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Title: A.13 justification for proposed draft new Supplement ITU-T Y.Sup.VFS "Functional architecture of connected vehicle formation supporting based on edge computing", Q3/20 meeting (Arusha, 13-22 September 2023)

Contact: Chao Ma
CAICT
China

Tel: + 86 18612866101
E-mail: machao@caict.ac.cn

Abstract: This TD contains A.13 justification for proposed draft new Supplement ITU-T Y.Sup.VFS "Functional architecture of connected vehicle formation supporting based on edge computing" based on C311 discussion results at the Q3/20 meeting.

Please see below.

A.13 justification for proposed draft new ITU-T Y.Sup.VFS "Functional architecture of connected vehicle formation supporting based on edge computing"

Question:	Q3/20	**Proposed new ITU-T Supplement**	Arusha, Tanzania, 13-22 September 2023	
Reference and title:	ITU-T Y.Sup.VFS "Functional architecture of connected vehicle formation supporting based on edge computing"			
Base text:	TD1004-R1		**Timing:**	2025-12
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Purpose and scope (Define what this document will address and its intent or objectives in order to indicate the limits of its applicability):

This Supplement provides the functional architecture of connected vehicle formation supporting based on edge computing. The scope of this Supplement includes:

– Functional architecture of the connected vehicle formation supporting based on edge computing
– Functional entities to support the connected vehicle formation supporting based on edge computing
– Reference points of the functional architecture for the connected vehicle formation supporting based on edge computing

Summary (provides a brief overview of the proposal):

Edge computing will enable IoT and C-V2X with stronger capabilities of computing and connectivity and provide an ideal edge cloud computing infrastructure for connected vehicle formation supporting, which has become an important pillar of intelligent transportation system. With the help of edge computing, vehicle formation could maximize overall traffic efficiency, thus fully unleashing the potential of connected vehicles, which is possible to define a new direction for the development of future transportation system.

This Supplement defines a reference functional architecture of connected vehicle formation supporting based on edge computing, and its functional architecture, functional entities and reference points will be the main scope.

Relations to ITU-T Recommendations or other documents (approved or under development):

ITU-T Y.4471, ITU-T Y.4116

Liaisons with other study groups or with other standards bodies:

SG16, SG13, 3GPP, ISO/TC 204

Supporting members that are committing to contributing actively to the work item:

China Telecommunications Corporation, China Unicom, China Information Communication Technologies Group, Tsinghua University, Beijing University of Posts and Telecommunications