

IEEE P1722 AVBTP Possible Stream ID Encapsulations

Version 0.01, 2007-09-21

Alan K. Bartky alan@bartky.net

Bartky Networks www.bartky.net

Send comments to AVBTP@listserv.ieee.org

Notice of copyright release

- **Notice:**

- This document has been prepared to assist the work of the IEEE P1722 and IEEE 802 Working Groups. It is offered as a basis for discussion and is not binding on the contributing individual(s) or organization(s). The material in this document is subject to change in form and content after further study. The contributor(s) reserve(s) the right to add, amend or withdraw material contained herein.

- **Copyright Release to IEEE:**

- The contributor grants a free, irrevocable license to the IEEE to incorporate material contained in this contribution, and any modifications thereof, in the creation of an IEEE Standards publication; to copyright in the IEEE's name any IEEE Standards publication even though it may include portions of this contribution; and at the IEEE's sole discretion to permit others to reproduce in whole or in part the resulting IEEE Standards publication. The contributor also acknowledges and accepts that this contribution may be made public by the IEEE P1722 Working Group or the IEEE 802 Working Group.

Revision History

Rev	Date	Comments
0.01	2007-09-21	First version for discussion/comments.

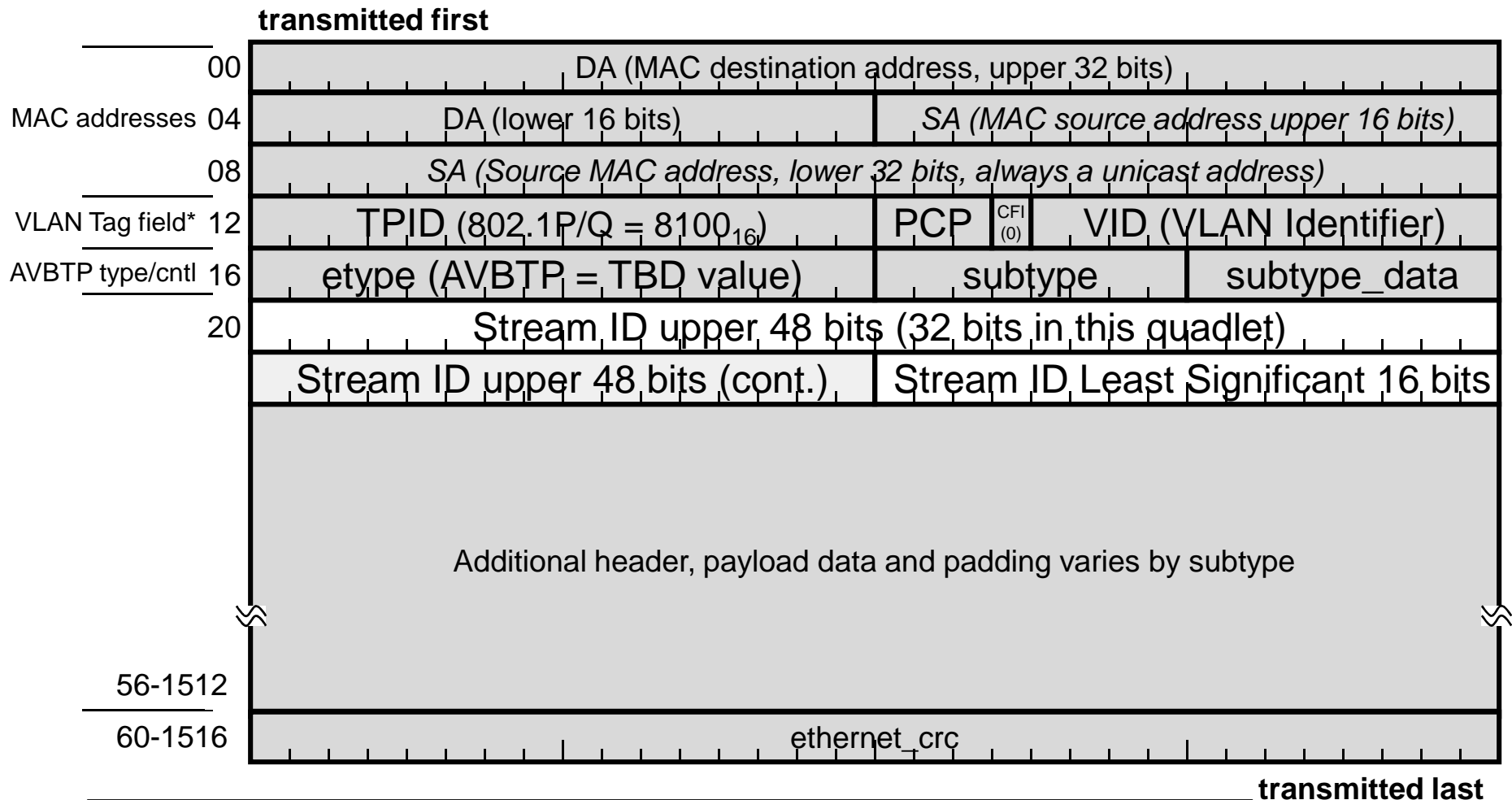
Options summary

- Stream ID discussions in AVB meetings focusing on combination of:
 - 64 bit total length stream ID with
 - Upper 48 bits based on talker's MAC Address
 - Note per Norm Finn, this has been mentioned as a MAC address from the source, not necessarily the actual one used in the frame
 - Discussion point:
 - » Perhaps for AVBTP, we should consider not supporting this option and mandate source MAC address be the stream ID generated by talkers
 - Lower 16 bits used to identify multiple streams from the same MAC address.
 - Set as unique numbers by talker.
 - Similar in concept to MAC address

AVBTP Stream ID options

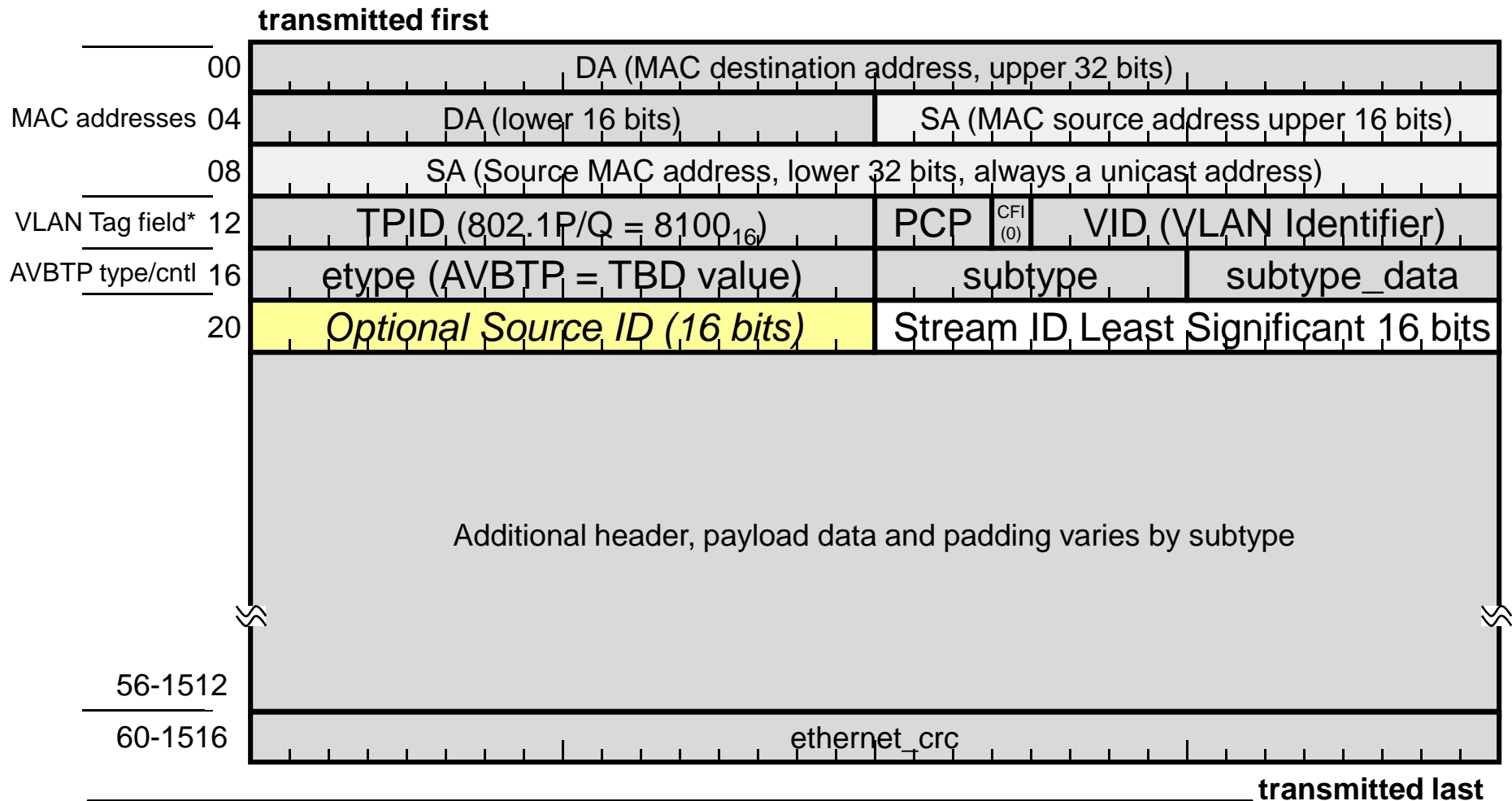
- Ground rules:
 - If we are to add anything to encapsulation, we will always keep all data field quadlet aligned.
 - In adding stream ID, it will have to be added to all AVBTP frames, both data and control.
- Two main options for adding to the AVBTP header:
 - Add two quadlets and use it to encapsulate the entire 64 bit Stream ID.
 - Add one quadlet and use it to encapsulate the lower 16 bits of Stream ID
 - For the remaining 16 bits:
 - Reserve them for future use.
 - Or, allow the talker to use it as an additional 16 bit “Source ID”
 - » Similar to function of IP of Source Port and Destination Port

Stream ID encapsulation option 1



***Note: VLAN Tag field is mandatory for some subtypes and optional for others**

Stream ID encapsulation option 2



***Note: VLAN Tag field is mandatory for some subtypes and optional for others**