

Implicit Update Location to HSS

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Feature Summary and Revision History

Summary Data

Applicable Product(s) or Functional Area	MME
Applicable Platform(s)	• ASR 5500 • VPC-DI • VPC-SI
Default Setting	Disabled - Configuration required
Related Changes in This Release	Not Applicable
Related Documentation	• Command Line Interface Reference • MME Administration Guide

Revision History

Revision Details	Release
In this release, Initial-Attach-Indicator flag is set in the Implicit ULR.	21.16.6
First introduced.	21.14

Feature Description

When the attach has a Globally Unique Temporary ID (GUTI), then MME queries for the subscriber information. If it has the subscriber information, then the Update Location Request (ULR) will not be executed because the UE information is updated already. Some of the customer devices cannot reset the old GUTI after returning to Home network from the visited network. This causes mismatch between Home Subscriber Server (HSS) and MME. Hence MME is expected to send ULR to HSS even when the subscriber Database(dB record) is present at the MME so that the HSS and the MME are in the sync.

Setup Initial-Attach-Indicator Flag Enhancement: In StarOS 21.16.6 release, the MME supports Initial-Attach-Indicator bit in the implicit ULR with the configuration enabled through CLI. You can set the initial attach indication flag during local GUTI attach with the available subscriber DB.

Configuring Implicit Update Location to HSS

Enabling Implicit Update Location to HSS

Use the following commands to send Implicit ULR without setting initial attach indication flag.

```
configure
     call-control-profile call_control_profile_name
        [ no ] attach implicit-ulr
        end
```

NOTES:

- **attach implicit-ulr**: Attaches the implicit ULR. By default implicit-ulr is disabled.
- **no**: Removes the configuration to implicitly send the ULR for local GUTI reattach.

Use the following command to send Implicit ULR with initial attach indication flag set.

```
configure
     call-control-profile call_control_profile_name
        attach implicit-ulr initial-attach-flag
        end
```

NOTES:

- **attach implicit-ulr**: Attaches the implicit ULR. By default implicit-ulr is disabled.
- **initial-attach-flag**: Enables Initial-attach-indication flag in Implicit-ULR.

Reset Initial-Attach-Indication flag in Implicit ULR

To reset, configure **attach implicit-ulr** under call-control-profile configuration mode as below.

```
configure
     call-control-profile call_control_profile_name
         attach implicit-ulr
        end
```

Disable sending of Implicit ULR.

```
configure
     call-control-profile call_control_profile_name
         no attach implicit-ulr
        end
```

Monitoring and Troubleshooting

This section provides information regarding show commands available to monitor and troubleshoot the MME Minimization Drive Test feature.

Show Commands and Outputs

show call-control-profile full all

A new show command out put "Implicit Sending of ULR during local GUTI attach" is added to indicate configured value (Enabled/Disabled).

show call-control-profile full all

The output of this command includes the following fields:

Field	Description
Implicit Sending of ULR during local GUTI attach	Shows whether implicit sending of ULR messages during local GUTI attach is enabled or disabled.
Set Initial-Attach-Indication flag in Implicit ULR	Shows whether initial attach flag is enabled or disabled.

Bulk Statistics

This section provides information on the bulk statistics for the Implicit update to HSS on MME.

HSS Schema Statistics

The following bulk statistics are included in the HSS peer service statistics to track overall statistics.

Table 1: Bulk Statistics Counters in the HSS Peer Service Statistics

Counters	Description
UL Request	The total number of Update Location Request messages containing the result code "Other Errors" received by the HSS peer service from the HSS.
UL Answer	The total number of Update Location Answer messages containing the result code "Other Errors" received by the HSS peer service from the HSS.