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SIM7500_SIM7600

Series_Delta_Package_Update_Application

Note_V1.02

UDA Required

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Version History

Version	Chapter	Comments
V1.00	New Version	
V1.01	3.1.1	Add this chapter
V1.02	3.1.1	Modify AT+NETACT

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1. Introduction

1.1 Overview

The purpose of this document is to describe the usage of Delta package update with SIM7500/SIM7600 module.

Scope not included:

SIM7500A

1.2 References

SIM7500_SIM7600 Series_AT Command Manual_Vx.xx.PDF

1.3 Terms and Abbreviations

For the purpose of this document, following abbreviations apply:

AT (Attention); the first two-character abbreviation are used to start a command line to be sent from TE/DTE to TA/DCE.

2. Software Version management

The commands AT+CGMR and AT+CSUB can be used to get the current software version information:

```
1.AT+CGMR //query software version
   LE11B02SIM7600CE-A_161220 //CP version
2.AT+CSUB
   B02V04 //CP branch version
   MDM9x07_AP_S_22_V1.22_161219 //AP version
```

In order to update software version by delta method, user must select the correct delta file according to:

1) Current software version and target software version provided by command AT+CGMR and AT+CSUB.

2) For example:

V1: LE11B02SIM7600CE-A_161220

B02V04

MDM9X07_AP_S_V1.22_161219

V2: LE11B02SIM7600CE-A_161128

B02V04

MDM9X07_AP_S_V1.22_161125

Suppose V1 is the current version, and V2 is the target version, the delta file should be B02V04_161220_B02V04_161128_SIM7600CE-A.zip

3 Use Delta Package Update

3.1 step by step

The FOTA process can be divided into 4 steps

- 1) Activate the network of the AP module
- 2) Download the delta package
- 3) Write the Delta package into module flash

User can see Download schedule bar, if it has not been completed ,then delta package need to be download it again.

- 4) Using AT+CDELTA to update software version

Download the delta package into the “cache” of the module by FTP method, the “cache” is the dedicated flash resource for the delta package.

3.1.1 Activate the network of the AP module and check again

Commands:

at+netact=1 (Activate the network,this process need 2-10S ,please check the network again. If the AP version above 20170801,the command uses the sixth apn setting.If not,uses the first apn setting.)

at+netact? (Check the network)

For example:

at+netact=1

OK

at+netact?

+NETACT: 1

OK

3.1.2 Download the delta package by FTP GET method

- 1) Put current delta package file to FTP server site;
- 2) Download the delta package into the cache using FTP

commands:

```
at+cota="filename","ip",port,"user","password"
```

or

```
at+cota="filename","ip",port,"user","password",cont
```

```
// Continue the last unfinished download
```

For example:

```
at+cota="/update_ota_test.zip","112.74.93.163",21,"ftp","ftp123
```

```
"
```

Download start: 0.00 %

Download: 26.78 %

Download: 53.55 %

Download: 80.32 %

Download: Complete

OK

Or

```
at+cota="/update_ota_test.zip","112.74.93.163",21,"ftp","ftp123",cont
```

Download start: 53.73 %

Download: 75.93 %

Download: 98.87 %

Download: Complete

OK

Or (some ftp server do not support SIZE,like this)

```
at+cota="/update_ota_test.zip","112.74.93.163",21,"ftp","ftp123"
```

Download start

Downloading

Downloading

Downloading

Download: Complete

OK

3.1.3 Using AT+CDELTA to update software version

AT+CDELTA

OK

3.2 Download the delta package through USB/AT port

3.2.1 Put the delta package into the cache:

AT+CSENDDATA2AP="/cache/update_ota.zip",<file_len>,

//Local delta package name must be update_ota.zip, otherwise cause to upgrade is failed.

OK

NOTE:

- a. Once the command is sent , it will enter the data transmission mode, then you should use SSCOM to transfer the file.
- b. <file_len> is the size of delta package, Other parameters are fixed
- c. if use the PC tools send file, we can supply the demo to you, if you use SSCOM, please must use the version above 5.12.1.

3.2.2 Using AT+CDELTA to update software version

AT+CDELTA

OK

4 Query Software version

1. AT+CGMR //query software version
LE11B02SIM7600CE-A_161128 //CP version
2. AT+CSUB
B02V04 //CP branch version
MDM9X07_AP_S_V1.22_161125 //AP version

From the two points as above can judge software version upgrade is successful.



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