**3GPP TSG-CT WG1 Meeting #140C1-230121**

**Athens, Greece, 27 February – 3 March 2023**

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| *CR-Form-v12.2* |
| **CHANGE REQUEST** |
|  |
|  | **24.501** | **CR** | 4991 | **rev** | **-** | **Current version:** | **18.1.0** |  |
|  |
| *For* [***HE******LP***](http://www.3gpp.org/3G_Specs/CRs.htm#_blank)*on using this form: comprehensive instructions can be found at* [*http://www.3gpp.org/Change-Requests*](http://www.3gpp.org/Change-Requests)*.* |
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|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| ***Proposed change affects:*** | UICC apps |  | ME | **X** | Radio Access Network |  | Core Network | **X** |

|  |
| --- |
|  |
| ***Title:***  | Clarification on UE policy part contents length |
|  |  |
| ***Source to WG:*** | NTT DOCOMO |
| ***Source to TSG:*** | C1 |
|  |  |
| ***Work item code:*** | 5GProtoc18 |  | ***Date:*** | 2023-02-20 |
|  |  |  |  |  |
| ***Category:*** | **F** |  | ***Release:*** | Rel-18 |
|  | *Use one of the following categories:****F*** *(correction)****A*** *(mirror corresponding to a change in an earlier release)****B*** *(addition of feature),* ***C*** *(functional modification of feature)****D*** *(editorial modification)*Detailed explanations of the above categories canbe found in 3GPP [TR 21.900](http://www.3gpp.org/ftp/Specs/html-info/21900.htm). | *Use one of the following releases:Rel-8 (Release 8)Rel-9 (Release 9)Rel-10 (Release 10)Rel-11 (Release 11)…Rel-16 (Release 16)Rel-17 (Release 17)Rel-18 (Release 18)Rel-19 (Release 19)* |
|  |  |
| ***Reason for change:*** | 1. TS 24.501 specifies UE policy part field. However, there is a confusing field, which is named “UE policy part contents”, therefore, what is meant by “UE policy part contents length” is unclear. It is proposed that UE policy part contents length indicates the length of the “UE policy part contents” field, and NOT the length of value part of “UE policy part” field.
2. There is no description on which octets represent “UE policy contents” field, therefore it is specified that octets q+3 to r represent “UE policy contents” field.
 |
|  |  |
| ***Summary of change:*** | Clarified the meaning of UE policy part contents length |
|  |  |
| ***Consequences if not approved:*** | UE cannot decode UE policy part contents correctly |
|  |  |
| ***Clauses affected:*** | D.6.2 |
|  |  |
|  | **Y** | **N** |  |  |
| ***Other specs*** |  | **X** |  Other core specifications  | TS/TR ... CR ...  |
| ***affected:*** |  | **X** |  Test specifications | TS/TR ... CR ...  |
| ***(show related CRs)*** |  | **X** |  O&M Specifications | TS/TR ... CR ...  |
|  |  |
| ***Other comments:*** |  |
|  |  |
| ***This CR's revision history:*** |  |

D.6.2 UE policy section management list

The purpose of the UE policy section management list information element is to transfer from the PCF to the UE a list of instructions to be performed at the UE for management of UE policy section stored at the UE.

The UE policy section management list information element is coded as shown in figure D.6.2.1, figure D.6.2.2, figure D.6.2.3, figure D.6.2.4, figure D.6.2.5, figure D.6.2.6, figure D.6.2.7 and table D.6.2.1.

The UE policy section management list information element has a minimum length of 12 octets and a maximum length of 65534 octets.

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| 8 | 7 | 6 | 5 | 4 | 3 | 2 | 1 |  |
| UE policy section management list IEI | octet 1 |
| Length of UE policy section management list contents | octet 2octet 3 |
| UE policy section management list contents | octet 4octet z |

**Figure D.6.2.1: UE policy section management list information element**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| 8 | 7 | 6 | 5 | 4 | 3 | 2 | 1 |  |
| UE policy section management sublist (PLMN 1) | octet 4octet a |
| UE policy section management sublist (PLMN 2) | octet a+1octet b |
| … | octet b+1…octet c |
| UE policy section management sublist (PLMN N) | octet c+1octet z |

**Figure D.6.2.2: UE policy section management list contents**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| 8 | 7 | 6 | 5 | 4 | 3 | 2 | 1 |  |
| Length of UE policy section management sublist | octet doctet d+1 |
|  | MCC digit 1 | octet d+2 |
| MCC digit 2 |
|  | MCC digit 3 | octet d+3 |
| MNC digit 3 |
|  | MNC digit 1 | octet d+4 |
| MNC digit 2 |
| UE policy section management sublist contents | octet d+5octet y |

**Figure D.6.2.3: UE policy section management sublist**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| 8 | 7 | 6 | 5 | 4 | 3 | 2 | 1 |  |
| Instruction 1 | octet d+5octet e |
| Instruction 2 | octet e+1octet f |
| … | octet f+1 …octet g |
| Instruction N | octet g+1octet e |

**Figure D.6.2.4: UE policy section management sublist contents**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| 8 | 7 | 6 | 5 | 4 | 3 | 2 | 1 |  |
| Instruction contents length | octet d+5octet d+6 |
| UPSC | octet d+7octet d+8 |
| UE policy section contents | octet d+9octet k |

**Figure D.6.2.5: Instruction**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| 8 | 7 | 6 | 5 | 4 | 3 | 2 | 1 |  |
| UE policy part 1 | octet loctet m |
| UE policy part 2 | octet m+1octet n |
| … | octet n+1 …octet o |
| UE policy part N | octet o+1octet p |

**Figure D.6.2.6: UE policy section contents**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| 8 | 7 | 6 | 5 | 4 | 3 | 2 | 1 |  |
| UE policy part contents length | octet qoctet q+1 |
| 0 | 0 | 0 | 0 | UE policy part type | octet q+2 |
| Spare |
| UE policy part contents | octet q+3octet r |

**Figure D.6.2.7: UE policy part**

**Table D.6.2.1: UE policy section management list information element**

|  |
| --- |
| Value part of the UE policy section management list information element (octets 4 to z) |
|  |
| The value part of the UE policy section management list information element consists of one or several UE policy section management sublists. |
|  |
| UE policy section management sublist: |
|  |
| Length of UE policy section management sublist (octets d to d+1) |
|  |
| This field contains the binary encoding of the length of the UE policy section management sublist in units of octets. |
|  |
| MCC, Mobile country code (octet d+2, and bits 4 to 1 of octet d+3) |
|  |
| The MCC field is coded as in ITU-T Recommendation E.212 [42], annex A. |
|  |
| MNC, Mobile network code (bits 8 to 5 of octet d+3, and octet d+4) |
|  |
| The coding of this field is the responsibility of each administration but BCD coding shall be used. The MNC shall consist of 2 or 3 digits. If a network operator decides to use only two digits in the MNC, MNC digit 3 shall be coded as "1111". |
|  |
| UE policy section management sublist contents (octets d+5 to y) |
|  |
| The UE policy section management sublist contents consist of one or several instructions. |
|  |
| Instruction: |
|  |
| Instruction contents length (octets d+5 to d+6)  |
|  |
| This field contains the binary encoding of the instruction contents length in units of octets. |
|  |
| UPSC (octets d+7 to d+8) |
|  |
| This field contains the binary encoding of the UPSC. The value of the UPSC is set by the PCF. |
|  |
| UE policy section contents (octets d+9 to k) |
|  |
| The UE policy section contents consist of one or several UE policy parts. |
|  |
| UE policy part: |
|  |
| UE policy part contents length (octets q to q+1) |
|  |
| This field contains the binary encoding of the length of the UE policy part contents field (octets q+3 to r) in units of octets.  |
|  |
| UE policy part type (bits 4 to 1 of octet q+2) |
| Bits |
| **4** | **3** | **2** | **1** |  |
| 0 | 0 | 0 | 0 | Reserved |
| 0 | 0 | 0 | 1 | URSP |
| 0 | 0 | 1 | 0 | ANDSP |
| 0 | 0 | 1 | 1 | V2XP |
| 0 | 1 | 0 | 0 | ProSeP |
| All other values are reserved. |
|  |
| Bits 8 to 5 of octet q+2 are spare and shall be coded as zero. |
|  |
| UE policy part contents (octets q+3 to r) |
|  |
| This field contains a UE policy part encoded as specified in 3GPP TS 24.526 [19] for the UE policy part type field set to "URSP" or "ANDSP", in 3GPP TS 24.588 [19C] for the UE policy part type field set to "V2XP" and in 3GPP TS 24.555 [19F] for the UE policy part type field set to "ProSeP" respectively. |
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