**3GPP TSG SA WG5 Meeting #155 *S5-243039***

Jeju, South Korea, 27 - 31 May 2024

|  |
| --- |
| *CR-Form-v12.0* |
| **CHANGE REQUEST** |
|  |
|  | **32.290** | **CR** | **0225** | **rev** | **2** | **Current version:** | **18.5.0** |  |
|  |
| *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)*.* |
|  |

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

|  |
| --- |
|  |
| ***Title:***  | Rel-18 CR 32.290 Clarify the store and resend failure handling mechanism |
|  |  |
| ***Source to WG:*** | Huawei, Nokia, Ericsson LM |
| ***Source to TSG:*** | S5 |
|  |  |
| ***Work item code:*** | TEI18 |  | ***Date:*** | 2024-05-30 |
|  |  |  |  |  |
| ***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 o. | *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)* |
|  |  |
| ***Reason for change:*** | The statement that “The CTF may store and re-send Charging Data Request(s) if it fails to reach CHF” is ambiguous, which may be confused with “retry” mechanism. In TS 32.291, it is specified as “Charging information may be stored”. The mechanism should keep aligned with TS 32.291.Based on the agreed rev1 of the CR 0225 in SA5#154 (S5-241857), the condition that “in case the CHF is determined not available” has been clarified, i.e. “the CTF may store the Charging Data Request(s) or charging information, and uses application level failure handling, as described in this clause.” However, the following-up condition that “once the CHF is determined available” is still undefined. It is necessary to clearly define the corresponding action, i.e. the stored Charging Data Request(s) or Charging Informaiton will be provided to CHF (when it is determined available), to avoid the risk of using them for other unintended purpose. |
|  |  |
| ***Summary of change:*** | Rephrase the statement to improve the clarity. |
|  |  |
| ***Consequences if not approved:*** | The failure handling mechanism is not clearly specified.  |
|  |  |
| ***Clauses affected:*** | 5.5.1.1 |
|  |  |
|  | **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 is a revision to the agreed CR in SA5#154 (S5-241857). If agreed, this contribution should be implemented instead of S5-241857. |
|  |  |
| ***This CR's revision history:*** | Revision of S5-242736, which is a Revision of S5-241857 (revision of S5-241618) |

|  |
| --- |
| **First change** |

#### 5.5.1.1 CTF detected failure

The failure handling determines what to do if the sending of charging data request to the CHF without response in a period of time (request times out).

In the case of the NF consumer (CTF) towards CHF request times out, NF consumer (CTF) uses application level failure handling (Terminate, Continue, Retry\_and\_terminate). Failure handling may be received from the CHF previously or may be locally configured. The value received from the CHF in the charging data response will always override any already existing value. Failover handling indication informs NF Consumer whether alternative CHF is supported.

In case the CHF is determined not reachable, the CTF uses application level failure handling and may store the Charging Data Request(s) or charging information. Once the connection to a CHF is established by the NF consumer (CTF), the CHF may receive the Charging Data Request(s) or charging information that were previously stored by NF consumer (CTF).

In case there is an application level error response from the CHF, NF consumer (CTF) action will depend on the type of Application Error.

For protocol level errors, refer to applicable protocol failure handling mechanisms as described in 32.291 [58].

|  |
| --- |
| **End of change** |