**SA WG2 Meeting S2#143-e S2-2xxxxxx**

**24 February - 09 March, 2021, Electronic meeting**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| *CR-Form-v12.0* | | | | | | | | |
| **CHANGE REQUEST** | | | | | | | | |
|  | | | | | | | | |
|  | **23.502** | **CR** | **<CR#>** | **rev** | **<Rev#>** | **Current version:** | **16.6.0** |  |
|  | | | | | | | | |
| *For* ***HE******LP*** *on using this form: comprehensive instructions can be found at  http://www.3gpp.org/Change-Requests.* | | | | | | | | |
|  | | | | | | | | |

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| ***Proposed change affects:*** | UICC apps |  | ME |  | Radio Access Network |  | Core Network | **x** |

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | | | | | | | |
| ***Title:*** | Multimedia Priority Service (MPS) Phase 2 support for Data Transport Service | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Source to WG:*** | Perspecta Labs, CISA ECD, AT&T, Ericsson, Nokia, Nokia Shanghai-Bell | | | | | | | | | |
| ***Source to TSG:*** | SA2 | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Work item code:*** | MPS2 | | | | |  | ***Date:*** | | | DD MM 2021 |
|  |  | | | |  | |  | | |  |
| ***Category:*** | **B** |  | | | | | ***Release:*** | | | Rel-17 |
|  | *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 can be found in 3GPP TR 21.900. | | | | | | | | *Use one of the following releases: Rel-8 (Release 8) Rel-9 (Release 9) Rel-10 (Release 10) Rel-11 (Release 11) Rel-12 (Release 12)* *Rel-13 (Release 13) Rel-14 (Release 14) Rel-15 (Release 15) Rel-16 (Release 16)*  *Rel-17 (Release 17)* | |
|  |  | | | | | | | | | |
| ***Reason for change:*** | | MPS for DTS provides the Service User with priority for applications using the QoS Flow associated with the default QoS rule in the 5GS, to one or more selected active Data Networks (DNs), in periods of severe network congestion during which normal commercial data service is degraded.  This CR supports stage 1 requirements, TS 22.153, clause 9.3.1:  The system shall support:   * MPS for DTS for an authorized Service User using a UE with a subscription for MPS, and * MPS for DTS for an authorized Service User using a UE that does not have an MPS subscription   TS 23.502 currently does not support MPS for DTS. | | | | | | | | |
|  | |  | | | | | | | | |
| ***Summary of change:*** | | Added support for MPS for DTS to Npcf\_PolicyAuthorization\_Create and Npcf\_PolicyAuthorization\_Update. | | | | | | | | |
|  | |  | | | | | | | | |
| ***Consequences if not approved:*** | | No support for MPS for DTS in 5GC in Release 17. | | | | | | | | |
|  | |  | | | | | | | | |
| ***Clauses affected:*** | | 5.2.5.3.2 and 5.2.5.3.3 | | | | | | | | |
|  | |  | | | | | | | | |
|  | | **Y** | **N** |  | | | |  | | |
| ***Other specs*** | | **X** |  | Other core specifications | | | | CR for TS 23.501 and CR for TS 23.503 | | |
| ***affected:*** | |  | **X** | Test specifications | | | | TS/TR ... CR ... | | |
| ***(show related CRs)*** | |  | **X** | O&M Specifications | | | | TS/TR ... CR ... | | |
|  | |  | | | | | | | | |
| ***Other comments:*** | |  | | | | | | | | |
|  | |  | | | | | | | | |
| ***This CR's revision history:*** | |  | | | | | | | | |

*FIRST CHANGE*

##### 5.2.5.3.2 Npcf\_PolicyAuthorization\_Create service operation

**Service operation name:** Npcf\_PolicyAuthorization\_Create

**Description:** Authorize the request, and optionally determines and installs SM Policy Control Data according to the information provided by the NF Consumer or provides Ethernet Port Management Information Container for Ethernet ports on DS-TT or NW-TT.

**Inputs, Required:** UE (IP or MAC) address, identification of the application session context.

**Inputs, Optional:** UE identity if available, DNN if available, S-NSSAI if available, Media type, Media format, bandwidth requirements, sponsored data connectivity if applicable, flow description, Application identifier, AF Communication Service Identifier, AF Record Identifier, Flow status, Priority indicator, emergency indicator, Application service provider, resource allocation outcome, AF Application Event Identifier, a list of DNAI(s) and corresponding routing profile ID(s) or N6 traffic routing information, AF Transaction Id, Early and/or late notifications about UP path management events, temporal validity condition and spatial validity condition as described in clause 5.6.7 in 23.501 [2], Background Data Transfer Reference ID, priority sharing indicator as described in clause 6.1.3.15 in TS 23.503 [20], pre-emption control information as described in clause 6.1.3.15 in TS 23.503 [20], Port Management Information Container and related port number, TSN AF parameters provided by the TSN AF to the PCF as described in clause 6.1.2.23 of TS 23.503 [20], QoS parameter(s) to be measured, Reporting frequency, Target of reporting as described in clause 6.1.3.21 of TS 23.503 [20], Alternative Service Requirements (containing one or more QoS reference parameters in a prioritized order), MPS for DTS indicator as described in clause 6.1.3.11 of TS 23.503 [20].

**Outputs, Required:** Success or Failure (reason for failure, e.g. as defined in TS 23.503 [20] clause 6.1.3.16, clause 6.1.3.10).

**Outputs, Optional:** The service information that can be accepted by the PCF.

*SECOND AND LAST CHANGE*

##### 5.2.5.3.3 Npcf\_PolicyAuthorization\_Update service operation

**Service operation name:** Npcf\_PolicyAuthorization\_Update

**Description:** Provides updated information to the PCF.

**Inputs, Required:** Identification of the application session context.

**Inputs, Optional:** Media type, Media format, bandwidth requirements, sponsored data connectivity if applicable, flow description, Application identifier, AF Communication Service Identifier, AF Record Identifier, Flow status, Priority indicator, Application service provider, resource allocation outcome, AF Application Event Identifier, a list of DNAI(s) and corresponding routing profile ID(s) or N6 traffic routing information, AF Transaction Id, Early and/or late notifications about UP path management events, temporal validity condition and spatial validity condition as described in clause 5.6.7 in 23.501 [2], Background Data Transfer Reference ID, priority sharing indicator as described in clause 6.1.3.15 in TS 23.503 [20], pre-emption control information as described in clause 6.1.3.15 in TS 23.503 [20], Port Management Information Container and related port number, TSN AF parameters provided by the TSN AF to the PCF as described in clause 6.1.2.23 of TS 23.503 [20], QoS parameter(s) to be measured, Reporting frequency, Target of reporting as described in clause 6.1.3.21 of TS 23.503 [20], MPS for DTS indicator as described in clause 6.1.3.11 of TS 23.503 [20].

**Outputs, Required:** Success or Failure (reason for failure, e.g. as defined in TS 23.503 [20] clause 6.1.3.16).

**Outputs, Optional:** The service information that can be accepted by the PCF.

Provides updated application level information and communicates with Npcf\_SMPolicyControl service to determine and install the policy according to the information provided by the NF Consumer. Updates an application context in the PCF.

*END OF CHANGES*