The ATM Forum

Technical Committee

Addressing Addendum to ATM User-Network Interface (UNI) Signalling Specification Version 4.0

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1. Introduction

This document is an Addendum to the UNI Signalling 4.0 specification (af-sig-0061.000 [1]). This document does not replace af-sig-0061.000 and must be used in conjunction with af-sig-0061.000. With two exceptions (items two and three below), there are no changes to UNI Signalling 4.0 behaviour. This Addendum serves three purposes:

1. It points to the ATM Forum Addressing: Reference Guide [2] which consolidates addressing related information from UNI Signaling 4.0 [1] and other ATM Forum specifications and which is now the normative source of this information.

2. It allows support of AESAs other than ICD, DCC and E.164.

3. It removes a restriction present in UNI Signalling 4.0. The new rules which allow the removal of this restriction are detailed in Section 3.

This Addendum and the Addressing Reference Guide both use the term AESA (ATM Endsystem Address) in place of the term “private ATM address” used in UNI Signalling 4.0.

2. Normative Address References for UNI Signalling 4.0

[NORMATIVE]

The disposition of addressing-related sections of UNI Signalling 4.0 is listed below.

UNI Signalling 4.0 Section 3.1 is superseded by Addressing Reference Guide Section 4.

UNI 4.0 Section 3.2 remains normative . Replace the text "(all 3 formats, as defined in section 3.1)" from bullet 2 of UNI Signalling 4.0 Section 3.2 with "as defined in the Addressing Reference Guide [2] Section 4".

UNI Signalling 4.0 Section 7.1 is superseded by Addressing Reference Guide Section 4.3.

UNI Signalling 4.0 Annex 1 is superseded by Section 3 of this Addendum.

First paragraph of UNI Signalling 4.0 Annex 5 is superseded by Addressing Reference Guide Section 4.3.

UNI Signalling 4.0 Annex 5.1 is superseded by Addressing Reference Guide Section 4.3.1 and Annex A.

UNI Signalling 4.0 Annex 5.2 is superseded by Addressing Reference Guide Section 4.3.2.

UNI Signalling 4.0 Annex 5.3 is superseded by Addressing Reference Guide Section 8.3 and Annex B.

In UNI Signalling 4.0 Annex 6, replace the reference to Annex 5 with Addressing Reference Guide Annex B.

3. Use of Addressing Information Elements

3.1 UNI Signalling 4.0 Restriction

[INFORMATIVE]

Annex 1: Guidelines for Use of ATM Address Formats of UNI Signalling 4.0 (af-sig-0061.000 [1]) imposes the restriction that the Called party subaddress information element can only contain an AESA if the Called party number information element contains a Native E.164 address. The use of this combination of addresses was intended to allow a private network to tunnel an AESA through a public network which supports only Native E.164 addresses. However, this combination does not support the situation where a private network wishes to tunnel an AESA through a public network which supports AESA.

This Addendum removes this restriction and allows the Called party subaddress information element to contain an AESA when the Called party number information element also contains an AESA. This change applies to both the Public and Private UNI.

3.2 New Procedures

[NORMATIVE]

This section supersedes Annex 1: Guidelines for Use of ATM Address Formats in UNI Signalling 4.0 af-sig-0061.000 [1].

The Addressing Reference Guide [2] contains general guidelines on the use and allocation of addresses.

Listed below are the rules for the use of various address types in the address information elements supported at the Public and Private UNI.

1. At the Private UNI, only the AESA address format shall be carried in the Called party number information element.

2. The AESA format uses:

   - Type of Number and Addressing/Numbering Plan Identification of "Unknown/ATM Endsystem Address" when conveyed via Called party number and Calling party number information elements, and

   - Type of Address as "ATM endsystem address" when conveyed via Called party subaddress or Calling party subaddress information elements.

3. The maximum number of instances of the Called party subaddress information element containing an address other than an AESA (e.g. NSAP) is one.

4. The maximum number of instances of the Called party subaddress information element containing an AESA is one.

5. Other than the number of instances, there is no restriction on when a Called party subaddress information element can contain an AESA.

4. References

[1] "ATM User-Network Interface (UNI) Signalling Specification Version 4.0", The ATM Forum Technical Committee, af-sig-0061.000

[2] “ATM Forum Addressing: Reference Guide version 1.0”, ATM Forum Technical Committee, af-ra-0106.000.