802.1CB-2017-Rev
Issues in the specifications of some Stream identification function parameters

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IP Stream identification function

- The IP Stream identification function is a « passive » Stream identification function (6.7). However, its *tsnCpeIpIdTagged* parameter is specified as for an « active » Stream identification function.
  - See next slide
- The *tsnCpeIpIdVlan* parameter has a different semantic compared to the *tsnCpeXxYyZzVlan* parameter of the other Stream identification functions
  - A value of 0 indicates that the received frame « is not to have a VLAN tag » i.e., is untagged.
  - This can be interpreted as a way to explicitely distinguish untagged frames when the *tsnCpeIpIdTagged* parameter is set to « priority » or « all »
  - … whereas for all other Stream identification functions, *tsnCpeXxYyZzVlan*=0 indicates that the vlan_identifier parameter provided by the EISS indication primitive is ignored.
- If the semantic is kept as is, a note may be added to indicate that:
  - The combination *tsnCpeIpIdTagged* = « tagged » and *tsnCpeIpIdVlan* = 0 is inconsistent
  - Tagged frames with VLAN-ID=0 cannot be matched
- Or… do we want to change this semantic ?

Text in 802.1CB-2017

- **Cl. 9.1.4.2 tsnCpeDmacVlanDownTagged**

An enumerated value indicating whether a packet in an EISS indication or request primitive between the Active Destination MAC and VLAN Stream identification function and the lower layers is to have a VLAN tag. It can take the following values:

1) **tagged:** An input frame must have a VLAN tag to be recognized as belonging to the Stream. An output frame receives a VLAN tag.

2) **priority**: A frame must be untagged, or have a VLAN tag with a VLAN ID = 0 to be recognized as belonging to the Stream. An output frame is marked with a VLAN tag with VLAN ID = 0.

3) **all**: A frame is recognized as belonging to the Stream whether tagged or not. An output frame is to be untagged.

Cl. 9.1.4.3 tsnCpeDmacVlanDownVlan

Specifies the vlan_identifier parameter to use in the EISS request primitive for output packets sent to lower layers by the Active Destination MAC and VLAN Stream identification function, and the vlan_identifier that identifies an input packet in an EISS indication primitive to the Active Destination MAC and VLAN Stream identification function. A value of 0 indicates that the vlan_identifier parameter is ignored on EISS indication primitives.

- **Cl. 9.1.5.2 tsnCpeIpIdTagged**

An enumerated value indicating whether a packet in an EISS indication or request primitive to the IP Stream identification function is to have a VLAN tag. It can take the following values:

1) **tagged:** An input frame must have a VLAN tag to be recognized as belonging to the Stream. An output frame receives a VLAN tag.

2) **priority:** A frame must be untagged, or have a VLAN tag with a VLAN ID = 0 to be recognized as belonging to the Stream. An output frame is marked with a VLAN tag with VLAN ID = 0.

3) **all:** A frame is recognized as belonging to the Stream whether tagged or not. An output frame is to be untagged.

Cl. 9.1.5.3 tsnCpeIpIdVlan

Specifies the vlan_identifier parameter that identifies a packet in an EISS indication primitive. A value of 0 indicates that the frame is not to have a VLAN tag.

- If the *tsnCpeXxYyZzVlan* parameter has a value of 0, the vlan_identifier parameter provided by the EISS indication primitive is ignored.
  - To the understanding of the editor, this « escape » value does not cause any inconsistent combination with the *tsnCpeXxYyZzTagged* parameter
  - When a frame is tagged, i.e. the vlan_identifier parameter is present in the EISS primitive, it is not used as an input parameter by the Stream identification function if its *tsnCpeXxYyZzVlan* parameter has a value of 0.

- The frames carrying a VLAN-ID of 0 are to be matched using *tsnCpeXxYyZzTagged* = « priority »
- A note may be added to indicate that:
  - when the *tsnCpeXxYyZzTagged* parameter is set to « all » or « tagged », the tagged frames carrying a VLAN-ID of 0 cannot be matched
  - the matching of tagged frames carrying a VLAN-ID of 0 is achieved by setting the *tsnCpeXxYyZzTagged* parameter to « priority ».
    - … forcing the *tsnCpeXxYyZzVlan* parameter to be ignored

- **Cl. 9.1.2.2 tsnCpeNullDownTagged**

An enumerated value indicating whether a packet in an EISS indication primitive to the Null Stream identification function is permitted to have a VLAN tag. It can take the following values:

1) **tagged:** A frame must have a VLAN tag to be recognized as belonging to the Stream.
2) **priority:** A frame must be untagged, or have a VLAN tag with a VLAN ID = 0 to be recognized as belonging to the Stream.
3) **all:** A frame is recognized as belonging to the Stream whether tagged or not.

Cl. 9.1.2.3 tsnCpeNullDownVlan

Specifies the vlan_identifier parameter that identifies a packet in an EISS indication primitive to the Null Stream identification function. A value of 0 indicates that the vlan_identifier parameter is ignored on EISS indication primitives

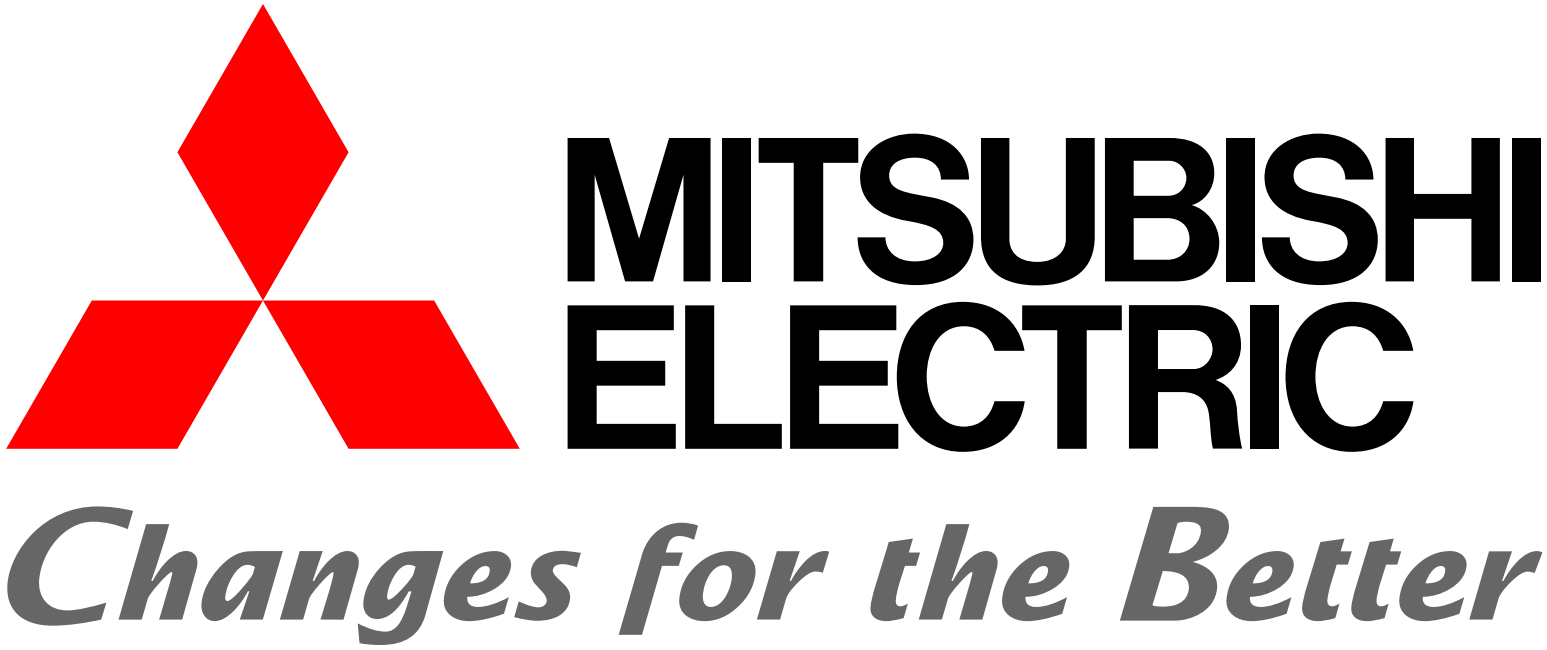
- **Cl. 9.1.3.2 tsnCpeSmacVlanDownTagged**

An enumerated value indicating whether a packet in an EISS indication primitive to the Source MAC and VLAN Stream identification function is permitted to have a VLAN tag. It can take the following values:

1) **tagged**: A frame must have a VLAN tag to be recognized as belonging to the Stream.
2) **priority**: A frame must be untagged, or have a VLAN tag with a VLAN ID = 0 to be recognized as belonging to the Stream.
3) **all**: A frame is recognized as belonging to the Stream whether tagged or not.

Cl. 9.1.3.3 tsnCpeSmacVlanDownVlan

Specifies the vlan_identifier parameter that identifies a packet in an EISS indication primitive to the Source MAC and VLAN Stream identification function. A value of 0 indicates that the vlan_identifier parameter is ignored on EISS indication primitives.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