



EULYNX

EULYNX Initiative

EULYNX Glossary

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Contents

1	Introduction	1
1.1	Release information	1
1.2	Impressum	1
1.3	Purpose	2
2	Glossary	2
2.1	Glossary	2
2.1.1	Description of the actors	2
2.1.2	Diagnostic and maintenance	6
2.1.3	Generic Glossary	7
2.1.4	PoS-Signalling and network architecture	14
2.1.5	Certification	15
2.1.6	SCI-CC	15
2.1.7	SCI-ILS	15
2.1.8	SCI-IO	15
2.1.9	SCI-LS	18
2.1.10	SCI-LC and SCI-LX	20
2.1.11	SCI-P	21
2.1.12	SCI-RBC	22
2.1.13	SCI-TDS	22
2.1.14	Systems Engineering	26
2.1.15	Security	27

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1	Head	1 Introduction		
Eu.Glo.5	Head	1.1 Release information		
Eu.Glo.2	Info	[Eu.Doc.9] EULYNX Glossary CENELEC Phase: 0 Version: 2.6 (0.A) Approval date: 15.06.2023		
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Eu.Glo.1962	Info	version number: 2.5 (1.A) date: 05.04.2023 author: Filip Giering, Philipp Wolber review: Nico Hurman changes: EUGDK-157, EUGDK-158, EUGDK-161, EUGDK-162, EUGDK-164, EUGDK-168, EUGDK-170		
Eu.Glo.1968	Info	version number: 2.5 (2.A) date: 11.05.2023 author: Dominik Smajgl review: Cluster changes: EUGDK-174, EUGDK-175, EUGDK-176		
Eu.Glo.1970	Info	version number: 2.6 (0.A) date: 28.06.2023 author: Dominik Smajgl review: CCB changes: EUGDK-178, EUGDK-180, EUGDK-181, EUGDK-182		
Eu.Glo.3	Head	1.2 Impressum		

ID	Type	Term	Abbreviation	Definition
Eu.Glo.4	Info	Publisher: EULYNX Initiative A full list of the EULYNX Partners can be found on www.eulynx.eu/index.php/members .		
Eu.Glo.6	Info	Responsible for this document: EULYNX Project Management Office www.eulynx.eu		
Eu.Glo.270	Info	Copyright EULYNX Partners All information included or disclosed in this document is licensed under the European Union Public Licence EUPL, Version 1.2 or later.		
Eu.Glo.7	Head	1.3 Purpose		
Eu.Glo.8	Info	The purpose of this document is to list and define the terms and abbreviations used in EULYNX.		
Eu.Glo.1136	Info	Additionally terms and abbreviations used for data preparation are described in the EULYNX data platform.		
Eu.Glo.1121	Head	2 Glossary		
Eu.Glo.770	Head	2.1 Glossary		
Eu.Glo.1800	Head	2.1.1 Description of the actors		
Eu.Glo.1963	Info	Adjacent System		Under the designation "Adjacent System" the following adjacent systems are summarised: <ul style="list-style-type: none"> • Traffic Control System, • Adjacent Interlocking System, • Radio Block Centre, • Centralised ETCS L1 Controller, • Trackworker Safety System and • External Level Crossing System.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1802	Info	Adjacent Interlocking System		The Adjacent Interlocking System is an interlocking managing track side equipment and the safe movement of rail traffic in an adjacent area and is able to communicate with the Subsystem - Electronic Interlocking with the use of SCI-ILS.
Eu.Glo.1803	Info	Adjacent IO System		The <u>Adjacent IO System</u> is interfaced by the physical <u>Input Channels</u> and/or <u>Output Channels</u> of the <u>Subsystem - Generic IO</u> . Via the <u>Output Channels</u> , the <u>Adjacent IO System</u> receives (binary On/Off) status information from the <u>Subsystem - Electronic Interlocking</u> for evaluation and triggering of actions; via the <u>Input Channels</u> , the <u>Adjacent IO System</u> sends (binary On/Off) status information to the <u>Subsystem - Electronic Interlocking</u> for the same intended purpose. Examples of <u>Adjacent IO Systems</u> are a key lock, a departure signal or a moveable bridge.
Eu.Glo.1881	Info	Automatic route setting system		The <u>Automatic route setting system</u> is a system responsible for the automation of route setting. It is a feature of the <u>Traffic Control System</u> .
Eu.Glo.1805	Info	Basic Data identifier		The <u>Basic Data identifier</u> provides the <u>Basic Data</u> to the <u>EULYNX field element Subsystem</u> .
Eu.Glo.1882	Info	Command control system		The <u>Command control system</u> is a system offering a human-machine interface that allows a <u>Signaller</u> to control one or more <u>Interlocking</u> . It is a feature of the <u>Traffic Control System</u> .
Eu.Glo.1806	Info	Configuration Data carrier		The <u>Configuration Data carrier</u> contains the <u>Configuration Data</u> and, if applicable, system software for subsystems, including needed verification attributes.
Eu.Glo.1865	Info	Detection element		The <u>Detection element</u> (e.g. Inductive Detective Loops) at the <u>Level Crossing protection area</u> is used to detect the passage of trains.
Eu.Glo.1808	Info	Diagnostic System		The <u>Diagnostic System</u> collects and processes the diagnostic data from the subsystems of <u>EULYNX System</u> by the Service Function Diagnostics Collector. The information from <u>Diagnostic System</u> serves the removal of errors and disturbances in the subsystems of <u>EULYNX System</u> . Diagnostic data can be event-driven information (at occurrence of defined events) and preventive information.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1810	Info	EULYNX field element Subsystem	EfeS	Under the designation " <u>EULYNX field element Subsystem</u> " are summarised the subsystems: - <u>Subsystem - Light Signal</u> , - <u>Subsystem - Point</u> , - <u>Subsystem - Generic IO</u> , - <u>Subsystem - Train Detection System</u> and - <u>Subsystem - Level Crossing</u> .
Eu.Glo.1812	Info	Indicator		The <u>Indicator</u> is a switchable frame that shows supplementary aspect information to a signal (for example route indicator, platform indicator).
Eu.Glo.1815	Info	Eurobalise		A transponder for track-to-train data transmission. Notably used by Train Protection Systems such as ETCS.
Eu.Glo.1923	Info	External Level Crossing System		The <u>External Level Crossing System</u> controls and monitors level crossing protection facilities, employing e.g. lamps and barriers, in order to prevent collisions between trains and road users.
Eu.Glo.1816	Info	Legacy train protection system		The <u>Legacy train protection system</u> provides the status of the trackside signal components to the railway vehicle, preventing passing signals at stop and ensuring adherence with the permitted speed.
Eu.Glo.1924	Info	Level Crossing protection facility	LCPF	All equipment at a <u>Level Crossing</u> protecting vehicles and persons crossing the tracks (e.g. half/full barriers, obstacle detectors and road signals).
Eu.Glo.1867	Info	Local operator		The <u>Local operator</u> is a person responsible for on-site operations in accordance with national regulations.
Eu.Glo.1822	Info	Maintainer		The <u>Maintainer</u> performs works on or near the signalling devices. The <u>Maintainer</u> performs preventive and corrective maintenance on <u>EULYNX System</u> and adjacent systems.
Eu.Glo.1823	Info	Point machine		The <u>Point machine</u> is an apparatus for moving and detecting point blades from a source of power, usually electric. It may also include a system to mechanically lock the point in a position. The <u>Point machine</u> is a safety relevant signalling component, ensuring safe passage of railway vehicles over moveable elements at points, crossings and derailleurs.
Eu.Glo.1825	Info	Power supply		The <u>Power supply</u> supplies the electrical energy for the operation of all subsystems of the <u>EULYNX System</u> .

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1827	Info	Radio Block Centre	RBC	The <u>Radio Block Centre</u> generates the driving instructions from the track information from an electronic interlocking and ETCS-specific data and transmits them to the vehicle via GSM-R, in accordance with the Euroradio specification.
Eu.Glo.1830	Info	Subsystem - Electronic Interlocking		In the <u>EULYNX System</u> architecture, the <u>Subsystem - Electronic Interlocking</u> is the central subsystem which manages track side equipment and the safe movement of rail traffic. It establishes the safety-related dependencies to the subsystems as well as the adjacent systems.
Eu.Glo.1831	Info	Subsystem - Generic IO		The <u>Subsystem - Generic IO</u> is used for integrating signalling components, particularly in the track and platform area, which are controlled or monitored with input and output information.
Eu.Glo.1832	Info	Subsystem - Light Signal		The <u>Subsystem - Light Signal</u> transmits information to <u>Train driver</u> through the signal aspects. The <u>Subsystem - Light Signal</u> includes stationary trackside signals, which can be set and display the visual signal aspect on the basis of a command by <u>Subsystem - Electronic Interlocking</u> or on the basis of a safety-related reaction.
Eu.Glo.1833	Info	Subsystem - Maintenance and Data Management	MDM	The <u>Subsystem - Maintenance and Data Management</u> performs the services required for the operation of the <u>EULYNX System</u> . Service functions may be provided also to the adjacent systems.
Eu.Glo.1834	Info	Subsystem - Point		The <u>Subsystem - Point</u> is used to control and monitor the <u>Point machines</u> of moveable elements.
Eu.Glo.1940	Info	Subsystem - Security Services Platform	SSP	The subsystem Security Services Platform is a logical platform providing the services required for security (e.g. security logging collector, IAM functionality, PKI, time...) using the SSI-XX interface.
Eu.Glo.1835	Info	Subsystem - Train Detection System		The <u>Subsystem - Train Detection System</u> monitors the vacancy and occupancy status of <u>TVP sections</u> .
Eu.Glo.1836	Info	Subsystem - Level Crossing		The <u>Subsystem - Level Crossing</u> protects the crossing area of rails and vehicles through its <u>Level Crossing protection facility</u> .
Eu.Glo.1837	Info	Centralised ETCS L1 Controller	CEC	The <u>Centralised ETCS L1 Controller</u> communicates variable signalling data to switchable <u>Eurobalises</u> via balise drivers.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1838	Info	Traffic Control System	TCS	The <u>Traffic Control System</u> is responsible for commanding and monitoring the status of the railway. It comprises all systems for traffic control, including <u>Command control system</u> , <u>Train describer</u> and <u>Automatic route setting system</u> .
Eu.Glo.1839	Info	Train describer		The <u>Train describer</u> is a system that provides train number information. It is a feature of the <u>Traffic Control System</u> .
Eu.Glo.1840	Info	Train driver		The <u>Train driver</u> interfaces with the <u>Subsystem - Light Signal</u> by observing the signal aspect indicated by the <u>Subsystem - Light Signal</u> . The <u>Train driver</u> considers the indicated signal aspects for train operation according to the national requirements.
Eu.Glo.1971	Info	The Trackworker Safety System	TSS	The <u>Trackworker Safety System</u> is used for protection of works on the tracks as a worker warning device based on signal dependant information from the <u>Subsystem - Electronic Interlocking</u> .
Eu.Glo.1841	Info	Wheel		The <u>Wheel</u> of a railway vehicle is detected by the sensor system of <u>Subsystem - Train Detection System</u> .
Eu.Glo.1871	Head	2.1.2 Diagnostic and maintenance		
Eu.Glo.1843	Info	Certification Request Standard	PKCS #10	Defines the format of a Certificate Signing Request (CSR) which have to be submitted by a Request Authority, to receive a SSL-Certificate with associated Public Key. <u>PKCS #10</u> is specified in RFC 2986.
Eu.Glo.1967	Info	Device Software		The Device Software covers all system and application software that runs on a subsystem.
Eu.Glo.1844	Info	Diagnostic data		Data originating from a <u>EULYNX field element Subsystem</u> and possibly adjacent systems to enable diagnosis.
Eu.Glo.1846	Info	Hypertext Transfer Protocol Secure	HTTPS	<u>HTTPS</u> is an adaptation of the HTTP for secure communication over a computer network, and is widely used on the Internet.
Eu.Glo.1847	Info	MDM core		Basic internal function of the <u>Subsystem - Maintenance and Data Management</u> , managing the state of the Maintenance and Data Management (MDM) service functions.
Eu.Glo.1086	Info	Network Time Protocol	NTP	<u>NTP</u> is a networking protocol for clock synchronization between computer systems over packet-switched, variable-latency data networks.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1848	Info	Open Platform Communication Unified Architecture	OPC UA	<u>OPC UA</u> is a machine to machine communication protocol for industrial automation developed by the OPC Foundation.
Eu.Glo.1849	Info	Public Key Cryptography Standards	PKCS	A group of <u>PKCS</u> devised and published by RSA Security Inc.
Eu.Glo.1851	Info	Service function Diagnostics collector		<u>Service function</u> to collect and process event-based and preventive <u>Diagnostic data</u> of connected <u>EULYNX field element Subsystem</u> (and possibly adjacent systems) via the SDI-XX interface and to send it to the <u>Diagnostic system</u> via SDI-DS.
Eu.Glo.1852	Info	Service function Loading procedure		<u>Service function</u> to provide the <u>Engineering Data</u> and <u>Configuration Data</u> and <u>Device Software</u> for connected <u>EULYNX field element Subsystem</u> (and possibly adjacent systems) via the SMI-XX interface.
Eu.Glo.1853	Info	Service function Logging		<u>Service function</u> to store and manage log files in the <u>MDM core</u> . These files log all telegrams of SCI-XX.PDI.
Eu.Glo.1854	Info	Service function Time synchronisation		<u>Service function</u> to provide a uniform time base for all <u>EULYNX field element Subsystems</u> (and possibly adjacent systems) via the SDI-XX interface.
Eu.Glo.1855	Info	Simple Certificate Enrolment Protocol	SCE	<u>SCE</u> is an Internet Draft in the Internet Engineering Task Force (IETF). This protocol is used by numerous manufacturers of network equipment and software who are developing simplified means of handling certificates for large-scale implementation to everyday users, as well as being referenced in other industry standards.
Eu.Glo.1858	Info	Simple Object Access Protocol	SOAP	<u>SOAP</u> is a protocol specification for exchanging structured information in the implementation of web services in computer networks.
Eu.Glo.1860	Info	User Datagram Protocol	UDP	<u>UDP</u> is one of the core members of the Internet protocol suite. With <u>UDP</u> , computer applications can send messages, in this case referred to as datagrams, to other hosts on an Internet Protocol (IP) network.
Eu.Glo.1124	Head	2.1.3 Generic Glossary		
Eu.Glo.778	Info	Applicability information		The <u>Applicability information</u> marks the <u>IM</u> specific subset of functionality that defines the behaviour of the generic equipment when in use for a specific <u>Infrastructure manager</u> .
Eu.Glo.796	Info	Automatic train protection system	ATP	A safety system that enforces compliance with signalled aspects, speeds and / or movement authority limits.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1933	Info	Balise Group	BG	A group of one or more <u>Eurobalises</u> .
Eu.Glo.801	Info	Basic Data	BD	Every <u>EULYNX field element Subsystem</u> requires a data set "Basic Data". These are the base for booting the <u>EULYNX field element Subsystem</u> . The <u>Basic Data</u> of a <u>EULYNX field element Subsystem</u> stored on a <u>Basic Data identifier</u> ."
Eu.Glo.1958	Info	Basic package		A type of functional package, at least one of them must be implemented. It is optionally allowed to combine and implement more than one <u>Basic package</u> in a product.
Eu.Glo.1953	Info	Booting		One of the essential subsystem states of a <u>EULYNX field element Subsystems</u> . This is a logical state that indicates the state of one <u>EULYNX field element Subsystem</u> . Depending on the physical architecture, the operating state of the hardware may differ. This is especially true on a <u>Multi-element controller</u> , where several <u>EULYNX field element Subsystems</u> share the same hardware. The functions in this state are described in the EULYNX System architecture specification [Eu.Doc.16].
Eu.Glo.1090	Info	Checksum non safety-relevant data	CSNS	Checksum for <u>Non safety-relevant data</u> . The checksum is intended to check data integrity of the downloaded data during the service function Loading procedure.
Eu.Glo.1091	Info	Checksum safety-relevant data	CSS	Checksum for <u>Safety-relevant data</u> . The checksum is exchanged during the establishing of the Process Data Interface in order to ensure consistency of the configuration and engineering data. It is also intended to check data integrity of the downloaded data during the service function Loading procedure.
Eu.Glo.813	Info	Command		An input from a connected system or subsystem, requesting a defined function.
Eu.Glo.817	Info	Communication partners		Systems involved in the exchange of information over an interface.
Eu.Glo.819	Info	Conditional emergency stop area	CESA	A predefined <u>Emergency Stop Area (ESA)</u> serving as an escape area, permitting trains inside an activated area to escape while approaching trains are stopped.
Eu.Glo.820	Info	Configuration		The structuring and interconnecting of hardware and software of a system for its intended application.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.821	Info	Configuration Data		The <u>Configuration Data</u> are data, that on one hand are used to execute technical components of the <u>EULYNX System</u> , such as network addresses and protocol versions, and on the other hand contain parametric and values explicitly given in requirement specifications as <u>Configuration Data</u> . <u>Configuration Data</u> are independent from the structure of the rail system. If changes of parametric and values shall be made during operation, they can be done without changing <u>Engineering Data</u> .
Eu.Glo.822	Info	Control Interface		Interface for controlling or monitoring (depending on task) of a system connected to one subsystem.
Eu.Glo.841	Info	Diagnostic Interface		The interface containing diagnostic information from the <u>EULYNX field element Subsystem</u> and possibly adjacent systems.
Eu.Glo.1469	Info	Electronic Interlocking	EIL	An <u>Interlocking</u> whose functions are implemented with software.
Eu.Glo.852	Info	Emergency Stop Area	ESA	A predefined area where a train can be stopped with a conditional or unconditional emergency stop message.
Eu.Glo.856	Info	Engineering Data		The <u>Engineering Data</u> are used to describe a railway system monitored and controlled by an <u>EULYNX System</u> .
Eu.Glo.862	Info	EULYNX System		The <u>EULYNX System</u> is a signalling system with a standard reference architecture with all subsystems and their interfaces as well as principal design paradigms, defined by the EULYNX System Definition.
Eu.Glo.866	Info	Fail-safe		A design philosophy that, if any failure arises, expected or otherwise, maintains or places the equipment in a safe state.
Eu.Glo.867	Info	Failure		A deviation from the specified performance of a system. A failure is the consequence of a fault or error in the system.
Eu.Glo.868	Info	Failure - critical		A failure that inherently affects safety or operations.
Eu.Glo.869	Info	Failure - non-critical		A failure that does not inherently affect safety or operations.
Eu.Glo.1956	Info	Fallback mode		One of the essential subsystem states of a <u>EULYNX field element Subsystem</u> . This is a logical state that indicates the state of one <u>EULYNX field element Subsystem</u> . Depending on the physical architecture, the operating state of the hardware may differ. This is especially true on a <u>Multi-element controller</u> , where several <u>EULYNX field element Subsystems</u> share the same hardware. Depending on the physical architecture of a

ID	Type	Term	Abbreviation	Definition
				<p><u>Multi-element controller</u>, it may be possible that only one out of n <u>EULYNX field element Subsystems</u> is in this state, while the controller still works properly.</p> <p>The functions in this state are described in the EULYNX System architecture specification [Eu.Doc.16].</p>
Eu.Glo.870	Info	Field element		Railway equipment on the track, e.g. light signal, point
Eu.Glo.1957	Info	Functional package		<p>The specifications of each <u>EULYNX field element subsystem</u> are divided into <u>Functional packages</u>. The implementation and certification of a physical product may be limited to one or more packages. A <u>Functional package</u> can be either a <u>Basic package</u> or an <u>Optional package</u>.</p>
Eu.Glo.891	Info	In advance		<p>In relation to elements on or alongside the track, positioned such that a train reaches it after passing another defined item of equipment in the direction of travel. See also 'In rear'.</p>
Eu.Glo.892	Info	In rear		<p>In relation to elements on or alongside the track, positioned such that a train reaches it before passing another defined item of equipment in the direction of travel. See also 'In advance'.</p>
Eu.Glo.893	Info	Infrastructure manager	IM	<p>An authority responsible in particular for establishing, managing and maintaining railway infrastructure, including traffic management and control-command and signalling.</p>
Eu.Glo.803	Info	Initial State Of Outputs		<p>The state of the outputs of the <u>EULYNX field element Subsystems</u> starting after the subsystem operates according to its configuration data.</p>
Eu.Glo.1954	Info	Initialising		<p>One of the essential subsystem states of a <u>EULYNX field element Subsystem</u>. This is a logical state that indicates the state of one <u>EULYNX field element Subsystem</u>. Depending on the physical architecture, the operating state of the hardware may differ. This is especially true on a <u>Multi-element controller</u>, where several <u>EULYNX field element Subsystems</u> share the same hardware.</p> <p>The functions in this state are described in the EULYNX System architecture specification [Eu.Doc.16].</p>
Eu.Glo.1470	Info	Interlocking	IL	<p>The <u>Interlocking</u> is a system which, in accordance with commands from a <u>Signaller</u> or signalling control system, manages track side equipment and the safe movement of rail traffic.</p>

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Eu.Glo.900	Info	IO element		Individual signalling component integrated to the interlocking system in a way that the controlling and monitoring is performed with generic inputs and outputs, configurable for each specific application.
Eu.Glo.912	Info	Local shunting area	LSA	A section of the interlocking system's supervision area that may be released to a shunter or to a shunting signaller.
Eu.Glo.1884	Info	Maintenance interface		The interface containing maintenance information for the <u>EULYNX field element Subsystem</u> .
Eu.Glo.921	Info	Maintenance/Operation/Display interface		Interface for interactions with one of the subsystems of <u>EULYNX System</u> to visualize its behaviour and to configure relevant information for maintenance purposes.
Eu.Glo.888	Info	Manual operation		The mode of operation of equipment without the use of or assistance from electrical or other powered apparatus.
Eu.Glo.923	Info	Message		An output from a connected system or subsystem, reporting a defined status.
Eu.Glo.1943	Info	Moveable component		A <u>Moveable component</u> is the smallest mobile part of a <u>Moveable element</u> , i.e. a set of point blades, a derailer component, a movable frog, or the mechanism that drives other components.
Eu.Glo.930	Info	Moveable element		A <u>Movable element</u> is a set of <u>Movable components</u> that are controlled and set simultaneously to one of two positions. It can be power operated or hand operated.
Eu.Glo.1961	Info	Multi-element controller	MEC	A hardware platform that is able to operate multiple <u>EULYNX field element Subsystems</u> .
Eu.Glo.1093	Info	Non safety-relevant data	NSRD	Non safety-relevant part of the Engineering Data and Configuration Data. The differentiation of safety-relevant and not safety-relevant is explained in chapter 'Engineering- and configuration data' of the respective requirements specification.

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Eu.Glo.1955	Info	Operational		One of the essential subsystem states of a <u>EULYNX field element Subsystem</u> . This is a logical state that indicates the state of one <u>EULYNX field element Subsystem</u> . Depending on the physical architecture, the operating state of the hardware may differ. This is especially true on a <u>Multi-element controller</u> , where several <u>EULYNX field element Subsystems</u> share the same hardware. The functions in this state are described in the EULYNX System architecture specification [Eu.Doc.16].
Eu.Glo.1959	Info	Optional package		A type of functional package, which can be optionally implemented in addition to (one of) the <u>Basic package(s)</u> .
Eu.Glo.971	Info	Point of Power - Output	PoP-O	Interface for supplying the <u>EULYNX System Subsystems</u> with electrical power.
Eu.Glo.969	Info	Point of Service - Signalling	PoS-Signalling	The <u>Point of Service - Signalling</u> serves as a connection point for <u>EULYNX field element Subsystem</u> and adjacent systems to the communication system enabling them to communicate with each other.
Eu.Glo.970	Info	Power supply		A device for the provision of electrical power to the railway, particularly the signalling system and vehicles.
Eu.Glo.1087	Info	Process Data Interface		The interface containing process and other information necessary for the exchange between the <u>Subsystem - Electronic Interlocking</u> and the subsystems as well as between the <u>Subsystem - Electronic Interlocking</u> and the adjacent systems.
Eu.Glo.975	Info	Process Data Interface protocol	PDI	The <u>Process Data Interface protocol</u> , abbreviated as <u>PDI</u> , designates a communication protocol used for the data exchange on the <u>Process Data Interface</u> .
Eu.Glo.1094	Info	Process Data Interface protocol Version	PDIVer	Version of the <u>Process Data Interface protocol (PDI)</u> . <u>PDIVer</u> may be used as well.
Eu.Glo.1471	Info	Safe communication	SC	The communication between systems which takes place according to EN 50129.
Eu.Glo.1472	Info	Safe communication protocol	SCP	The protocol which is used for the safe communication through the safety, retransmission and redundancy layer which is implemented with the RaSTA protocol.

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Eu.Glo.1089	Info	Safety-relevant data	SRD	Safety-relevant part of the Engineering Data and Configuration Data. The differentiation of safety-relevant and not safety-relevant is explained in chapter 'Engineering- and configuration data' of the respective requirements specification.
Eu.Glo.1850	Info	Service function		Function provided to the <u>EULYNX field element Subsystem</u> or particular adjacent systems associated with the <u>EULYNX System</u> . The service functions can be provided by the <u>Subsystem - Maintenance and Data Management</u> (MDM) or a nationally specified system.
Eu.Glo.1017	Info	Signaller		The person responsible for the operation of the signalling system in accordance with the requirements of the railway operating rules and regulations.
Eu.Glo.1869	Info	Standard Communication Interface	SCI	The standardised EULYNX interface for process data information.
Eu.Glo.1870	Info	Standard Diagnostic Interface	SDI	The standardised EULYNX interface for diagnostics to enable communication with the service functions Diagnostics collector and Time synchronisation.
Eu.Glo.1095	Info	Subsystems identification	SubS_ID	The <u>SubS_ID</u> the unique identification of subsystems within the EULYNX System.
Eu.Glo.1036	Info	Standard Maintenance Interface	SMI	The standardised EULYNX interface for maintenance to enable communication with the service function Loading procedure.
Eu.Glo.1941	Info	Standard Security Interface	SSI	The standardised EULYNX interface for security to enable communication with the service functions for security.
Eu.Glo.1119	Info	Temporary Speed Restriction	TSR	Planned speed restriction imposed for temporary conditions such as track maintenance.
Eu.Glo.1969	Info	Timeout		A defined period of time given for a particular action. If this action is not completed in this time the system shall react in a defined way.
Eu.Glo.1964	Info	Transmission Control Protocol	TCP	TCP is one of the core members of the Internet protocol suite. TCP provides reliable, ordered, and error-checked delivery of a stream of octets (bytes) between applications running on hosts communicating via an Internet Protocol (IP) network.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1965	Info	Transport Layer Security	TLS	TLS is a cryptographic protocol designed to provide communications security over a computer network. The TLS protocol aims primarily to provide security, including privacy (confidentiality), integrity, and authenticity through the use of cryptography, such as the use of certificates, between two or more communicating computer applications.
Eu.Glo.1058	Info	Unconditional emergency stop area	UESA	A predefined <u>Emergency Stop Area (ESA)</u> activated if a train in the area needs to be unconditionally stopped.
Eu.Glo.1065	Info	Working area	WA	A predefined area where maintenance work can be done safely. Maintenance staff will be able to operate objects (such as points, derailleurs, level crossings and tunnel gates) within an activated working area.
Eu.Glo.1872	Head	2.1.4 PoS-Signalling and network architecture		
Eu.Glo.1918	Info	Communication participant	CP	Any system that sends and receives information via the Subsystem - Communication System. All EULYNX subsystems and adjacent systems that are connected to the Subsystem - Communication System via the PoS-Signalling are considered communication participants.
Eu.Glo.1919	Info	Customer edge node	CE-node	Network component in the lowest layer of hierarchy in the architecture of a data network.
Eu.Glo.1885	Info	Crypto component		A one-component solution as an application-specific, configurable system with safety functions. It uses packet-switched data networks and certification-based authentication to establish an encrypted channel via the IPsec protocol family.
Eu.Glo.1886	Info	Data network		A digital telecommunications network which allows nodes to share resources and exchange data.
Eu.Glo.1092	Info	Key Performance Indicators	KPI	Key Performance Indicators (reference to load distribution and response behaviour)
Eu.Glo.1920	Info	Provider edge node	PE-node	Network component in an intermediate layer of hierarchy in the architecture of a data network.
Eu.Glo.1921	Info	Provider node	P-node	Network component in the highest layer of hierarchy in the architecture of a data network.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1887	Info	Network component		An active component of the data network
Eu.Glo.1083	Info	Virtual Local Area Network	VLAN	VLAN is specified in the IEEE 802.1Q standard (http://standards.ieee.org/about/get/802/802.1.html).
Eu.Glo.1915	Head	2.1.5 Certification		
Eu.Glo.1916	Info	Hardware-in-the-loop testing	HiL	A test method in which the relevant interfaces of a system under test are integrated into a test bench. During test execution, the test bench stimulates the inputs and records the outputs of the system under test.
Eu.Glo.1917	Info	System under test	SUT	The system that is tested against a test specification to pass certification.
Eu.Glo.1932	Info	Test control and logging system	TCL	System to execute formally specified test cases and log their results. The test control and logging system controls the test bench.
Eu.Glo.1873	Head	2.1.6 SCI-CC		
Eu.Glo.771	Info	Acknowledgement		An action reinforcing veracity of a request.
Eu.Glo.1937	Info	Tip		The part of a Point where the possible paths through the point converge.
Eu.Glo.1938	Info	Right leg		The part of a Point leading to the right, seen from the Tip of the Point.
Eu.Glo.1939	Info	Left leg		The part of a Point leading to the left, seen from the Tip of the Point.
Eu.Glo.1096	Head	2.1.7 SCI-ILS		
Eu.Glo.1097	Info	Boundary		A boundary marks the end of one interlocking system area and the beginning of another adjacent interlocking system area.
Eu.Glo.1098	Info	Direction		The direction is an information which is used to synchronize two adjacent interlocking systems on a common direction for a track so that certain rail vehicle movements can be performed across the boundary.
Eu.Glo.943	Info	Occupancy sequence		A sequence of occupying TVP sections reflecting the path of a rail vehicle.
Eu.Glo.1088	Head	2.1.8 SCI-IO		

ID	Type	Term	Abbreviation	Definition
Eu.Glo.777	Info	Antivalent		An <u>Antivalent</u> configured channel A is a physical channel, which is in pair with a second physical channel B, which is also configured to be <u>Antivalent</u> . Both channels are supposed to be switched having an opposite value.
Eu.Glo.1099	Info	Disturbed		<p><u>Disturbed</u> is one of the possible states of</p> <ul style="list-style-type: none"> • physical <u>Output Channels</u> (if they are monitored) with the interpretation, that in this state the required voltage, resp. the required current, is not present. • logical <u>Output Channels</u> (if they are monitored) with the interpretation, that in this state: <ul style="list-style-type: none"> - One of its physical <u>Output Channels</u> is in the state <u>Disturbed</u> • physical <u>Input Channels</u> with the interpretation, that in this state the system cannot detect if the required voltage, resp. the required current, is present. • logical <u>Input Channels</u> with the interpretation, that in this state, either: <ul style="list-style-type: none"> - One of its physical <u>Input Channels</u> is in the state <u>Disturbed</u> - The physical <u>Input Channels</u> violate the antivalence/equivalence conditions
Eu.Glo.858	Info	Equivalent		An <u>Equivalent</u> configured channel A is a physical channel, which is in pair with a second physical channel B, which is also configured to be <u>Equivalent</u> . Both channels are supposed to be switched having the same value.
Eu.Glo.1960	Info	Flashing		<p>Flashing is one of the possible states of:</p> <ul style="list-style-type: none"> • logical <u>Output Channels</u> <p>with the interpretation, that in this state the respective physical Output Channel is alternating between Switched On and Switched Off with a configured frequency and duty cycle.</p>
Eu.Glo.895	Info	Input Channel		<p>The <u>Input Channel</u> is a double used term.</p> <ul style="list-style-type: none"> • The logical <u>Input Channel</u> represents the information, which is available to <u>Subsystem - Electronic Interlocking</u>. • The physical <u>Input Channel</u> represents the interface between <u>Subsystem - Generic IO</u> and <u>Adjacent IO System</u>. With those, the single channel input, the <u>Antivalent</u> input and the <u>Equivalent</u> input can be implemented.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.953	Info	Output Channel		<p>The <u>Output Channel</u> is a double used term.</p> <ul style="list-style-type: none"> The logical <u>Output Channel</u> represents the information, which is available to <u>Subsystem - Electronic Interlocking</u>. The physical <u>Output Channel</u> represents the interface between <u>Subsystem - Generic IO</u> and <u>Adjacent IO System</u>. With those, the single channel output, the <u>Antivalent</u> output and the <u>Equivalent</u> output can be implemented.
Eu.Glo.980	Info	Reference Input Channel	RIC	<p>The <u>Reference Input Channel</u> is a physical <u>Input Channel</u>. It is configured to be <u>Antivalent</u>, <u>Equivalent</u> or single channel.</p> <p>The <u>Reference Input Channel</u> is used for providing the information for the logical <u>Input Channel</u>.</p> <p>The logical <u>Input Channel</u> is reported to <u>Subsystem - Electronic Interlocking</u> via SCI-IO.</p>
Eu.Glo.981	Info	Reference Output Channel	ROC	<p>The <u>Reference Output Channel</u> is a physical <u>Output Channel</u>. It is configured to be <u>Antivalent</u>, <u>Equivalent</u> or single channel.</p> <p>The <u>Reference Output Channel</u> is used to represent the information of the logical <u>Output Channel</u>.</p> <p>The logical <u>Output Channel</u> is switched by <u>Subsystem - Electronic Interlocking</u> via SCI-IO.</p>
Eu.Glo.1102	Info	Switched Off		<p><u>Switched Off</u> is one of the possible states of</p> <ul style="list-style-type: none"> logical and physical <u>Output Channels</u> and logical and physical <u>Input Channels</u> <p>with the interpretation, that in this state, no voltage is given resp. no current flows.</p>
Eu.Glo.1035	Info	Switched On		<p><u>Switched On</u> is one of the possible states of</p> <ul style="list-style-type: none"> logical and physical <u>Output Channels</u> logical and physical <u>Input Channels</u> <p>with the interpretation, that in this state, voltage is given resp. current flows.</p>

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1061	Info	Validation Input Channel	VIC	The <u>Validation Input Channel</u> is a physical <u>Input Channel</u> . It is always implemented in pair with a <u>Reference Input Channel</u> , and is configured identically as the <u>Reference Input Channel</u> . The <u>Validation Input Channel</u> is not used for single channels. The state of <u>Validation Input Channel</u> is used by the <u>Subsystem - Generic IO</u> internally for proving the condition to the <u>Reference Input Channel</u> .
Eu.Glo.1062	Info	Validation Output Channel	VOC	The <u>Validation Output Channel</u> is a physical <u>Output Channel</u> . It is always implemented in pair with a <u>Reference Output Channel</u> , and is configured identically as the <u>Reference Output Channel</u> . The <u>Validation Output Channel</u> is not used for single channels. The state of <u>Validation Output Channel</u> is switched by <u>Subsystem - Generic IO</u> internally, in an <u>Antivalent</u> or <u>Equivalent</u> way to the <u>Reference Output Channel</u> .
Eu.Glo.1109	Head	2.1.9 SCI-LS		
Eu.Glo.1110	Info	Configurable signal optics		The <u>Configurable signal optics</u> represents the sum total of all <u>Light spot</u> .
Eu.Glo.847	Info	Additional degradation information		Additional information transmitted from the <u>Subsystem - Electronic Interlocking</u> to the <u>Subsystem - Light Signal</u> for use cases where the information available in the <u>Subsystem - Light Signal</u> is insufficient for the downgrading of a <u>Signal Aspect</u> .
Eu.Glo.896	Info	intentionally dark		A <u>Subsystem - Light Signal</u> can set the full <u>Signal Aspect</u> to <u>intentionally dark</u> by a command of the <u>Subsystem - Electronic Interlocking</u> . <u>No Signal Aspect</u> will be shown to the <u>Train driver</u> .
Eu.Glo.904	Info	Lamp		<u>Lamp</u> designates the element installed in a <u>Light spot</u> which emits light.
Eu.Glo.907	Info	Light spot		<u>Light spot</u> designates the total unit installed in a signal silhouette consisting of optics, <u>Lamps</u> and any corresponding electronics.
Eu.Glo.915	Info	Luminosity		The <u>Luminosity</u> represents the brightness used by the displays of <u>Signal Aspects</u> . It is divided into a Day <u>Luminosity</u> and a Night <u>Luminosity</u> . The values for these Luminosities shall be defined.
Eu.Glo.927	Info	most restrictive Signal Aspect		A valid <u>Signal Aspect</u> indicating the most restrictive aspect configured on the signal.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.935	Info	No Signal Aspect		<p><u>No Signal Aspect</u> is valid, if all <u>Lamps</u>, that are required to indicate the <u>Signal Aspect</u>, are dark, so that the Train driver cannot notice a luminous <u>Signal Aspect</u>. For the internal process, the following three cases are distinguished:</p> <p>a) <u>No Signal Aspect - intentionally dark</u> b) <u>No Signal Aspect - lamp failure</u> c) <u>No Signal Aspect - luminosity failure</u></p> <p>The differentiation between b) and c) according to the internal process is based on experiences of the manufacturers.</p>
Eu.Glo.1111	Info	No Signal Aspect - intentionally dark		<p>A <u>Signal Aspect</u> is considered as <u>No Signal Aspect - intentionally dark</u>, if <u>No Signal Aspect</u> is indicated, because the <u>Subsystem - Electronic Interlocking</u> commanded this and then all lamps are deactivated. The <u>Subsystem - Light Signal</u> processes and reports in this case the commanded <u>Signal Aspect</u> and controls accordingly the <u>Indicator</u>. The output channels of the <u>Legacy train protection system</u> are deactivated (<u>Legacy train protection system</u> active). The <u>Eurobalise</u> is controlled analogous to <u>Legacy train protection system</u>.</p>
Eu.Glo.936	Info	No Signal Aspect - lamp failure		<p><u>No Signal Aspect - lamp failure</u> applies if all <u>Lamps</u> of the <u>Subsystem - Light Signal</u> required for the indication of the <u>most restrictive Signal Aspect</u> are dark due to a <u>Lamp</u> failure.</p>
Eu.Glo.1112	Info	No Signal Aspect - luminosity failure		<p><u>No Signal Aspect - luminosity failure</u> applies if <u>No Signal Aspect</u> is indicated and all available <u>Lamps</u> have been safely deactivated, due to a fault in the activation of the commanded <u>Luminosity</u>. This can occur when the <u>Subsystem - Light Signal</u> encounters that supply voltage has fallen below the needed level or when the <u>Subsystem - Light Signal</u> is incapable of processing and indicating the commanded <u>Luminosity</u> in a SIL compliant way.</p>
Eu.Glo.1952	Info	Punktförmige Zugbeeinflussung	PZB	<p>The <u>Legacy train protection system</u> primarily used by Deutsche Bahn. It provides binary information about the status of the trackside signalling system, that is read by an evaluation unit on board of railway vehicles. The information is used to control onboard train protection functionality, to prevent the train from passing a signal at danger.</p>

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1042	Info	Route information		(Abstract) information about the set route transmitted by the <u>Subsystem - Electronic Interlocking</u> to the <u>Subsystem - Light Signal</u> for UseCases where the <u>Subsystem - Light Signal</u> must select Legacy train protection system or <u>Eurobalises</u> route-dependent.
Eu.Glo.1011	Info	Signal Aspect		The <u>Signal Aspect</u> is information displayed by the signal, conveyed by means of light, shape, text or symbol. The message signalled to the driver is composed of one or more <u>Signal Aspects</u> , typically an aspect from a main signal frame and another aspect from an additional signal frame that modulates the message.
Eu.Glo.1944	Info	Signal Aspect Set		The <u>Signal Aspect Set</u> is a composition of one or more <u>Signal Aspects</u> corresponding to country specific guidelines.
Eu.Glo.1113	Head	2.1.10 SCI-LC and SCI-LX		
Eu.Glo.1925	Info	Activation point		The <u>Activation point</u> detects a passing train that approaches the <u>Level Crossing</u> .
Eu.Glo.800	Info	Barrier		A movable obstacle which is placed across the roadway to deter road traffic and pedestrians from using the level crossing.
Eu.Glo.1927	Info	Deactivation point		The <u>Deactivation point</u> detects a passing train for vacating the <u>Level Crossing</u> .
Eu.Glo.906	Info	Level Crossing		Crossing of railway and a road at the same level protected with a level crossing protection facility. Note: A crossing of railway and a road in the topological/functional view is known as 'Track crossing' in EULYNX Data Preparation.
Eu.Glo.1475	Info	Level Crossing protection area		The <u>Level Crossing protection area</u> is the danger zone of the <u>Level Crossing</u> .
Eu.Glo.1477	Info	Obstacle detector		The <u>Obstacle detector</u> informs whether the <u>Level Crossing protection area</u> is clear of obstacles when the Barriers are closed.
Eu.Glo.1478	Info	Protection signal		The <u>Protection signal</u> is a signal controlling access to the <u>Level Crossing</u> and is commanded by the <u>Subsystem - Electronic Interlocking</u> .
Eu.Glo.1479	Info	Road signal		The <u>Road signal</u> is a signal providing warning to the road users crossing the tracks.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1945	Info	Track crossing		EULYNX Data Preparation uses the term <u>Track crossing</u> to refer to the topological/functional view of a <u>Level Crossing</u> . This term is not used in the EULYNX specifications.
Eu.Glo.1116	Head	2.1.11 SCI-P		
Eu.Glo.815	Info	Command point		Command from the <u>Subsystem - Point</u> to <u>Point machine</u> to move to the <u>Point</u> to the <u>Commanded point position</u> .
Eu.Glo.816	Info	Commanded point position		<u>Point position</u> command sent from the <u>Subsystem - Electronic Interlocking</u> to <u>Subsystem - Point</u> .
Eu.Glo.840	Info	Detection voltage		Voltage applied to <u>Point detector</u> for monitoring the <u>Point detection</u> status.
Eu.Glo.848	Info	Drive voltage		Voltage that operates a <u>Point machine</u> .
Eu.Glo.1875	Info	End position		Proof that <u>Point</u> is in either the left or right position.
Eu.Glo.1038	Info	Failed Movement		Situation in which the movement of the <u>Point</u> to an <u>End position</u> could not be completed successfully.
Eu.Glo.933	Info	Moving		Status of the <u>Point</u> and <u>Point machine</u> when operating to move <u>Point</u> to a position. Note: EULYNX Data Preparation uses Throwing as a term for moving of a point.
Eu.Glo.1876	Info	No end position		The <u>Point</u> is neither in an ' <u>End position</u> ' nor in a ' <u>Unintended position</u> '. Note: In certain implementations, the Subsystem – Point may prove that the <u>Point</u> is in a position that is neither the left or right position, e.g. when the Subsystem – Point does not detect ' <u>Unintended position</u> '.
Eu.Glo.963	Info	Point		Assembly of rails, blades, and of auxiliaries, certain ones being movable, which effect the tangential branching of tracks and allows to run over either one track or another. Includes a <u>Point machine</u> and <u>Point detector</u> .
Eu.Glo.966	Info	Point detector		A device inside the <u>Point machine</u> used for detecting the position of a <u>Point</u> .
Eu.Glo.1877	Info	Point position		One of the following: ' <u>End position</u> ', ' <u>No end position</u> ' or ' <u>Unintended position</u> '.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.979	Info	Redrive point		Operation controlled by <u>Subsystem - Point</u> that moves the <u>Point</u> to the last <u>Commanded point position</u> when the <u>Commanded point position</u> is lost.
Eu.Glo.987	Info	Reversing		While moving a <u>Point</u> in a <u>Commanded point position</u> , a new <u>Commanded point position</u> is received to the alternative position.
Eu.Glo.1946	Info	Throwing a point		EULYNX Data Preparation uses the throwing as a term where moving of a point is used in the EULYNX specifications.
Eu.Glo.1045	Info	Trailable point		A <u>Point</u> that can be 'run through' in trailing direction without damage to the <u>Point</u> or <u>Point machine</u> .
Eu.Glo.1966	Info	Trailing		The act of a rail vehicle running through a <u>Point</u> against the set <u>End position</u> , during which the <u>Moveable components</u> are forced out of position.
Eu.Glo.1046	Info	Unintended position		Proof that the <u>Point</u> is in a position that does not correspond to the commanded position. This may be caused by <u>Trailing</u> . Note: In certain implementations of the Subsystem – Point, this position may be considered as 'No end position'.
Eu.Glo.1125	Head	2.1.12 SCI-RBC		
Eu.Glo.1140	Info	End Of Authority	EoA	Location to which the train is authorised to proceed and where the target speed is zero.
Eu.Glo.1131	Info	Movement authority	MA	Permission for a train to run to a specific location within the constraints of the infrastructure. For further information about movement authority please refer to UNISIG-Subset-026, chapter 3.
Eu.Glo.1005	Info	Shunting mode	SH	An ERTMS/ETCS on-board equipment operating mode which allows the train to move in shunting, without available train data.
Eu.Glo.1120	Head	2.1.13 SCI-TDS		
Eu.Glo.797	Info	Axle count evaluation unit	ACEU	The component of the <u>Axle counting system</u> , evaluating the information from the connected detection points and determining the occupancy status of the corresponding <u>TVP section</u> .

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1947	Info	Axle counting head		EULYNX Data Preparation uses the term Axle counting head for a Detection Point in the context of the Subsystem - Train Detection System, where Detection Point is used in the EULYNX specifications. In the scope of EULYNX Data Preparation, the term Detection Point may describe other technical components that are used to detect passings of vehicles, not connected to the Subsystem - Train Detection System.
Eu.Glo.798	Info	Axle counting system	ACS	A system using <u>Detection points</u> and an axle count evaluation unit which detects the occupancy of a <u>TVP section</u> by comparing the number of axles which enter the section with the number of axles which leave the section.
Eu.Glo.833	Info	Delay of notification of availability		A configurable delay of reporting vacant from the <u>Subsystem - Train Detection System</u> to the <u>Subsystem - Electronic Interlocking</u> , following the state change of a <u>TVPS</u> from occupied to vacant. The delay of notification is only effective if the state change was triggered by a train not by a FC-command. The delay is configured for short sections to ensure correct route releasing by the train.
Eu.Glo.839	Info	Detection point		Track mounted component of the axle counting system, detecting the passage and direction of axles from moving vehicles and transmitting the detected information to the axle count evaluation unit. Note: Outside of the scope of the Subsystem - Train Detection System, the term Detection Point may describe other technical components that are used to detect passings of vehicles. EULYNX Data Preparation uses the term Axle counting head for a Detection Point in the context of the Subsystem - Train Detection System.
Eu.Glo.845	Info	Disable restriction to force section to clear	DRFC	An auxiliary operation which removes the restriction to force section to clear.
Eu.Glo.873	Info	Filling level		The number of axles in a <u>TVPS</u> , determined by the axle count evaluation unit with evaluation of all corresponding <u>Detection point</u> .
Eu.Glo.876	Info	Force section status to clear	FC	The process of setting the occupancy status of a <u>TVP section</u> equipped with an <u>Axle counting system</u> from the status occupied or disturbed to vacant.
Eu.Glo.877	Info	Force section status to clear, conditional	FC-C	Conditional forcing of the <u>TVP section</u> to the status vacant, dependant on restriction status.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.878	Info	Force section status to clear, preparatory	FC-P	Type of forcing of the <u>TVP section</u> to the status vacant, where the axle count value is immediately set to 0, while the <u>TVP section</u> status is set to vacant either after the correct passage of a vehicle or after an acknowledgement received from the <u>Maintainer</u> .
Eu.Glo.879	Info	Force section status to clear, preparatory, with acknowledgement	FC-P-A	Type of forcing of the <u>TVP section</u> to the status vacant, where the axle count value is immediately set to 0, while the <u>TVP section</u> status is set to vacant either after the correct passage of a vehicle or after an acknowledgement received from the <u>Maintainer</u> and an acknowledgement received from the <u>Interlocking</u> system.
Eu.Glo.880	Info	Force section status to clear, unconditional	FC-U	Unconditional forcing of the <u>TVP section</u> to the status vacant.
Eu.Glo.1951	Info	Inhibition Timer		The Inhibition Timer is a configurable delay, defining the duration between the detection of a passing for a TVPS (incoming wheel, outgoing wheel or uninterpretable pattern) and the moment that the state of a TVPS is considered stable. Until expiration of this timer, all commands to the TVPS are rejected.
Eu.Glo.934	Info	Negative axle count		The axle count value in a <u>TVP section</u> , when the difference between the entering and exiting axles is negative.
Eu.Glo.949	Info	Operational disturbance		A detected error in the counting process or pattern evaluation.
Eu.Glo.1892	Info	Power Off Monitoring	POM	Device used to detect the failure of the <u>Power supply</u> for one or multiple <u>TVP sections</u> . This device is used with <u>Track circuit</u> detection to distinguish between real occupancy and occupancy caused by a <u>Power supply</u> failure.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1133	Info	Restriction to force section to clear		<p>The status of a <u>TVP section</u> which restricts the forcing of section to clear, if the last counting operation was an entering axle. The restriction to <u>Force section status to clear</u> is possible for the <u>TVPS</u> occupancy status 'occupied', and, depending on the <u>Engineering Data</u> of the <u>Subsystem - Train Detection System</u>, also for the <u>TVPS</u> occupancy status 'disturbed (reason operational)'.</p> <p>The TVPS will report as not able to be forced to clear if:</p> <ul style="list-style-type: none"> • the last counting action was an incoming wheel, • the TVPS is vacant, • an unsuccessful sweeping train is detected while the execution of a FC-P or FC-P-A command in state occupied or • a critical failure of the TVPS occurred.
Eu.Glo.1949	Info	TDS section		<p>Logical section controlled by a Train Detection System that is associated with a <u>TVP section</u>.</p> <p>EULYNX Data Preparation uses the term <u>TDS section</u> to refer to the association of a <u>TVP section</u> with a Train detection system. This term is not used in the EULYNX specifications, which uses <u>TVP section</u> instead.</p>
Eu.Glo.1041	Info	Track circuit		Device in the track used for track vacancy proving using short-circuiting of the rails.
Eu.Glo.1895	Info	Train Detection point	TDP	<p>The function which reports the passing of a train, using a Detection point. It can be used for activation of level crossings or hot box detectors and further functions.</p> <p>Depending on configuration, the TDP can report for a given direction or all directions.</p>
Eu.Glo.1048	Info	Train detection system	TDS	A system which determines the occupancy status of <u>TVP sections</u> . Train detection system may be a <u>Track circuit</u> or an <u>Axle counting system</u> .
Eu.Glo.1054	Info	TVP boundary		The boundary of a particular <u>TVP section</u> . In case a Train detection system is installed, the position of the detecting apparatus defines the <u>TVP boundary</u> .

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1055	Info	TVP section	TVPS	A section of track that must be proven vacant for safe train operations. The Interlocking system can recognise the occupancy status by means of a Train detection system. Vacancy proving can also be accomplished by procedure if no Train detection system is installed.
Eu.Glo.1056	Info	TVP section, occupancy		The status of a <u>TVP section</u> indicating the presence of a rail vehicle.
Eu.Glo.1057	Info	TVP section, vacancy		The status of a <u>TVP section</u> indicating the lack of presence of rail vehicles.
Eu.Glo.1043	Info	Track vacancy proving	TVP	The function which proves that a defined section of track is vacant.
Eu.Glo.1948	Info	Vehicle Passage Detector		Line-side device for detecting passage of a rail vehicle. If a Vehicle Passage Detector is integrated in the Subsystem - Train Detection System, it is functionally described as a 'Train Detection Point' in the EULYNX specifications. In the scope of EULYNX Data Preparation, the term Vehicle Passage Detector may describe other technical components that are used to detect passings of vehicles, not connected to the Subsystem - Train Detection System.
Eu.Glo.1874	Head	2.1.14 Systems Engineering		
Eu.Glo.805	Info	Block Definition Diagram	BDD	Is a SysML language element.
Eu.Glo.1077	Info	Change request	CR	Request to change an artefact created during the application of the systems engineering process.
Eu.Glo.899	Info	Internal block diagram	IBD	(a SysML language element)
Eu.Glo.924	Info	Model-based systems engineering	MBSE	<u>MBSE</u> is the formalised application of modelling to support system requirements, design, analysis, verification, and validation activities beginning in the conceptual design phase and continuing throughout development and later lifecycle phases. It emphasizes the use of models to perform the systems engineering activities that have traditionally been performed using the document-based approach. With MBSE, the output of the systems engineering activities is a coherent model of the system (i.e., system model) that is part of the engineering baseline, and the emphasis is placed on defining and evolving the model using model-based methods and tools.

ID	Type	Term	Abbreviation	Definition
Eu.Glo.1081	Info	Systems Engineering	SE	"Systems Engineering is an interdisciplinary approach and means to enable the realization of successful systems. It focuses on defining customer needs and required functionality early in the development cycle, documenting requirements, then proceeding with design synthesis and system validation while considering the complete problem [...]" (source: http://www.incose.org/AboutSE/WhatIsSE)
Eu.Glo.1037	Info	Systems Modeling Language	SysML	Standardised modelling language for the modelling of complex systems.
Eu.Glo.1059	Info	Unified Modeling Language	UML	Graphical modelling language for the specification and documentation of software and other systems.
Eu.Glo.1935	Head	2.1.15 Security		
Eu.Glo.1936	Info	Connection Manager		The connection manager may be added as part of the Subsystem - Electronic Interlocking and may provide the following features: 1. Support of migration or coexistence of different variants and of different releases concerning security (encryption, integrity protection, ...) over the time. 2. Support of migration or coexistence of different SCI/PDI versions, offloading this task from the EIL. 3. Breaking TLS connection at a defined point, either to off-load TLS load from EIL or to monitor/gather encrypted network traffic (used for Application Layer Firewalls or Intrusion Detection Systems (IDS)). 4. Support of non-EULYNX devices during migration to a pure EULYNX environment (this is not in scope of EULYNX).
Eu.Glo.1942	Info	Reliability, Availability, Maintainability, Safety and Security	RAMSS	Term used to refer to the following 5 aspects collectively: Reliability, Availability, Maintainability, Safety and Security.