IEEE P802.11bb
Wireless LANs

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| Proposed LC PHY text for TGbb D0.5 |
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**Abstract**

This document contains the initial text input for the proposed LC HT and LC VHT PHY for the TGbb draft D0.5.

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32.3.4 LC High Throughput (HT) mode

32.3.4.1 Introduction

32.3.4 (LC High Throughput (HT) mode) specifies the PHY entity when operating the LC PHY in the LC HT mode. The LC HT mode PHY shall be the same as 19 (High-throughput (HT) PHY specification) except when the specifications in 32.3.4 supersede corresponding text in 19 (High-throughput (HT) PHY specification).

The following subclauses in 19 may not apply to the LC HT PHY:

19.3.12 (Beamforming)

19.3.14 (Regulatory requirements)

19.3.15 (Channel numbering and channelization)

The LC HT PHY may support 32.3.3.4.6 (Repetition CCA mechanism).

Note: LC supporting MIMO with separate spatial streams is out of scope of this specification.

32.3.4.2 LC HT PHY service interface

The LC HT PHY service interface shall be the same as in 19.2 except for the following fields which shall not apply to LC HT PHY,

a) EXPANSION\_MAT

b) EXPANSION\_MAT\_TYPE

c) ANTENNA\_SET

d) CHAN\_MAT

e) CHAN\_MAT\_TYPE

32.3.4.3 LC HT PHY

32.3.4.3.1 LC HT Light interface

The LC HT Light interface is described in 32.3.2.3.8 (CM Light interface).

32.3.4.3.2 CCA requirements

The CCA requirements for HT PHY in 19.3.19.5 (CCA sensitivity) to detect a channel busy condition work for LC. For the CCA to function, light signals are converted into electrical signals.

The repetition CCA mechanism demonstrated in 32.3.3.4.6 () also applies to LC HT PHY.

32.3.4.4 LC HT PLME

The LC HT PMLE shall be the same as 19.4 (HT PLME), except the following attributes in the Table 19-24—HT PHY MIB attributes which shall not apply:

* dot11TransmitBeamformingConfigTable
* dot11BeamFormingOptionImplemented
* dot11BeamFormingOptionActivated

32.3.5 LC Very High Throughput (VHT) mode

32.3.5.1 Introduction

32.3.5 (LC Very High Throughput (VHT) mode) specifies the PHY entity when operating the LC PHY in the LC VHT mode. The LC VHT mode PHY shall be the same as 21 (Very high throughput (VHT) PHY specification) except when the specifications in 32.3.5 supersede corresponding text in 21 (Very high throughput (VHT) PHY specification).

The following subclauses in 21 (Very high throughput (VHT) PHY specification) may not apply to the LC VHT PHY:

21.3.11 (SU-MIMO and DL-MU-MIMO Beamforming)

21.3.13 (Regulatory requirements)

21.3.14 (Channelization)

The LC VHT PHY may support 32.3.3.4.6 (Repetition CCA mechanism).

Note: LC supporting MIMO with separate spatial streams is out of scope of this specification.

32.3.5.2 LC VHT PHY service interface

The LC VHT PHY service interface shall be the same as in 21.2 except for the following fields which shall not apply to LC VHT PHY,

a) BEAMFORMED

b) ANTENNA\_SET

c) EXPANSION\_MAT

d) EXPANSION\_MAT\_TYPE

e) CHAN\_MAT

f) CHAN\_MAT\_TYPE

32.3.5.3 LC VHT PHY

32.3.5.3.1 LC VHT Light interface

The LC VHT Light interface is described in 32.3.2.3.8 (CM Light interface).

32.3.5.3.2 CCA requirements

The CCA requirements for VHT PHY in 21.3.18.5 (CCA sensitivity) to detect a channel busy condition work for LC. For the CCA to function, light signals are converted into electrical signals.

The repetition CCA mechanism demonstrated in 32.3.3.4.6 () also applies to LC VHT PHY.

32.3.5.4 LC VHT PLME

The LC VHT PMLE shall be the same as 21.4 (VHT PLME), except the following attributes in the Table 21-28—VHT PHY MIB attributes which shall not apply to LC VHT PHY:

* dot11TransmitBeamformingConfigTable
* dot11BeamFormingOptionImplemented
* dot11BeamFormingOptionActivated
* dot11VHTTransmitBeamformingConfigTable