IEC/IEEE 60802 EDITION 2 TOPICS

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DISCLAIMER

- These opinions are my own as an individual and not as a chair or other affiliation.

MULTIPLE CONFIGURATION DOMAINS

- As brought up recently and in a number of older presentations, multiple configuration domains and mechanisms for deterministic communication between them are significant gaps in the first IEC/IEEE 60802 specification.

- Without this function, all implementations of 60802 in a factory with shared time-sensitive communication have to fit in a single configuration domain, which means that the domain has to meet the needs of the highest application.

MULTIPLE CONFIGURATION DOMAINS

- Most Recent Presentation:
  - https://www.ieee802.org/1/files/public/docs2025/new-farkas-multiple-configuration-domains-0325-v01.pdf

- Older Presentations by this author:
  - https://www.ieee802.org/1/files/public/docs2019/60802-Hantel-TSN-Domains-vs-TSN-IA-Domains-0719-v00.pdf
  - https://www.ieee802.org/1/files/public/docs2019/60802-Hantel-TSN-IA-Domains-Constructability-0519-v01.pdf
  - https://www.ieee802.org/1/files/public/docs2018/60802-Hantel-TSN-Interdomain-Communications-0718.pdf

WIFI SUPPORT FOR 60802

- Attention has been paid to mechanisms for bringing time sensitive networks to WiFi in the past, but to-date a full solution has not been identified, and is excluded from 60802.

- Specific issues include but are not limited to a working definition for time synchronization on WiFi.

- See Use Case 9 - https://www.ieee802.org/1/files/public/docs2018/60802-industrial-use-cases-0918-v13.pdf

- The work on a PAR for 802.1Qee could further support this activity.

TIME SYNC SECURITY

- Time synchronization currently doesn't adhere to general security best practices.

- A deep dive on threat vectors and suitable light-weight protection mechanisms would be an appropriate topic to discuss at further depth.

WAY OF WORKING

- As learned from the first release of IEC/IEEE 60802, identifying the best ways of solving the identified high priority gaps could be a base specification update or a profile update.

- Care should be taken to gain consensus on topics and best ways of working before jumping immediately into a 2nd edition of IEC/IEEE 60802 mechanisms.