - Has acceleration vector in relation to rolling stock coordinates
				{C} SPRM-1736 - Integrity of received information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information
 SPMS-2128 - Provide+sign configuration data	No linked risks					
 SPMS-2129 - Prepare+Supervise distribution of the configuration data	No linked risks					
 SPMS-2131 - Provide planned activation time for infrastructure	No linked risks					
 SPMS-2132 - Has physical behaviour moves+lies+is locked	 SPRM-1293 - Early actual physical point machine position from Point Machine	•  SPMS-2237 - Actual physical point machine position	•  SPMS-5815 - Actual physical point machine	{C} SPRM-1699 - Point is free of occupancy	•  SPMS-2190 - Control position of one point	•  SPMS-5265 - Control target state of one point
































position
✔Linked to Risk































<div>⚠️ SPRM-1294 - Incorrect actual physical point machine position from Point Machine</div>	<div>• 🛠️ SPMS-2237 - Actual physical point machine position</div>	<div>• 🛠️ SPMS-5815 - Actual physical point machine position ✔️ Linked to Risk</div>	<div>{c} SPRM-1700 - Point machine position is equal to requested point machine position.</div> <div>{c} SPRM-1699 - Point is free of occupancy</div>	<div>• 🟢 SPMS-2190 - Control position of one point</div> <div>• 🟢 SPMS-2190 - Control position of one point</div>	<div>• 🟢 SPMS-2851 - Determine required position of one point machine</div> <div>• 🟢 SPMS-5265 - Control target state of one point</div>
<div>⚠️ SPRM-1295 - Late actual physical point machine position from Point Machine</div>	<div>• 🛠️ SPMS-2237 - Actual physical point machine position</div>	<div>• 🛠️ SPMS-5815 - Actual physical point machine position ✔️ Linked to Risk</div>	<div>{c} SPRM-1700 - Point machine position is equal to requested point machine position.</div> <div>{c} SPRM-1699 - Point is free of occupancy</div>	<div>• 🟢 SPMS-2190 - Control position of one point</div> <div>• 🟢 SPMS-2190 - Control position of one point</div>	<div>• 🟢 SPMS-2851 - Determine required position of one point machine</div> <div>• 🟢 SPMS-5265 - Control target state of one point</div>
<div>⚠️ SPRM-1943 - Early actual physical point machine position from Point Machine</div>	<div>• 🛠️ SPMS-2237 - Actual physical point machine position</div>	<div>• 🛠️ SPMS-5815 - Actual physical point machine position ✔️ Linked to Risk</div>	<div>{c} SPRM-1700 - Point machine position is equal to requested point machine position.</div>	<div>• 🟢 SPMS-2190 - Control position of one point</div>	<div>• 🟢 SPMS-2851 - Determine required position of one point machine</div>
<div>⚠️ SPRM-1944 - Late actual physical point machine position from Point Machine</div>	<div>• 🛠️ SPMS-2237 - Actual physical point machine position</div>	<div>• 🛠️ SPMS-5815 - Actual physical point machine position ✔️ Linked to Risk</div>	<div>{c} SPRM-1700 - Point machine position is equal to requested point machine position.</div>	<div>• 🟢 SPMS-2190 - Control position of one point</div>	<div>• 🟢 SPMS-2851 - Determine required position of one point machine</div>
<div>⚠️ SPRM-1945 - Incorrect actual physical point machine position from Point Machine</div>	<div>• 🛠️ SPMS-2237 - Actual physical point machine position</div>	<div>• 🛠️ SPMS-5815 - Actual physical point machine position ✔️ Linked to Risk</div>	<div>{c} SPRM-1700 - Point machine position is equal to requested point machine position.</div>	<div>• 🟢 SPMS-2190 - Control position of one point</div>	<div>• 🟢 SPMS-2851 - Determine required position of one point machine</div>
<div>⚠️ SPRM-1266 - Late authorised automatic driving state from Driver</div>	<div>• 🛠️ SPMS-2247 - Authorised automatic driving state</div>	<div>• 🛠️ SPMS-3055 - Authorised automatic driving state ✔️ Linked to Risk</div>	<div>No constraints</div>		
<div>⚠️ SPRM-2293 -</div>	<div>{c} SPRM-1735 - Train is at standstill</div>				

































		<div><div></div><div>SPMS-2247 - Authorised automatic driving state</div></div>	<div><div></div><div>SPMS-3055 - Authorised automatic driving state ✗Not linked to Risk</div></div>		<div><div>SF</div><div>SPMS-2158 - Supervise guideway of one train</div></div>	<div><div>SF</div><div>SPMS-2933 - Supervise guideway of one train</div></div>
				<div><div>C</div><div>SPRM-1749 - Track ahead is free</div></div>	<div><div>SF</div><div>SPMS-2158 - Supervise guideway of one train</div></div>	<div><div>SF</div><div>SPMS-2933 - Supervise guideway of one train</div></div>
<div><div></div><div>SPRM-1265 - Early authorised automatic driving state from Driver</div></div>		<div><div></div><div>SPMS-2247 - Authorised automatic driving state</div></div>	<div><div></div><div>SPMS-3055 - Authorised automatic driving state ✓Linked to Risk</div></div>	<div><div>C</div><div>SPRM-1735 - Train is at standstill</div></div>	<div><div>SF</div><div>SPMS-2158 - Supervise guideway of one train</div></div>	<div><div>SF</div><div>SPMS-2933 - Supervise guideway of one train</div></div>
				<div><div>C</div><div>SPRM-1749 - Track ahead is free</div></div>	<div><div>SF</div><div>SPMS-2158 - Supervise guideway of one train</div></div>	<div><div>SF</div><div>SPMS-2933 - Supervise guideway of one train</div></div>
<div><div></div><div>SPRM-1267 - Incorrect authorised automatic driving state from Driver</div></div>		<div><div></div><div>SPMS-2247 - Authorised automatic driving state</div></div>	<div><div></div><div>SPMS-3055 - Authorised automatic driving state ✓Linked to Risk</div></div>	<div><div>C</div><div>SPRM-1735 - Train is at standstill</div></div>	<div><div>SF</div><div>SPMS-2158 - Supervise guideway of one train</div></div>	<div><div>SF</div><div>SPMS-2933 - Supervise guideway of one train</div></div>
				<div><div>C</div><div>SPRM-1749 - Track ahead is free</div></div>	<div><div>SF</div><div>SPMS-2158 - Supervise guideway of one train</div></div>	<div><div>SF</div><div>SPMS-2933 - Supervise guideway of one train</div></div>
<div><div>SF</div><div>SPMS-2135 - Has position in relation to geographical coordinates</div></div>	<div><div></div><div>SPRM-1436 - Late geographical coordinates from Rolling Stock Reference Point</div></div>	<div><div></div><div>SPMS-2238 - Actual present geographical coordinate</div></div>	<div><div></div><div>SPMS-3004 - Actual present geographical coordinate ✓Linked to Risk</div></div>	No constraints		
	<div><div></div><div>SPRM-1176 - (N/A) Early geographical coordinates from Rolling Stock Reference Point</div></div>	<div><div></div><div>SPMS-2238 - Actual present geographical coordinate</div></div>	<div><div></div><div>SPMS-3004 - Actual present geographical coordinate ✓Linked to Risk</div></div>	No constraints		
	<div><div></div><div>SPRM-1177 - Incorrect geographical coordinates from Rolling Stock Reference Point</div></div>	<div><div></div><div>SPMS-2238 - Actual present geographical coordinate</div></div>	<div><div></div><div>SPMS-3004 - Actual present geographical coordinate ✓Linked to Risk</div></div>	<div><div>C</div><div>SPRM-1738 - Integrity of provided information for determining train motion state</div></div>	<div><div>SF</div><div>SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates</div></div>	<div><div>SF</div><div>SPMS-2937 - Has acceleration vector in relation to rolling stock coordinates</div></div>
				<div><div>C</div><div>SPRM-1736 - Integrity of received information for determining train motion state</div></div>	<div><div>SF</div><div>SPMS-2192 - Sense+Observe motion of one train</div></div>	<div><div>SF</div><div>SPMS-2944 - Aggregate movable objects information</div></div>

				{C} SPRM-1739 - Consistency between information for determining train motion state	• {SF} SPMS-2192 - Sense+Observe motion of one train	• {SF} SPMS-2944 - Aggregate movable objects information
	⚠ SPRM-1178 - Late geographical coordinates from Rolling Stock Reference Point	• {D-S} SPMS-2238 - Actual present geographical coordinate	• {D-S} SPMS-3004 - Actual present geographical coordinate ✔ Linked to Risk	{C} SPRM-1738 - Integrity of provided information for determining train motion state	• {SF} SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates	• {SF} SPMS-2937 - Has acceleration vector in relation to rolling stock coordinates
				{C} SPRM-1736 - Integrity of received information for determining train motion state	• {SF} SPMS-2192 - Sense+Observe motion of one train	• {SF} SPMS-2944 - Aggregate movable objects information
				{C} SPRM-1739 - Consistency between information for determining train motion state	• {SF} SPMS-2192 - Sense+Observe motion of one train	• {SF} SPMS-2944 - Aggregate movable objects information
{SF} SPMS-2137 - Ensure safe movement of trains	⚠ SPRM-1053 - Early indication of Authorised distance and speed restriction to Signaller	• {D-S} SPMS-7230 - Authorised distance and speed restriction	• {D-S} SPMS-3044 - Allocated track path ✔ Linked to Risk	No constraints		
	⚠ SPRM-1054 - Late indication of Authorised distance and speed restriction to Signaller	• {D-S} SPMS-7230 - Authorised distance and speed restriction	• {D-S} SPMS-3044 - Allocated track path ✔ Linked to Risk	No constraints		
	⚠ SPRM-1055 - Incorrect indication of Authorised distance and speed restriction to Signaller	• {D-S} SPMS-7230 - Authorised distance and speed restriction	• {D-S} SPMS-3044 - Allocated track path ✔ Linked to Risk	No constraints		
	⚠ SPRM-2287 - EB or SB command is not sent when required by Rolling Stock Operation System	• {D-S} SPMS-6951 - Required state of full service brake or traction cut off or emergency brake	• {D-S} SPMS-3020 - Required state of full service brake or traction cut off or emergency brake ✘ Not linked to Risk • {D-S} SPMS-3022 - Required state of parking brake or emergency brake ✔ Linked to Risk	No constraints		

 SPRM-2286 - EB or SB command is not sent from CCS to Rolling Stock	<ul style="list-style-type: none"> SPMS-6951 - Required state of full service brake or traction cut off or emergency brake	<ul style="list-style-type: none"> SPMS-3020 - Required state of full service brake or traction cut off or emergency brake ✗ Not linked to Risk SPMS-3022 - Required state of parking brake or emergency brake ✓ Linked to Risk	{c} SPRM-1439 - Train located within movement permission	<ul style="list-style-type: none"> SPMS-2137 - Ensure safe movement of trains	<ul style="list-style-type: none"> SPMS-2921 - Supervise compliance of speed profiles of one train
 SPRM-2285 - EB or SB command is sent later than expected from CCS to Rolling Stock Operation System	<ul style="list-style-type: none"> SPMS-6951 - Required state of full service brake or traction cut off or emergency brake	<ul style="list-style-type: none"> SPMS-3020 - Required state of full service brake or traction cut off or emergency brake ✗ Not linked to Risk SPMS-3022 - Required state of parking brake or emergency brake ✓ Linked to Risk	{c} SPRM-1439 - Train located within movement permission	<ul style="list-style-type: none"> SPMS-2137 - Ensure safe movement of trains	<ul style="list-style-type: none"> SPMS-2921 - Supervise compliance of speed profiles of one train
 SPRM-1058 - Early indication of Authorised distance and speed restriction to TMS	<ul style="list-style-type: none"> SPMS-2249 - Authorised distance and speed restriction	<ul style="list-style-type: none"> SPMS-3052 - Allocated track path ✓ Linked to Risk	No constraints		
 SPRM-1059 - Late indication of Authorised distance and speed restriction to TMS	<ul style="list-style-type: none"> SPMS-2249 - Authorised distance and speed restriction	<ul style="list-style-type: none"> SPMS-3052 - Allocated track path ✓ Linked to Risk	No constraints		
 SPRM-1060 - Incorrect indication of Authorised distance and speed restriction to TMS	<ul style="list-style-type: none"> SPMS-2249 - Authorised distance and speed restriction	<ul style="list-style-type: none"> SPMS-3052 - Allocated track path ✓ Linked to Risk	No constraints		
 SPRM-1052 - Early indication of Authorised distance and speed restriction to Driver	<ul style="list-style-type: none"> SPMS-2326 - Authorised distance and speed restriction	<ul style="list-style-type: none"> SPMS-3191 - Calculated supervision limits ✓ Linked to Risk	No constraints		

 SPRM-1056 - Late indication of Authorised distance and speed restriction to Driver	•  SPMS-2326 - Authorised distance and speed restriction	•  SPMS-3191 - Calculated supervision limits ✔ Linked to Risk	{C} SPRM-1439 - Train located within movement permission	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
			{C} SPRM-1440 - Train speed is equal or less than the authorised target speed	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
 SPRM-1057 - Incorrect indication of Authorised distance and speed restriction to Driver	•  SPMS-2326 - Authorised distance and speed restriction	•  SPMS-3191 - Calculated supervision limits ✔ Linked to Risk	{C} SPRM-1439 - Train located within movement permission	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
			{C} SPRM-1440 - Train speed is equal or less than the authorised target speed	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
 SPRM-1401 - Early indication of Authorised distance and speed restriction to Driver	•  SPMS-2325 - Authorised distance and speed restriction	•  SPMS-3190 - Calculated supervision limits ✔ Linked to Risk	No constraints		
 SPRM-1402 - Incorrect indication of Authorised distance and speed restriction to Driver	•  SPMS-2325 - Authorised distance and speed restriction	•  SPMS-3190 - Calculated supervision limits ✔ Linked to Risk	{C} SPRM-1439 - Train located within movement permission	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
			{C} SPRM-1440 - Train speed is equal or less than the authorised target speed	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
 SPRM-1403 - Late indication of Authorised distance and speed restriction to Driver	•  SPMS-2325 - Authorised distance and speed restriction	•  SPMS-3190 - Calculated supervision limits ✔ Linked to Risk	{C} SPRM-1439 - Train located within movement permission	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
			{C} SPRM-1440 - Train speed is equal or less than the authorised target speed	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
No constraints					

 SPMS-2138 - Has position and direction in relation to track coordinates	 SPRM-1179 - (N/A) Early position and direction from Rolling Stock Reference Point	 SPMS-2239 - Actual present position and direction	 SPMS-3007 - Actual present position and direction in track coordinates ✔ Linked to Risk			
	 SPRM-1180 - Incorrect position and direction from Rolling Stock Reference Point	 SPMS-2239 - Actual present position and direction	 SPMS-3007 - Actual present position and direction in track coordinates ✔ Linked to Risk	{c} SPRM-1738 - Integrity of provided information for determining train motion state	 SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates	 SPMS-2937 - Has acceleration vector in relation to rolling stock coordinates
				{c} SPRM-1736 - Integrity of received information for determining train motion state	 SPMS-2192 - Sense+Observe motion of one train	 SPMS-2944 - Aggregate movable objects information
	 SPRM-1181 - Late position and direction from Rolling Stock Reference Point	 SPMS-2239 - Actual present position and direction	 SPMS-3007 - Actual present position and direction in track coordinates ✔ Linked to Risk	{c} SPRM-1738 - Integrity of provided information for determining train motion state	 SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates	 SPMS-2937 - Has acceleration vector in relation to rolling stock coordinates
				{c} SPRM-1736 - Integrity of received information for determining train motion state	 SPMS-2192 - Sense+Observe motion of one train	 SPMS-2944 - Aggregate movable objects information
	 SPRM-1437 - Late position and direction from Rolling Stock Reference Point	 SPMS-2239 - Actual present position and direction	 SPMS-3007 - Actual present position and direction in track coordinates ✔ Linked to Risk	No constraints		
 SPMS-2140 - Has velocity in relation to track coordinates	 SPRM-1182 - (N/A) Early train speed from Rolling Stock Reference Point	 SPMS-2243 - Actual velocity	 SPMS-3013 - Actual velocity ✔ Linked to Risk	No constraints		
	 SPRM-1183 - Incorrect train speed from Rolling Stock Reference Point	 SPMS-2243 - Actual velocity	 SPMS-3013 - Actual velocity ✔ Linked to Risk	{c} SPRM-1738 - Integrity of provided information for determining train motion state	 SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates	 SPMS-2937 - Has acceleration vector in relation to rolling stock coordinates





























				{C} SPRM-1736 - Integrity of received information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information
 SPRM-1184 - Late train speed from Rolling Stock Reference Point		•  SPMS-2243 - Actual velocity	•  SPMS-3013 - Actual velocity ✔ Linked to Risk	{C} SPRM-1738 - Integrity of provided information for determining train motion state	•  SPMS-2127 - Has acceleration vector in relation to rolling stock coordinates	•  SPMS-2937 - Has acceleration vector in relation to rolling stock coordinates
				{C} SPRM-1736 - Integrity of received information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information
 SPMS-2141 - Has wheel position and direction in relation to track coordinates	 SPRM-1135 - Incorrect wheel passing information from Wheel	•  SPMS-2244 - Actual wheel passing	•  SPMS-3015 - Actual wheel passing ✔ Linked to Risk	{C} SPRM-1736 - Integrity of received information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information
				{C} SPRM-1739 - Consistency between information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information
 SPRM-1438 - Late wheel passing information from Wheel (1)		•  SPMS-2244 - Actual wheel passing	•  SPMS-3015 - Actual wheel passing ✔ Linked to Risk	No constraints		
 SPRM-1982 - Late wheel passing information from Wheel (2)		•  SPMS-2244 - Actual wheel passing	•  SPMS-3015 - Actual wheel passing ✔ Linked to Risk	{C} SPRM-1736 - Integrity of received information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information
				{C} SPRM-1739 - Consistency between information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information
 SPRM-1134 - Early wheel passing information from Wheel		•  SPMS-2244 - Actual wheel passing	•  SPMS-3015 - Actual wheel passing ✔ Linked to Risk	{C} SPRM-1736 - Integrity of received information for determining train motion state	•  SPMS-2192 - Sense+Observe motion of one train	•  SPMS-2944 - Aggregate movable objects information

				{c} SPRM-1739 - Consistency between information for determining train motion state	• {SF} SPMS-2192 - Sense+Observe motion of one train	• {SF} SPMS-2944 - Aggregate movable objects information
{SF} SPMS-2146 - Implement specific traction and braking effort	⚠ SPRM-1277 - Late applied level of traction and brake effort from Rolling Stock Operation System	• {D} SPMS-2245 - Applied level of traction and brake effort	• {D} SPMS-3051 - Applied level of traction and brake effort ✔ Linked to Risk	No constraints		
	⚠ SPRM-1278 - Incorrect applied level of traction and brake effort from Rolling Stock Operation System	• {D} SPMS-2245 - Applied level of traction and brake effort	• {D} SPMS-3051 - Applied level of traction and brake effort ✔ Linked to Risk	No constraints		
	⚠ SPRM-1276 - Early applied level of traction and brake effort from Rolling Stock Operation System	• {D} SPMS-2245 - Applied level of traction and brake effort	• {D} SPMS-3051 - Applied level of traction and brake effort ✔ Linked to Risk	No constraints		
{SF} SPMS-2148 - Calculate operational traffic plan	⚠ SPRM-1305 - Incorrect required operational traffic plan from TMS	• {D} SPMS-2350 - Required operational traffic plan	• {D} SPMS-4546 - Required operational traffic plan ✔ Linked to Risk	{c} SPRM-1700 - Point machine position is equal to requested point machine position.	• {SF} SPMS-2190 - Control position of one point	• {SF} SPMS-2851 - Determine required position of one point machine
	⚠ SPRM-1306 - Late required operational traffic plan from TMS	• {D} SPMS-2350 - Required operational traffic plan	• {D} SPMS-4546 - Required operational traffic plan ✔ Linked to Risk	No constraints		
	⚠ SPRM-1451 - Late required operational traffic plan from TMS	• {D} SPMS-2354 - Required operational traffic plan	• {D} SPMS-5333 - Required operational traffic plan ✔ Linked to Risk • {D} SPMS-3182 - Generated train-specific timetable and infrastructure information ✖ Not linked to Risk	No constraints		
	⚠ SPRM-1475 - Early required operational traffic plan from TMS	• {D} SPMS-2357 - Required operational traffic plan	• {D} SPMS-2988 - Required operational traffic plan ✔ Linked to Risk	{c} SPRM-1742 - High quality standard for planning of usage restriction deactivation times	• {SF} SPMS-2148 - Calculate operational traffic plan	• {SF} SPMS-2843 - Calculate operational traffic plan

			{C} SPRM-1743 - Deactivation of planned usage restrictions requested	• {SF} SPMS-2159 - Control usage restriction areas	• {SF} SPMS-2929 - Control usage restrictions
⚠ SPRM-1476 - Incorrect required operational traffic plan from TMS	• {D} SPMS-2357 - Required operational traffic plan	• {D} SPMS-2988 - Required operational traffic plan ✓ Linked to Risk	{C} SPRM-1742 - High quality standard for planning of usage restriction deactivation times	• {SF} SPMS-2148 - Calculate operational traffic plan	• {SF} SPMS-2843 - Calculate operational traffic plan
			{C} SPRM-1743 - Deactivation of planned usage restrictions requested	• {SF} SPMS-2159 - Control usage restriction areas	• {SF} SPMS-2929 - Control usage restrictions
⚠ SPRM-1477 - Late required operational traffic plan from TMS	• {D} SPMS-2357 - Required operational traffic plan	• {D} SPMS-2988 - Required operational traffic plan ✓ Linked to Risk	No constraints		
⚠ SPRM-913 - Early required operational traffic plan from TMS	• {D} SPMS-2357 - Required operational traffic plan	• {D} SPMS-2988 - Required operational traffic plan ✓ Linked to Risk	No constraints		
⚠ SPRM-1047 - Late required operational traffic plan from TMS (1)	• {D} SPMS-2351 - Required operational traffic plan	• {D} SPMS-3079 - Required operational traffic plan ✓ Linked to Risk	No constraints		
⚠ SPRM-1392 - Late required operational traffic plan from TMS (2)	• {D} SPMS-2351 - Required operational traffic plan	• {D} SPMS-3079 - Required operational traffic plan ✓ Linked to Risk	{C} SPRM-1442 - Train adheres to infrastructure restrictions	• {SF} SPMS-2137 - Ensure safe movement of trains	• {SF} SPMS-2874 - Control track path allocation for movement permissions
			{C} SPRM-1443 - Requested track path is free of occupancies	• {SF} SPMS-2137 - Ensure safe movement of trains	• {SF} SPMS-2874 - Control track path allocation for movement permissions
			{C} SPRM-1444 - Requested track path is distinct from other authorised track paths	• {SF} SPMS-2137 - Ensure safe movement of trains	• {SF} SPMS-2874 - Control track path allocation for movement permissions
⚠ SPRM-956 - Incorrect required operational traffic plan from TMS	• {D} SPMS-2357 - Required operational traffic plan	• {D} SPMS-2988 - Required operational traffic plan ✓ Linked to Risk	{C} SPRM-1747 - Requested usage restriction parameters adheres to infrastructure and train-side restrictions	• {SF} SPMS-2159 - Control usage restriction areas	• {SF} SPMS-2929 - Control usage restrictions





























			{C} SPRM-1746 - Usage restriction confirmation matches operational plan	• {SF} SPMS-2167 - Supervise state of railway operation	• {SF} SPMS-2853 - Supervise state of the railway
⚠️ SPRM-957 - Late required operational traffic plan from TMS	• 📁 SPMS-2357 - Required operational traffic plan	• 📁 SPMS-2988 - Required operational traffic plan ✔️ Linked to Risk	{C} SPRM-1757 - Usage restriction is planned	• {SF} SPMS-2167 - Supervise state of railway operation	• {SF} SPMS-2853 - Supervise state of the railway
			{C} SPRM-2015 - Usage restriction is active at planned time	• {SF} SPMS-2148 - Calculate operational traffic plan	• {SF} SPMS-2843 - Calculate operational traffic plan
⚠️ SPRM-1448 - Early required operational traffic plan from TMS	• 📁 SPMS-2354 - Required operational traffic plan	• 📁 SPMS-5333 - Required operational traffic plan ✔️ Linked to Risk • 📁 SPMS-3182 - Generated train-specific timetable and infrastructure information ❌ Not linked to Risk	No constraints		
⚠️ SPRM-1043 - Early required operational traffic plan from TMS	• 📁 SPMS-2351 - Required operational traffic plan	• 📁 SPMS-3079 - Required operational traffic plan ✔️ Linked to Risk	No constraints		
⚠️ SPRM-1304 - Early required operational traffic plan from TMS	• 📁 SPMS-2350 - Required operational traffic plan	• 📁 SPMS-4546 - Required operational traffic plan ✔️ Linked to Risk	No constraints		
⚠️ SPRM-1450 - Incorrect required operational traffic plan from TMS	• 📁 SPMS-2354 - Required operational traffic plan	• 📁 SPMS-5333 - Required operational traffic plan ✔️ Linked to Risk • 📁 SPMS-3182 - Generated train-specific timetable and infrastructure information ❌ Not linked to Risk	No constraints		
⚠️ SPRM-1048 - Incorrect required operational traffic plan from TMS	• 📁 SPMS-2351 - Required operational traffic plan	• 📁 SPMS-3079 - Required operational traffic plan ✔️ Linked to Risk	{C} SPRM-1442 - Train adheres to infrastructure restrictions	• {SF} SPMS-2137 - Ensure safe movement of trains	• {SF} SPMS-2874 - Control track path allocation for movement permissions




Usage	SPMS-3173 - Usage restriction state	Linked to Risk	No
Usage	SPMS-3174 - Usage restriction state	Linked to Risk	No
Usage	SPMS-3173 - Usage restriction state	Linked to Risk	No

⚠️ SPRM-1483 - Late confirmation request of usage restriction deactivation to Signaller	•  SPMS-2219 - Usage restriction state	•  SPMS-3174 - Usage restriction state ✓ Linked to Risk	No constraints		
⚠️ SPRM-1486 - Late indication of Usage restriction deactivation state to TMS	•  SPMS-2215 - Usage restriction state	•  SPMS-3173 - Usage restriction state ✓ Linked to Risk	No constraints		
⚠️ SPRM-1481 - Early indication of usage restriction deactivation state to Signaller	•  SPMS-2219 - Usage restriction state	•  SPMS-3174 - Usage restriction state ✓ Linked to Risk	No constraints		
⚠️ SPRM-968 - Late indication of Usage restriction activation state to Signaller	•  SPMS-2219 - Usage restriction state	•  SPMS-3174 - Usage restriction state ✓ Linked to Risk	No constraints		
⚠️ SPRM-964 - Late confirmation request of usage restriction activation to Signaller	•  SPMS-2219 - Usage restriction state	•  SPMS-3174 - Usage restriction state ✓ Linked to Risk	{C} SPRM-2109 - Usage restriction activation is planned	•  SPMS-2159 - Control usage restriction areas	•  SPMS-2929 - Control usage restrictions
			{C} SPRM-1702 - Usage restriction area is free of field force	•  SPMS-2167 - Supervise state of railway operation	•  SPMS-2853 - Supervise state of the railway
⚠️ SPRM-967 - Incorrect indication of Usage restriction activation state to Signaller	•  SPMS-2219 - Usage restriction state	•  SPMS-3174 - Usage restriction state ✓ Linked to Risk	{C} SPRM-1702 - Usage restriction area is free of field force	•  SPMS-2167 - Supervise state of railway operation	•  SPMS-2853 - Supervise state of the railway
⚠️ SPRM-927 - Early indication of Usage restriction activation state to TMS	•  SPMS-2215 - Usage restriction state	•  SPMS-3173 - Usage restriction state ✓ Linked to Risk	No constraints		
⚠️ SPRM-966 - Early indication of Usage restriction activation state to Signaller	•  SPMS-2219 - Usage restriction state	•  SPMS-3174 - Usage restriction state ✓ Linked to Risk	{C} SPRM-1701 - Activation process of usage restriction is completed	•  SPMS-2159 - Control usage restriction areas	•  SPMS-2929 - Control usage restrictions
⚠️ SPRM-1780 - Early confirmation request of usage restriction deactivation to Signaller	•  SPMS-2219 - Usage restriction state	•  SPMS-3174 - Usage restriction state ✓ Linked to Risk	{C} SPRM-1702 - Usage restriction area is free of field force	•  SPMS-2167 - Supervise state of railway operation	•  SPMS-2853 - Supervise state of the railway




























50 System Architecture Description CCS System - Annex B Traceability Report Risk (rev. 726120) 2025-10-06 14:06 18 / 20

<div><div><div><div></div><div></div></div><div>SPMS-2164 - Paused Control coupling state of one train</div></div></div> <div><div><div><div></div><div></div></div><div>SPMS-2165 - Merged with authorise motion on CCS level : Supervise standstill of one train</div></div></div> <div><div><div><div></div><div></div></div><div>SPMS-2167 - Supervise state of railway operation</div></div></div>




















 SPRM-1051 - Late requested track path from Signaller (1)	<ul style="list-style-type: none"> SPMS-2347 - Requested track path	<ul style="list-style-type: none"> SPMS-3123 - Requested track path ✔ Linked to Risk			
 SPRM-1391 - Late requested track path from Signaller (2)	<ul style="list-style-type: none"> SPMS-2347 - Requested track path	<ul style="list-style-type: none"> SPMS-3123 - Requested track path ✔ Linked to Risk	{C} SPRM-1758 - Requested track path adheres to train-side restrictions	<ul style="list-style-type: none"> SPMS-2137 - Ensure safe movement of trains	<ul style="list-style-type: none"> SPMS-2874 - Control track path allocation for movement permissions
			{C} SPRM-1443 - Requested track path is free of occupancies	<ul style="list-style-type: none"> SPMS-2137 - Ensure safe movement of trains	<ul style="list-style-type: none"> SPMS-2874 - Control track path allocation for movement permissions
			{C} SPRM-1444 - Requested track path is distinct from other authorised track paths	<ul style="list-style-type: none"> SPMS-2137 - Ensure safe movement of trains	<ul style="list-style-type: none"> SPMS-2874 - Control track path allocation for movement permissions
 SPRM-1300 - Incorrect requested point position from Signaller (1)	<ul style="list-style-type: none"> SPMS-4628 - Requested point position	<ul style="list-style-type: none"> SPMS-5275 - Requested point position ✔ Linked to Risk	{C} SPRM-1699 - Point is free of occupancy	<ul style="list-style-type: none"> SPMS-2190 - Control position of one point	<ul style="list-style-type: none"> SPMS-5265 - Control target state of one point
 SPRM-1750 - Incorrect requested point position from Signaller (2)	<ul style="list-style-type: none"> SPMS-4628 - Requested point position	<ul style="list-style-type: none"> SPMS-5275 - Requested point position ✔ Linked to Risk	{C} SPRM-1700 - Point machine position is equal to requested point machine position.	<ul style="list-style-type: none"> SPMS-2190 - Control position of one point	<ul style="list-style-type: none"> SPMS-2851 - Determine required position of one point machine
 SPRM-1751 - Late requested point position from Signaller	<ul style="list-style-type: none"> SPMS-4628 - Requested point position	<ul style="list-style-type: none"> SPMS-5275 - Requested point position ✔ Linked to Risk	{C} SPRM-1700 - Point machine position is equal to requested point machine position.	<ul style="list-style-type: none"> SPMS-2190 - Control position of one point	<ul style="list-style-type: none"> SPMS-2851 - Determine required position of one point machine
 SPRM-958 - Early usage restriction activation confirmation from Signaller	<ul style="list-style-type: none"> SPMS-4824 - Provided usage restriction state	<ul style="list-style-type: none"> SPMS-3078 - Provided usage restriction state ✔ Linked to Risk	No constraints		
 SPRM-1479 - Incorrect usage restriction deactivation confirmation from Signaller	<ul style="list-style-type: none"> SPMS-4824 - Provided usage restriction state	<ul style="list-style-type: none"> SPMS-3078 - Provided usage restriction state ✔ Linked to Risk	{C} SPRM-1702 - Usage restriction area is free of field force	<ul style="list-style-type: none"> SPMS-2167 - Supervise state of railway operation	<ul style="list-style-type: none"> SPMS-2853 - Supervise state of the railway
			{C} SPRM-1740 - Confirmed usage restriction matches requested usage restriction	<ul style="list-style-type: none"> SPMS-2159 - Control usage restriction areas	<ul style="list-style-type: none"> SPMS-2929 - Control usage restrictions












































 SPRM-1299 - Late requested point position from Signaller	•  SPMS-4628 - Requested point position	•  SPMS-5275 - Requested point position ✔ Linked to Risk	{C} SPRM-1699 - Point is free of occupancy	•  SPMS-2190 - Control position of one point	•  SPMS-5265 - Control target state of one point
 SPRM-1298 - Early requested point position from Signaller	•  SPMS-4628 - Requested point position	•  SPMS-5275 - Requested point position ✔ Linked to Risk	{C} SPRM-1699 - Point is free of occupancy	•  SPMS-2190 - Control position of one point	•  SPMS-5265 - Control target state of one point
 SPRM-2173 - Late usage restriction activation confirmation from Signaller	•  SPMS-4824 - Provided usage restriction state	•  SPMS-3078 - Provided usage restriction state ✗ Not linked to Risk	{C} SPRM-2241 - Usage restriction is requested	No allocations found	No allocations found
 SPRM-971 - Incorrect usage restriction activation confirmation from Signaller	•  SPMS-4824 - Provided usage restriction state	•  SPMS-3078 - Provided usage restriction state ✔ Linked to Risk	{C} SPRM-1740 - Confirmed usage restriction matches requested usage restriction	•  SPMS-2159 - Control usage restriction areas	•  SPMS-2929 - Control usage restrictions
 SPRM-1478 - Early usage restriction deactivation confirmation from Signaller	•  SPMS-4824 - Provided usage restriction state	•  SPMS-3078 - Provided usage restriction state ✔ Linked to Risk	{C} SPRM-1702 - Usage restriction area is free of field force	•  SPMS-2167 - Supervise state of railway operation	•  SPMS-2853 - Supervise state of the railway
 SPRM-972 - Late usage restriction activation confirmation from Signaller	•  SPMS-4824 - Provided usage restriction state	•  SPMS-3078 - Provided usage restriction state ✔ Linked to Risk	{C} SPRM-1757 - Usage restriction is planned	•  SPMS-2167 - Supervise state of railway operation	•  SPMS-2853 - Supervise state of the railway
 SPRM-1050 - Incorrect requested track path from Signaller	•  SPMS-2347 - Requested track path	•  SPMS-3123 - Requested track path ✔ Linked to Risk	{C} SPRM-1758 - Requested track path adheres to train-side restrictions	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2874 - Control track path allocation for movement permissions
			{C} SPRM-1442 - Train adheres to infrastructure restrictions	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2874 - Control track path allocation for movement permissions
			{C} SPRM-1443 - Requested track path is free of occupancies	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2874 - Control track path allocation for movement permissions

					{C} SPRM-1444 - Requested track path is distinct from other authorised track paths	• {SF} SPMS-2137 - Ensure safe movement of trains	• {SF} SPMS-2874 - Control track path allocation for movement permissions
	⚠️ SPRM-1480 - Late usage restriction deactivation confirmation from Signaller	• {D-S} SPMS-4824 - Provided usage restriction state	• {D-S} SPMS-3078 - Provided usage restriction state ✔️ Linked to Risk	No constraints			
{SF} SPMS-2171 - Provide current time	No linked risks						
{SF} SPMS-2172 - Use system voice communication	No linked risks						
{SF} SPMS-2174 - Use system voice communication	No linked risks						
{SF} SPMS-2177 - Supervise passenger exchange	No linked risks						
{SF} SPMS-2179 - To be delted Manage asset	No linked risks						
{SF} SPMS-2180 - Control automatic driving speed of one train	⚠️ SPRM-1240 - Early indication of automatic departure readiness state to Driver	• {D-S} SPMS-2321 - Indicated automatic driving state	• {D-S} SPMS-3185 - Indicated automatic driving state ✔️ Linked to Risk	No constraints			
	⚠️ SPRM-1242 - Early Required relative traction and brake effort to Rolling Stock Operational System	• {D-S} SPMS-2365 - Required relative traction and brake effort	• {D-S} SPMS-3014 - Required relative traction and brake effort ✔️ Linked to Risk	{C} SPRM-1749 - Track ahead is free		• {SF} SPMS-2158 - Supervise guideway of one train	• {SF} SPMS-2933 - Supervise guideway of one train
				{C} SPRM-1439 - Train located within movement permission		• {SF} SPMS-2137 - Ensure safe movement of trains	• {SF} SPMS-2921 - Supervise compliance of speed profiles of one train
				{C} SPRM-1440 - Train speed is equal or less than the authorised target speed		• {SF} SPMS-2137 - Ensure safe movement of trains	• {SF} SPMS-2921 - Supervise compliance of speed profiles of one train
	⚠️ SPRM-1243 - Late Required relative traction and brake effort to Rolling Stock Operational System	• {D-S} SPMS-2365 - Required relative traction and brake effort	• {D-S} SPMS-3014 - Required relative traction and brake effort ✔️ Linked to Risk	{C} SPRM-1749 - Track ahead is free		• {SF} SPMS-2158 - Supervise guideway of one train	• {SF} SPMS-2933 - Supervise guideway of one train

				{C} SPRM-1439 - Train located within movement permission	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
				{C} SPRM-1440 - Train speed is equal or less than the authorised target speed	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
	 SPRM-1244 - Late indication of automatic departure readiness state to Driver	•  SPMS-2321 - Indicated automatic driving state	•  SPMS-3185 - Indicated automatic driving state ✔ Linked to Risk	No constraints		
	 SPRM-1245 - Incorrect indication of automatic departure readiness state to Driver	•  SPMS-2321 - Indicated automatic driving state	•  SPMS-3185 - Indicated automatic driving state ✔ Linked to Risk	No constraints		
	 SPRM-1246 - Incorrect Required relative traction and brake effort to Rolling Stock Operational System	•  SPMS-2365 - Required relative traction and brake effort	•  SPMS-3014 - Required relative traction and brake effort ✔ Linked to Risk	{C} SPRM-1749 - Track ahead is free	•  SPMS-2158 - Supervise guideway of one train	•  SPMS-2933 - Supervise guideway of one train
				{C} SPRM-1439 - Train located within movement permission	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
				{C} SPRM-1440 - Train speed is equal or less than the authorised target speed	•  SPMS-2137 - Ensure safe movement of trains	•  SPMS-2921 - Supervise compliance of speed profiles of one train
 SPMS-2182 - Maintain configuration data	No linked risks					
 SPMS-2187 - Paused Control level crossing protection state	No linked risks					
 SPMS-2190 - Control position of one point	 SPRM-1302 - Incorrect Required point machine movement to Point Machine (1)	•  SPMS-2361 - Required point machine movement	•  SPMS-3008 - Required point machine position ✔ Linked to Risk	{C} SPRM-1699 - Point is free of occupancy	•  SPMS-2190 - Control position of one point	•  SPMS-5265 - Control target state of one point

	 SPRM-1303 - Late Required point machine movement to Point Machine (1)	<ul style="list-style-type: none">  SPMS-2361 - Required point machine movement 	<ul style="list-style-type: none">  SPMS-3008 - Required point machine position ✓ Linked to Risk 	{c} SPRM-1699 - Point is free of occupancy	<ul style="list-style-type: none">  SPMS-2190 - Control position of one point 	<ul style="list-style-type: none">  SPMS-5265 - Control target state of one point
	 SPRM-1732 - Incorrect Required point machine movement to Point Machine (2)	<ul style="list-style-type: none">  SPMS-2361 - Required point machine movement 	<ul style="list-style-type: none">  SPMS-3008 - Required point machine position ✓ Linked to Risk 	{c} SPRM-1700 - Point machine position is equal to requested point machine position.	<ul style="list-style-type: none">  SPMS-2190 - Control position of one point 	<ul style="list-style-type: none">  SPMS-2851 - Determine required position of one point machine
	 SPRM-1733 - Late Required point machine movement to Point Machine (2)	<ul style="list-style-type: none">  SPMS-2361 - Required point machine movement 	<ul style="list-style-type: none">  SPMS-3008 - Required point machine position ✓ Linked to Risk 	{c} SPRM-1700 - Point machine position is equal to requested point machine position.	<ul style="list-style-type: none">  SPMS-2190 - Control position of one point 	<ul style="list-style-type: none">  SPMS-2851 - Determine required position of one point machine
	 SPRM-1301 - Early Required point machine movement to Point Machine	<ul style="list-style-type: none">  SPMS-2361 - Required point machine movement 	<ul style="list-style-type: none">  SPMS-3008 - Required point machine position ✓ Linked to Risk 	{c} SPRM-1699 - Point is free of occupancy	<ul style="list-style-type: none">  SPMS-2190 - Control position of one point 	<ul style="list-style-type: none">  SPMS-5265 - Control target state of one point
 SPMS-2191 - Paused Observe level crossing protection status	No linked risks					
 SPMS-2192 - Sense+Observe motion of one train	 SPRM-1191 - Early indication of current train speed to Driver	<ul style="list-style-type: none">  SPMS-2336 - Estimated motion state 	<ul style="list-style-type: none">  SPMS-4510 - Estimated speed ✓ Linked to Risk 	{c} SPRM-1717 - Integrity of train speed display	<ul style="list-style-type: none">  SPMS-2192 - Sense+Observe motion of one train 	<ul style="list-style-type: none">  SPMS-2892 - Measure+Estimate 1D speed of one train front end
	 SPRM-1193 - Late indication of current train speed to Driver	<ul style="list-style-type: none">  SPMS-2336 - Estimated motion state 	<ul style="list-style-type: none">  SPMS-4510 - Estimated speed ✓ Linked to Risk 	{c} SPRM-1717 - Integrity of train speed display	<ul style="list-style-type: none">  SPMS-2192 - Sense+Observe motion of one train 	<ul style="list-style-type: none">  SPMS-2892 - Measure+Estimate 1D speed of one train front end
	 SPRM-1192 - Incorrect indication of current train speed to Driver	<ul style="list-style-type: none">  SPMS-2336 - Estimated motion state 	<ul style="list-style-type: none">  SPMS-4510 - Estimated speed ✓ Linked to Risk 	{c} SPRM-1717 - Integrity of train speed display	<ul style="list-style-type: none">  SPMS-2192 - Sense+Observe motion of one train 	<ul style="list-style-type: none">  SPMS-2892 - Measure+Estimate 1D speed of one train front end
	 SPRM-1185 - Early indication of estimated train motion state information to TMS	<ul style="list-style-type: none">  SPMS-2300 - Estimated motion state 	<ul style="list-style-type: none">  SPMS-3050 - Aggregated track occupancy and train status information ✓ Linked to Risk 	No constraints		

 SPRM-1186 - Incorrect indication of estimated train motion state information to TMS		 SPMS-2300 - Estimated motion state	 SPMS-3050 - Aggregated track occupancy and train status information ✔ Linked to Risk	No constraints
 SPRM-1187 - Late indication of estimated train motion state information to TMS		 SPMS-2300 - Estimated motion state	 SPMS-3050 - Aggregated track occupancy and train status information ✔ Linked to Risk	No constraints
 SPRM-1188 - Early indication of estimated train area occupation information to Signaller		 SPMS-2330 - Estimated motion state	 SPMS-4666 - Aggregated track occupancy and train status information ✔ Linked to Risk	No constraints
 SPRM-1189 - Incorrect indication of estimated train area occupation information to Signaller		 SPMS-2330 - Estimated motion state	 SPMS-4666 - Aggregated track occupancy and train status information ✔ Linked to Risk	No constraints
 SPRM-1190 - Late indication of estimated train area occupation information to Signaller		 SPMS-2330 - Estimated motion state	 SPMS-4666 - Aggregated track occupancy and train status information ✔ Linked to Risk	No constraints
 SPMS-6206 - Analyse Infrastructure Manager system asset state	No linked risks			
 SPMS-6207 - Analyse Railway Undertaking system asset state	No linked risks			
 SPMS-6241 - Check+Sign configuration data	No linked risks			
 SPMS-6482 - Monitor system asset state information	No linked risks			

 SPMS-6518 - Provide configuration data	No linked risks					
 SPMS-6570 - Provide planned activation time for vehicle	No linked risks					
 SPMS-6817 - Control power of one train	 SPRM-2471 - Early sending of cab status from Rolling Stock Operation System	•  SPMS-6969 - Main power status	•  SPMS-6974 - Main power status ✗ Not linked to Risk	No constraints		
	 SPRM-2488 - Main power switch turn-off information is not sent by Rolling Stock Operation System	•  SPMS-6969 - Main power status	•  SPMS-6974 - Main power status ✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	•  SPMS-2158 - Supervise guideway of one train	•  SPMS-2933 - Supervise guideway of one train
	 SPRM-2489 - Incorrect main power switch turn-off information is sent by Rolling Stock Operation System	•  SPMS-6969 - Main power status	•  SPMS-6974 - Main power status ✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	•  SPMS-2158 - Supervise guideway of one train	•  SPMS-2933 - Supervise guideway of one train
	 SPRM-2391 - Main power switch turn-off information is sent later than expected to Rolling Stock when driver turn-off the switch	•  SPMS-6969 - Main power status	•  SPMS-6974 - Main power status ✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	•  SPMS-2158 - Supervise guideway of one train	•  SPMS-2933 - Supervise guideway of one train
	 SPRM-2392 - No main power turn-off information is sent to Rolling Stock when driver turn-off the switch	•  SPMS-6969 - Main power status	•  SPMS-6974 - Main power status ✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	•  SPMS-2158 - Supervise guideway of one train	•  SPMS-2933 - Supervise guideway of one train
	 SPRM-2393 - Incorrect main power switch turn-off information is sent to Rolling Stock when driver turn-off the switch	•  SPMS-6969 - Main power status	•  SPMS-6974 - Main power status ✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	•  SPMS-2158 - Supervise guideway of one train	•  SPMS-2933 - Supervise guideway of one train
 SPMS-6819 - Switch train power	 SPRM-2373 - Main power switch turn-off information is sent later than expected to Rolling Stock when the driver turn-off the switch	•  SPMS-6876 - Required power status	•  SPMS-6939 - Required power status ✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	•  SPMS-2158 - Supervise guideway of one train	•  SPMS-2933 - Supervise guideway of one train
	 SPRM-2374 - No main power turn-off information is sent.	•  SPMS-6876 - Required power status	•  SPMS-6939 - Required power status ✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	•  SPMS-2158 - Supervise guideway of one train	•  SPMS-2933 - Supervise guideway of one train
	 SPRM-2375 - Incorrect main power switch turn-off information is					

	sent to Rolling Stock when the driver turn-off the switch	<ul style="list-style-type: none">• SPMS-6876 - Required power status	<ul style="list-style-type: none">• SPMS-6939 - Required power status✗ Not linked to Risk	{c} SPRM-1735 - Train is at standstill	<ul style="list-style-type: none">• SPMS-2158 - Supervise guideway of one train	<ul style="list-style-type: none">• SPMS-2933 - Supervise guideway of one train
SPMS-6821 - Control registration of functional number	SPRM-2325 - De-registration request from driver is sent earlier than expected to CCS	<ul style="list-style-type: none">• SPMS-6878 - Provided functional number	<ul style="list-style-type: none">• SPMS-6942 - Provided functional number✗ Not linked to Risk	No constraints		
	SPRM-2326 - De-registration request from driver is sent late or not sent to CCS	<ul style="list-style-type: none">• SPMS-6878 - Provided functional number	<ul style="list-style-type: none">• SPMS-6942 - Provided functional number✗ Not linked to Risk	No constraints		
	SPRM-2327 - Incorrect de-registration request from driver is sent to CCS	<ul style="list-style-type: none">• SPMS-6878 - Provided functional number	<ul style="list-style-type: none">• SPMS-6942 - Provided functional number✗ Not linked to Risk	No constraints		
SPMS-7317 - Carry our maintenance task	No linked risks					
SPPR-10082 - Function	No linked risks					