



India (Republic of)

**PROPOSED REVISION TO RESOLUTION 60:
TO ENHANCE THE STANDARDIZATION WORK ON
IDENTIFICATION/NUMBERING FOR EMERGING NETWORKS IN ITU-T**

PROPOSED MODIFICATION TO DRAFT PACP (APT WTSA20-2/INP-30)

1. Abstract

A draft proposal of China (vide APT WTSA20-2/INP-30) related to Resolution 60 has been considered as candidate for draft PACP by WG3. This contribution document has prepared by India to suggest some changes in the candidate for draft PACP for discussion in WG3 pertaining to Resolution 60 - Encourage the creation of national computer incident response teams, particularly for developing countries.

2. Introduction

Identification/numbering related subjects, which are within the mandate of ITU-T Study Group 2 and other study groups, are among the hot topics and key issues since the emergence of telecommunications industry. In recent years, ITU-T has led the standardization work on identification/numbering, including the procedures of allocation and management of identification/numbering, which are researched in the relevant Recommendations in the ITU-T E-, ITU-T F-, ITU-T Q- and ITU-T X-series. In addition, ITU-T has led the standardization work on the evolution of the identification/numbering system and its convergence with emerging networks, including investigating the evolutionary aspect of the identification/numbering system, and considering next-generation networks evolution (NGNe) and future networks (FN) including IMT-2020 as the working environment of the identification/numbering system in the future.

On the other hand, the transition from traditional networks to IP-based networks is taking place at a fast pace, whilst there is a transition to NGNe and FN including IMT-2020. There exist the issues concerning the convergence of identification/numbering system along with the development of NGNe and FN including IMT-2020, and associated issues concerning security, signalling, protocol, portability and migration. Considering FN including IMT-2020 is one of the most important standardization fields within the scope of ITU-T, also considering standardization work in the aspects of requirements, network, signalling, protocol, etc. for FN including IMT-2020 have made great progress in ITU-T SG13, SG11 and other study groups in this study period, it would be of great value to address and enhance the standardization work on identification/numbering for emerging networks in ITU-T.

In consideration of all the above standardization progress on identification/numbering, also in response to the evolution of emerging networks, we would like to propose that ITU-T should continue to play a prominent role in the development of identification/numbering standards to facilitate the wide application of emerging networks in ICT related industries.

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It is clear that Resolution 60 has been playing a very instrumental role in the past 12 years in guiding and facilitating identification/numbering related study in various study groups of ITU-T. Some of the tasks in the field of IP-based systems/networks defined by current Resolution 60 are close to being completed, we believe that ITU-T needs this Resolution after being updated and reinforced in its long-term strategies towards ICT development to provide continuous guidance to standardization work in various study groups of ITU-T.

In the next study period, the following new subjects on identification/numbering are recommended to be addressed in ITU-T.

- 1) New identification/numbering introduced in IMT-2020/5G networks, such as these defined in ETSI TS 123 003;
- 2) New identification/numbering introduced in next-generation networks evolution (NGNe);
- 3) New identification/numbering introduced in future networks beyond IMT-2020/5G;
- 4) Applying new technologies such as artificial intelligence (AI) / machine learning (ML) and blockchain in identification/numbering system.

In addition, the coordination and cooperation on identification/numbering in various study groups of ITU-T, and between ITU-T and other standards development organizations (SDOs) are recommended to be promoted, as identification/numbering related subjects including requirements, network, signalling, protocol, etc. for emerging networks are studied in various study groups of ITU-T and other SDOs.

With the discussion above, we would like to propose that ITU-T should make the best use of WTSA-20 as an opportunity to review the existing Resolution 60 by adding new instructions and contents to it, including the new subjects addressed above, so that it can be refreshed, enhanced and strengthened in order to be able to guide ITU-T's standardization work in identification/numbering related subjects in the next study period.

3. Proposal

In addition to the changes proposed by China, India proposes the changes (highlighted in yellow background) for consideration of APT members on revising Resolution 60 to enhance the standardization work on identification/numbering for emerging networks in the next study period of ITU-T. The main target includes three aspects expected to be resolved by this revision of Resolution 60 as following.

1. The following text has been added in the 'noting' section as point (b) and rest of the bullet points have been modified accordingly:

“ the work in Study Group 13 of the ITU Telecommunication Standardization Sector (ITU-T), on investigating the Upcoming network technologies for IMT-2020 and future networks, including Information Centric Networking (ICN) being considered as a potential networking scheme in future networks including IMT-2020;”

A draft revision of Resolution 60 to enhance the standardization work on identification/numbering related subjects for emerging networks is attached for discussion of the WG3 of APT-WTSA20 as an annex of this contribution.

ANNEX: REVISION OF RESOLUTION 60

Responding to the challenges of the evolution of the identification/numbering system and its convergence with IP-based systems/networks

(Johannesburg, 2008; Dubai, 2012; Hyderabad, 2020)

The World Telecommunication Standardization Assembly (Hyderabad, 2020),

recognizing

- a) Resolution 133 (Rev. DUBAI, 2018) of the Plenipotentiary Conference, with regard to the continuing progress towards integration of telecommunications and the Internet;
- b) Resolutions 101 and 102 (Rev. DUBAI, 2018) of the Plenipotentiary Conference;
- c) the evolving role of the World Telecommunication Standardization Assembly, as reflected in Resolution 122 (Rev. Guadalajara, 2010) of the Plenipotentiary Conference,

considering

- a) that International Mobile Telecommunications (IMT), especially IMT-2020, is being utilized widely to build a user-centred information ecosystem, and it makes a positive and important contribution to the United Nations Sustainable Development Goals (SDGs) and World Summit on the Information Society (WSIS) action lines,

noting

- a) the work in Study Group 2 of the ITU Telecommunication Standardization Sector (ITU-T), on investigating the evolutionary aspect of the identification/numbering system, including the "future of numbering", considering next-generation networks evolution (NGNe) and future networks (FN) including IMT-2020 as the working environment of the identification/numbering system in the future;
- b) the work in Study Group 13 of the ITU Telecommunication Standardization Sector (ITU-T), on investigating the Upcoming network technologies for IMT-2020 and future networks, including Information Centric Networking (ICN) being considered as a potential networking scheme in future networks including IMT-2020;
- c) that the transition from traditional networks to IP-based networks is taking place at a fast pace, whilst there is a transition to NGNe and FN including IMT-2020;
- d) the emerging issues concerning administrative control for international telecommunication service-based numbers;
- e) the forthcoming issues concerning the convergence of numbering, naming, addressing and identification systems along with the development of NGNe and FN including IMT-2020, and associated issues concerning security, signalling, protocol, portability and migration;
- f) the growing demand for identification/numbering resources for communications referred to as Internet of things (IoT);

g) the need for principles and a roadmap for the evolution of international telecommunication resources, which would be expected to help the timely, predictable deployment of advanced identification/numbering technologies,

resolves to instruct ITU-T Study Group 2, within the mandate of ITU-T

1 to continue studying, in liaison with the other relevant study groups, the necessary requirements for the structure and maintenance of telecommunication identification/numbering resources in relation to the deployment of IP-based networks and the transition to NGNe and FN including IMT-2020;

2 to ensure the development of the administrative requirements for identification/numbering resource management systems in NGNe and FN including IMT-2020;

3 to continue developing guidelines, as well as a framework, for the evolution of the international telecommunication identification/numbering system and its convergence with IP-based systems, in coordination with related study groups and associated regional groups, so that a basis for any new application can be provided;

4 to address the standardization work on applying new technologies such as artificial intelligence (AI) / machine learning (ML) and blockchain in identification/numbering system;

5 to promote the coordination and cooperation on identification/numbering in various study groups of ITU-T, and with other standards development organizations (SDOs),

instructs relevant study groups, and in particular ITU-T Study Group 13 and Study Group 11

to support the work of Study Group 2, to ensure that such applications are based on appropriate guidelines, as well as a framework, for the evolution of the international telecommunication identification/numbering system, and to help investigate their impact on the identification/numbering system in the aspects of requirements, architecture, signalling and protocol of network, especially for NGNe and FN including IMT-2020,

instructs the Director of the Telecommunication Standardization Bureau

to take appropriate action to facilitate the foregoing work regarding the evolution of the identification/numbering system or its converged applications,

invites Member States and Sector Members

1 to contribute to these activities, taking into consideration their national concerns and experiences;

2 to participate in and to contribute to regional groups discussing the identification/numbering issues, and to promote the participation of developing countries in those discussions.