

Resource - ethernetport

About this Resource

The **Ethernet Port Table** resource controls the SBC Edge system's ethernet port configuration settings.

REST API Methods for this Resource

- GET ethernetport
- GET ethernetport id
- POST ethernetport id
- DELETE ethernetport id
- GET ethernetport historicalstatistics
- GET ethernetport historicalstatistics id

Resource Schema

Configuration

Parameter Name	Required	Service Affecting	Data Type	Default Value	Possible Values	Description
ConfigIEState	No	Yes	Enum	1	Possible values: <ul style="list-style-type: none">• 0 - esDISABLED• 1 - esENABLED	Specifies the Administrative State of the resource.
ifName	Yes	No	string	none	20 - Max Length	Is the name of the port or logical IP interface. This read-only attribute.
ifAlias	No	No	string	none	20 - Max Length	Assigns an alternative name for the interface; typically configured by the SNMP-based Network Manager. This parameter is unique among all the interfaces known to the SNMP Network Manager. The value cannot have whitespace characters.
ifType	No	No	Enum	0	Possible values: <ul style="list-style-type: none">• 0 - IF_TYPE_ETHERNET• 1 - IF_TYPE_VLAN• 2 - IF_TYPE_QINQ• 3 - IF_TYPE_BONDED• 4 - IF_TYPE_BRIDGE	Specifies the interface type.
ifDescription	No	No	string	none	64 - Max Length	Assigns an operator-friendly description text configured for the operator for future reference. Whitespaces allowed.
ifNetworkingMode	No	No	Enum	0	Possible values: <ul style="list-style-type: none">• 0 - IF_NETWORK_MODE_SWITCH• 1 - IF_NETWORK_MODE_ROUTE	Specifies if the port is in switched mode or routed mode.

ifFrameType	No	Yes	Enum	0	Possible values: <ul style="list-style-type: none"> 0 - IF_FRAME_TYPE_ALL 1 - IF_FRAME_TYPE_UNTAGGED 2 - IF_FRAME_TYPE_TAGGED 	Specifies the types of frame allowed when in switch mode.
ifDefaultVlan	No	Yes	string	none	8 - Max Length	Specifies the default VLAN of the port is member. of format (portname:defaultvlanid) (max= (32:4095))
ifHybridVlan	No	Yes	string	none	256 - Max Length	Specifies the list of VLANs be associated with a port hybrid state. of the format "(port name id:vlanid),(port name id:vlanid)...." Range of VLAN is 1-4095
ipAddressingMode	No	No	Enum	0	Possible values: <ul style="list-style-type: none"> 0 - IPV4_ADDR_MODE 1 - IPV6_ADDR_MODE 2 - IPV4_AND_IPV6 	Specifies the addressing mode. Can be IPv4, IPv6, or both
ifIpAddrAssignMethod	No	Yes	Enum	0	Possible values: <ul style="list-style-type: none"> 0 - IP_ADDRESS_STATIC 1 - IP_ADDRESS_DYNAMIC 	Specifies whether IP address assignment is static or dynamic (i.e. via DHCP). If dynamic is specified, certain node-level settings (i.e. DNS servers, DNS servers, and Domain Name) will be configured such that they obtain their values through DHCP. This is achieved by setting useDynamicNetSettings true in the System Management object. In addition to this, statically configured default routes will be removed from the system. If static is specified, and no other interface is using dynamic, the useDynamicNetSettings will be set to false and the node-level network attributes will be set to use the use configured values.
ifIPv4AddressPrimary	Yes	Yes	string	none	16 - Max Length	Specifies the primary IP address for the interface
ifIPv4AddressPrimaryMask	Yes	Yes	string	none	16 - Max Length	Specifies the primary netmask for the interface
ifIPv4ConfigSecondaryEnabled	No	Yes	Enum	0	Possible values: <ul style="list-style-type: none"> 0 - btFalse 1 - btTrue 	Determines if the port has secondary IP address configuration. If this field set to Yes , a secondary address and secondary Netmask must be configured
ifIPv4AddressSecondary	No	Yes	string	none	16 - Max Length	Specifies the secondary address for the interface

ifIPv4AddressSecondaryMask	No	Yes	string	none	16 - Max Length	Specifies the secondary netmask for the interface
ifIPv6AddressPrimary	Yes	Yes	string	none	45 - Max Length	Specifies the primary IPv6 address for the interface
ifIPv6AddressPrimaryPrefix	No	Yes	int	64	Possible values: <ul style="list-style-type: none"> • 1 - Minimum • 127 - Maximum 	Specifies the primary IPv6 network prefix length for interface.
ifBridgeGroupId	Yes	Yes	int	1	Possible values: <ul style="list-style-type: none"> • 0 - Minimum • 5 - Maximum 	Configures the bridge group that the Ethernet port will be part of. If it's a logical interface, it must be 0. If hardware interface, the default should be 1.
ifConfiguredSpeed	No	Yes	Enum	2	Possible values: <ul style="list-style-type: none"> • 0 - IF_SPEED_10 • 1 - IF_SPEED_100 • 2 - IF_SPEED_1000 • 3 - IF_SPEED_AUTO 	Configures autonegotiation or a specific speed for the Ethernet port. The default value should be changed only when absolutely necessary. <ul style="list-style-type: none"> • When AUTO is selected <ul style="list-style-type: none"> - the speed is automatically negotiated by the Ethernet port and the negotiated speed is reported under Negotiated Speed. • When AUTO is not selected <ul style="list-style-type: none"> - the Ethernet speed-auto-negotiation is disabled and the operator must configure a specific speed for the Ethernet port. If the configured speed does not match the attached device, the interface becomes unreachable. The node may become unreachable on using the same interface for management.

ifConfiguredDuplexity	No	Yes	Enum	2	<p>Possible values:</p> <ul style="list-style-type: none"> • 0 - IF_DUPLEX_HALF • 1 - IF_DUPLEX_FULL • 2 - IF_DUPLEX_AUTO 	<p>Configures auto-negotiation or a specific value for the duplexity of the Ethernet port. The default value should be changed only when absolutely necessary.</p> <ul style="list-style-type: none"> • When AUTO is selected <ul style="list-style-type: none"> - the duplexity is automatically negotiated by the Ethernet port. The negotiated duplexity is reported under Configured Speed. • When AUTO is not selected <ul style="list-style-type: none"> - the Ethernet duplexity must be explicitly configured. If the configured duplexity does not match the attached device, the interface will become unreachable. The interface may become unreachable on using the same interface for management.
ifIPv4ConfigPrimaryEnabled	No	No	Enum	1	<p>Possible values:</p> <ul style="list-style-type: none"> • 0 - IF_PRIMARY_IP_NOT_CONFIGURED • 1 - IF_PRIMARY_IP_CONFIGURED 	Specifies whether the primary IP address is enabled or not.
OSPFDeadInterval	No	Yes	int	40	<p>Possible values:</p> <ul style="list-style-type: none"> • 10 - Minimum • 600 - Maximum 	Specifies the time interval in seconds during which no hello packets are received and after which a neighbor is declared dead.
OSPFHelloInterval	No	Yes	int	10	<p>Possible values:</p> <ul style="list-style-type: none"> • 10 - Minimum • 600 - Maximum 	Specifies the time interval in seconds between hello packets.
OSPFPriority	No	Yes	int	1	<p>Possible values:</p> <ul style="list-style-type: none"> • 0 - Minimum • 255 - Maximum 	Specifies the router priority to determine the DR (designated router) for the network.
OSPFCost	No	Yes	int	1	<p>Possible values:</p> <ul style="list-style-type: none"> • 1 - Minimum • 600 - Maximum 	Specifies the cost of the link-state metric in a router-LSA.
OSPFRetransmitInterval	No	Yes	int	5	<p>Possible values:</p> <ul style="list-style-type: none"> • 5 - Minimum • 600 - Maximum 	Specifies the time in seconds between link-state advertisement (LSA) retransmissions for adjacencies belonging to the interface.

OSPFResyncTimeout	No	Yes	int	40	Possible values: <ul style="list-style-type: none"> • 10 - Minimum • 600 - Maximum 	Specifies the time interval in seconds after which adjacency is reset if out-of-band resynchronization has not occurred. The interval period starts from the time a reset signal is received from a neighbor.
aclInInstanceID	No	Yes	int	0		Specifies the ACL instance applied on this interface for the incoming traffic.
aclOutInstanceID	No	Yes	int	0		Specifies the ACL instance applied on this interface for the outgoing traffic.
aclForwardInstanceID	No	Yes	int	0		Specifies the ACL instance applied on this interface for the forwarding traffic.
ipv6AclInInstanceID	No	Yes	int	0		Specifies the IPv6 ACL instance applied on this interface for the incoming traffic.
ipv6AclOutInstanceID	No	Yes	int	0		Specifies the IPv6 ACL instance applied on this interface for the outgoing traffic.
ipv6AclForwardInstanceID	No	Yes	int	0		Specifies the IPv6 ACL instance applied on this interface for the forwarding traffic.
ifMstpStatus	No	Yes	Enum	0	Possible values: <ul style="list-style-type: none"> • 0 - IF_NOT_REDUNDANT • 1 - IF_MSTP • 2 - IF_FAILOVER • 3 - IF_UNSPECIFIED 	Specifies the MSTP status on this interface. This field is obsolete from release 7.0 onwards and is replaced by 'ifRedundancy'.
ifRedundancy	No	Yes	Enum	3	Possible values: <ul style="list-style-type: none"> • 0 - IF_NOT_REDUNDANT • 1 - IF_MSTP • 2 - IF_FAILOVER • 3 - IF_UNSPECIFIED 	Specifies whether the interface is redundant, and so whether it uses MSTP Failover mode.
gigabitTimingMode	No	No	Enum	0	Possible values: <ul style="list-style-type: none"> • 0 - AUTO • 1 - MASTER • 2 - SLAVE 	Controls gigabit timing mode on the interface. This should be left to "Auto" unless a interoperability issue requires setting the mode to either Slave or Master. This field is only applicable if the configured port speed is either Auto or 1000 mbps.

DHCPSuppliedParamUsage	No	Yes	Enum	0	<p>Possible values:</p> <ul style="list-style-type: none"> • 0 - USE_ALL • 1 - USE_IP_ONLY • 2 - USE_IP_DNS_ONLY 	<p>Determines how the SBC should use the parameters supplied by the DHCP server, when a logical interface is configured with Dynamic IP addressing.</p> <ul style="list-style-type: none"> • USE_ALL - all supported DHCP parameters are used by the SBC. The supplied DNS servers are used as global DNS servers replacing the ones already configured. Split-DNS settings are not affected. • USE_IP_ONLY - only the IP address and netmask are used by the SBC. DNS server and other settings are ignored. Split-DNS settings already in place are not affected. • USE_IP_DNS_ONLY - only the IP address, domain-name and DNS server IP addresses are used by the SBC. The supplied domain-name and the DNS server addresses are used depending on the value of the ConfigureSplitDNS attribute.
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ConfigureSplitDNS	No	Yes	Enum	0	Possible values: <ul style="list-style-type: none"> • 0 - btFalse • 1 - btTrue 	<p>Determines whether the should create split-DNS settings automatically for the DNS and domain name parameters supplied by the DHCP server on this logical IP interface. This field is only if DHCPSuppliedParameters is set to the value "USE_IP_DNS_ONLY".</p> <ul style="list-style-type: none"> • TRUE - SBC configures split-DNS settings by adding one row for each combination of the domain-name and the DNS-server, from the lists supplied by the DHCP server. When the DHCP-lease expires, the split-DNS settings are also automatically removed. • FALSE - SBC configures the IP address and netmask for the logical interface and uses the DNS server/domain-name parameters as global settings. Split-DNS settings are not automatically added when a lease is renewed. If any split-DNS settings have been added, they are removed.
ifRedundantPort	No	No	Enum	0	Possible values: <ul style="list-style-type: none"> • 0 - IF_NONE • 1 - IF_ETHERNET_1 • 2 - IF_ETHERNET_2 • 3 - IF_ETHERNET_3 • 4 - IF_ETHERNET_4 	Selects which Ethernet port is the redundant port. This can only be configured when 'ifMstpStatus' is set to 'Failover'.

Runtime

Parameter Name	Description	Data Type	Possible Values
rt_ifSpeed	An estimate of the interface's current bandwidth in bits per second.	Enum	Possible values: <ul style="list-style-type: none"> • 0 - IF_SPEED_10 • 1 - IF_SPEED_100 • 2 - IF_SPEED_1000 • 3 - IF_SPEED_AUTO

rt_ifDuplexity	The current duplexity of the interface.	Enum	Possible values: <ul style="list-style-type: none"> • 0 - IF_DUPLEX_HALF • 1 - IF_DUPLEX_FULL • 2 - IF_DUPLEX_AUTO
rt_ifLastChange	The value of sysUpTime at the time the interface entered its current operational state.	long	
rt_ifHwConnectorType	The SFP type for this interface. Currently all interfaces are copper.	Enum	Possible values: <ul style="list-style-type: none"> • 0 - IF_HW_TYPE_COPPER • 1 - IF_HW_TYPE_SFP
rt_ifCableMediaType	The cable type for this interface. Currently all interfaces are copper.	Enum	Possible values: <ul style="list-style-type: none"> • 0 - IF_MED_TYPE_COPPER • 1 - IF_MED_TYPE_FIBER_SM • 2 - IF_MED_TYPE_FIBER_MM
rt_ifOperatorStatus	The operational status of the interface.	Enum	Possible values: <ul style="list-style-type: none"> • 0 - IF_OPER_UP • 1 - IF_OPER_DOWN
rt_ifMtu	The size of the largest packet which can be sent/received on the interface.	int	
rt_ifCounterDiscontinuityTime	The value of sysUpTime on the most recent occasion at which any one or more of this interface's counters suffered a discontinuity.	long	
rt_ifName	Is the name of the ethernet port or logical interface.	string	
rt_ifIPv4Address	The IPv4 address assigned to the interface. Only valid for interfaces with their assign method set to dynamic.	string	
rt_ifIPv4Netmask	The IPv4 netmask assigned to the interface. Only valid for interfaces with their assign method set to dynamic.	string	
rt_ifIPv6Address	The primary IPv6 address assigned to the interface.	string	
rt_ifIPv6Prefix	The primary IPv6 prefix assigned to the interface.	int	
rt_ifIPv6LinkLocalAddress	The Link Local IPv6 address assigned by the system to the interface.	string	
rt_ifIPv6LinkLocalPrefix	The Link Local IPv6 prefix assigned by the system to the interface.	int	

rt_stpBpduVersionReceived	The Spanning Tree Protocol BPDU version received on this port.	Enum	Possible values: <ul style="list-style-type: none"> • 0 - STP_VERSION_NONE • 1 - STP_VERSION_STP • 2 - STP_VERSION_RSTP • 3 - STP_VERSION_MSTP
rt_stpBpduVersionTransmitted	The Spanning Tree Protocol BPDU version transmitted on this port.	Enum	Possible values: <ul style="list-style-type: none"> • 0 - STP_VERSION_NONE • 1 - STP_VERSION_STP • 2 - STP_VERSION_RSTP • 3 - STP_VERSION_MSTP
rt_redundancyRole	When redundancy is configured for "Failover", indicates if it's role is "Primary" or "Secondary".	Enum	Possible values: <ul style="list-style-type: none"> • 0 - IF_PRIMARY • 1 - IF_SECONDARY
rt_redundancyState	When redundancy is configured for "Failover", indicates if it's state is "Online" or "Backup".	Enum	Possible values: <ul style="list-style-type: none"> • 0 - IF_ONLINE • 1 - IF_BACKUP

Statistics

Parameter Name	Description	Data Type	Possible Values
rt_ifInUcastPkts	Displays the number of received unicast packets on this port.	long	
rt_ifInBroadcastPkts	Displays the number of received broadcast packets on this port.	long	
rt_ifInMulticastPkts	Displays the number of received multicast packets on this port.	long	
rt_ifInOctets	Displays the number of received octets on this port.	long	
rt_ifInErrors	Displays the number of errors detected on this port.	long	
rt_ifInDiscards	Displays the number of discard errors detected on this port.	long	
rt_ifInUnknwnProto	Displays the number of Unknown Protocol errors detected on this port.	long	
rt_ifInUndersizedPkts	Displays the number of Undersized Packet errors detected on this port.	long	
rt_ifInOverSizedPkts	Displays the number of Oversized Packet errors detected on this port.	long	
rt_ifInFCSErrors	Displays the number of discard Frame Check Sequence errors detected on this port.	long	
rt_ifInAlignErrors	Displays the number of Align errors detected on this port.	long	
rt_ifInFragmentedPkts	Displays the number of Fragmented Packet errors detected on this port.	long	
rt_ifOutUcastPkts	Displays the number of transmitted unicast packets on this port.	long	
rt_ifOutOctets	Displays the number of transmitted octets on this port.	long	
rt_ifOutBroadcastPkts	Displays the number of transmitted broadcast packets on this port.	long	

rt_ifOutMulticastPkts	Displays the number of transmitted multicast packets on this port.	long	
rt_ifOutErrors	Displays the number of errors detected on this port.	long	
rt_ifOutDiscards	Displays the number of discard errors detected on this port.	long	
rt_ifOutLateCollissions	Displays the number of Late Collision errors detected on this port.	long	
rt_ifOutDeferredTransmissions	Displays the number of Deferred Transmission errors detected on this port.	long	