Time Limit for the COUNTDOWN State (D2.1 Comment #136)

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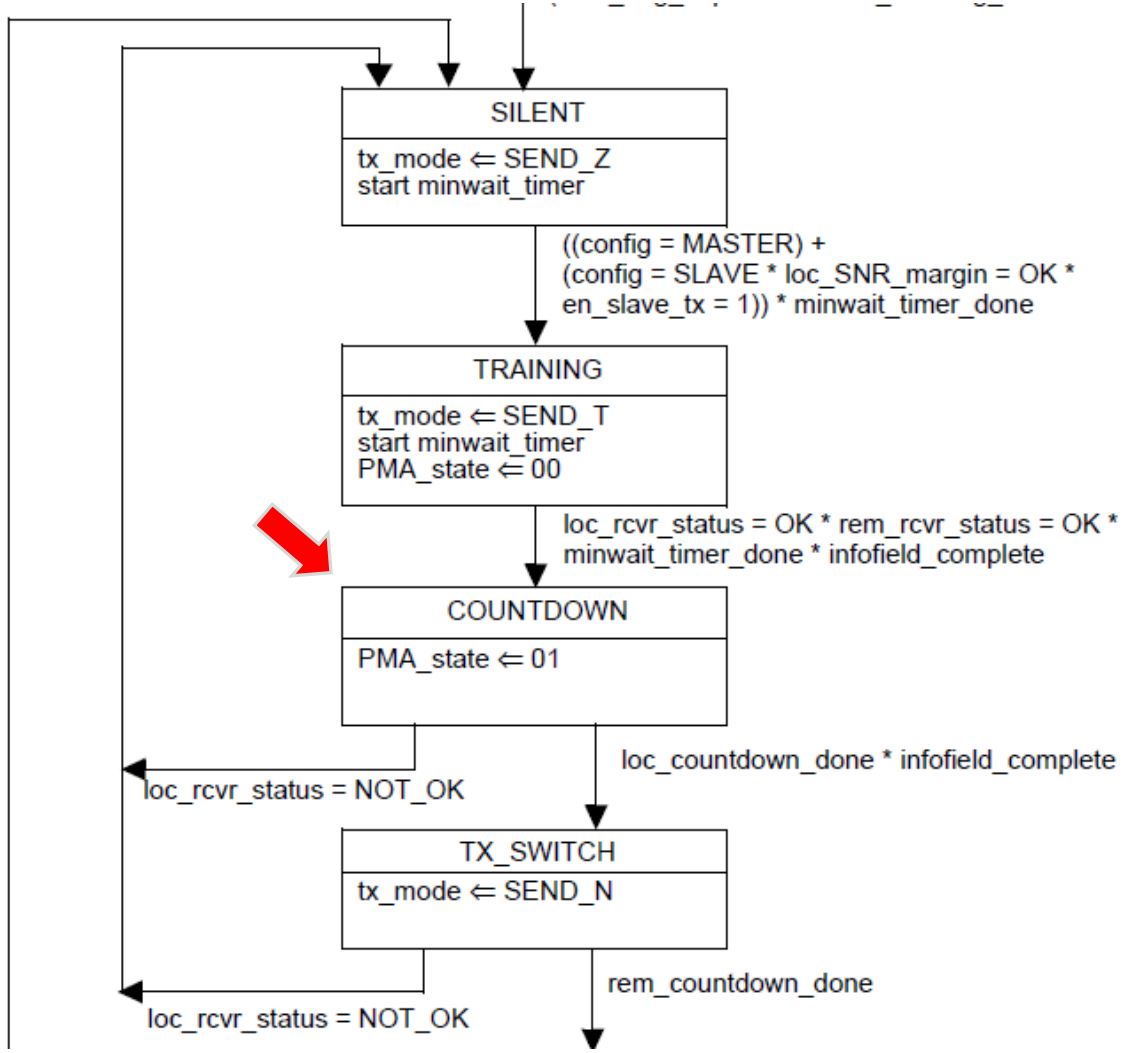
Comment #136

- D2.1 comment #136 proposes to set limits on DataSwPFC24:
  - *Add new final sentence to end of paragraph in 149.4.2.4.6: "DataSwPFC24 shall be a minimum of 64 and a maximum of 512 from the current PFC24 value."*
- This effectively set a time limit for the COUNTDOWN state in Figure 149-33

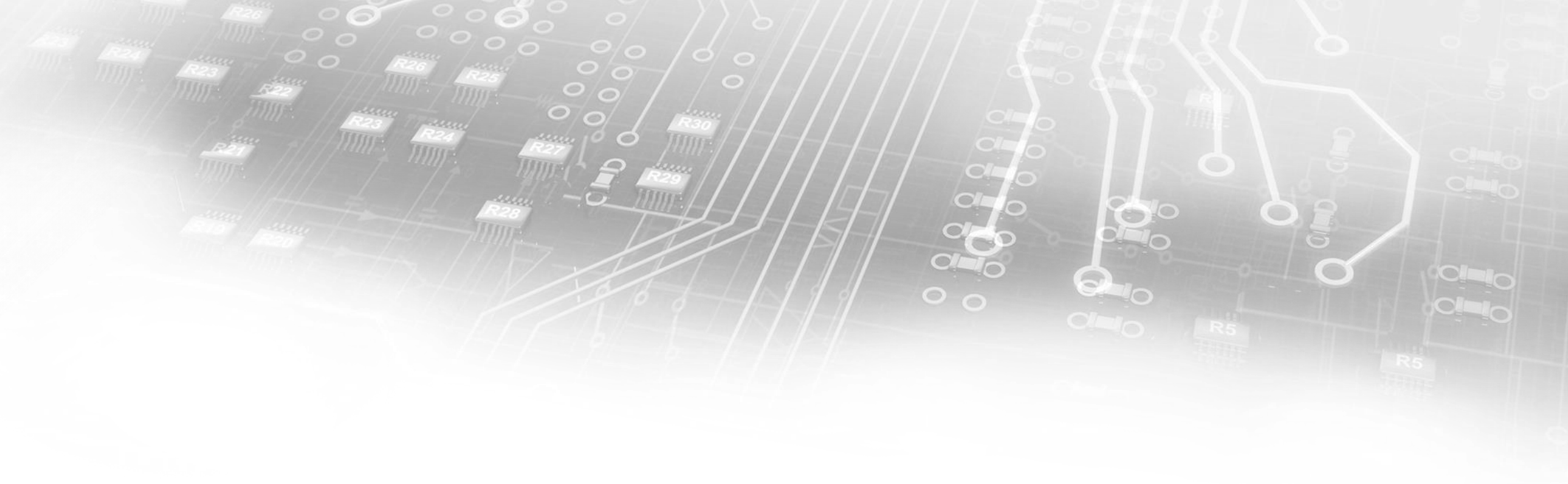


Conflict with 149.4.2.4

- However, per 149.4.2.4, "*Each InfoField shall be transmitted at least 256 times to ensure detection at link partner.*"
  - 256 training frames * 16 partial frame/train frame = 4096 partial frames.
  - Therefore the minimum for DataSwPFC24 should be 4096 – 15 = 4081 from the current PFC24 value.
  - Also, 256 training frames = 327.68 / S usec
    - 0.32768 msec for 10GBASE-T1
    - 0.65536 msec for 5GBASE-T1
    - 1.31072 msec for 2.5GBASE-T1
- Recommend to set 1.536 msec (up to 300 training frames for 2.5GBASE-T1) as the time limit allowed in the COUNTDOWN state

Recommended Remedy for Comment #136

- Add new final sentence to end of paragraph in 149.4.2.4.6:
- *DataSwPFC24 shall be selected such that the duration of the COUNTDOWN state in Figure 149-33 does not exceed 1.536 msec.*



THANK YOU