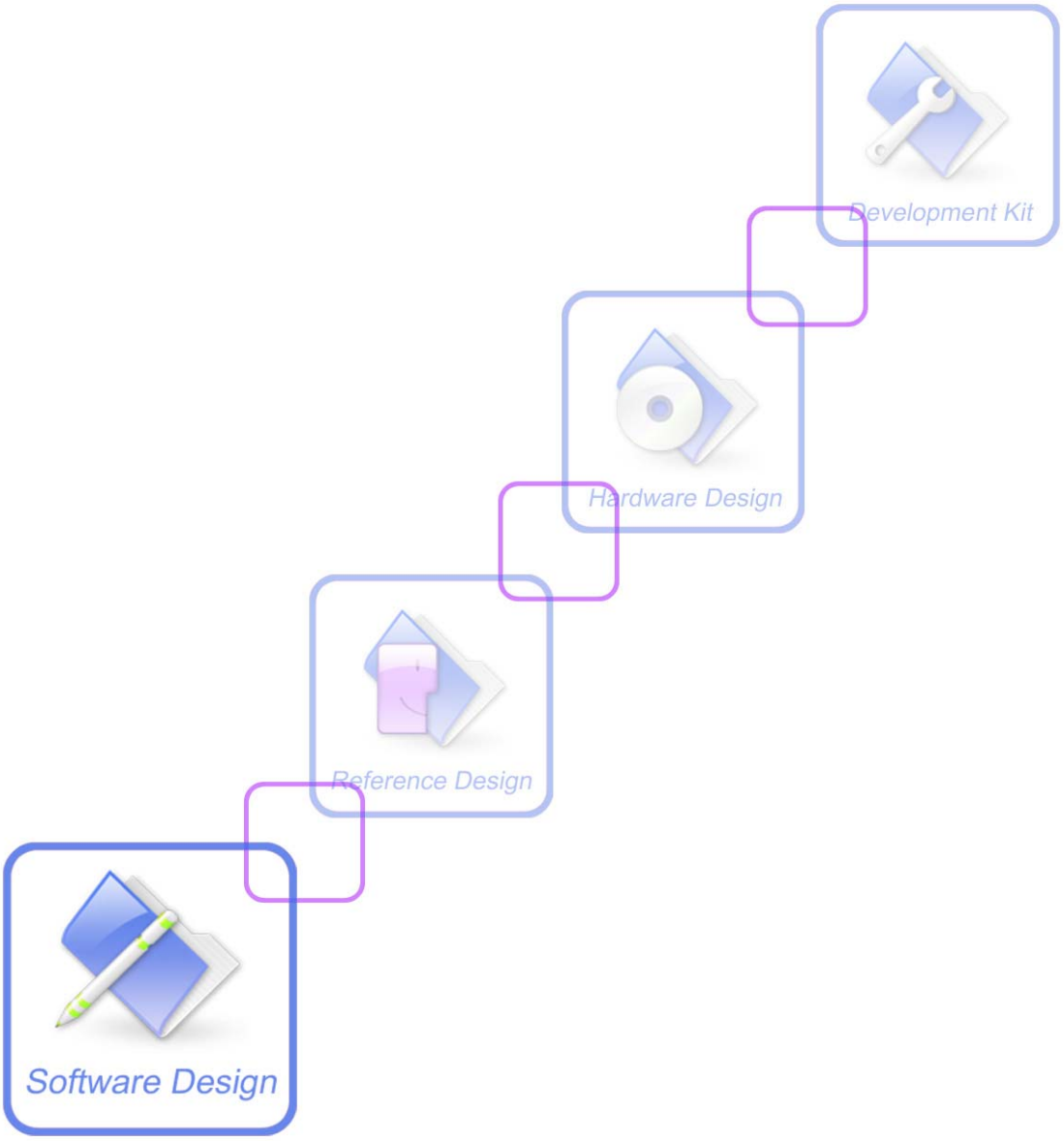
A company of SIM Tech

SIM900 MMS AT Commands Set_V1.04



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Version History

Version	Chapter	What is new
V1.00	Origin	
V1.01	4.3	Modified the example, replace “CMNET” to “CMWAP”.
V1.02	2.4 AT+CMMSSENDCFG 2.25 AT+CMMSSCONT	Added two parameters <subctrl> and <notifyskip>. Added CMMSSENDCFG report values.
V1.03	2.6 AT+CMMSDOWN 2.21 AT+CMMSTIMEOUT	Added support for audio and video data files. Modified the unit of parameters.
V1.04	2.26 AT+CMMSTYPECTL	Added new command

1 Introduction

This document presents the AT command of MMS operation for SIM900. This document can apply to the same series of the modules which contain MMS function, like SIM900, SIM900D, SIM900B and SIM900A.

1.1 Features

1. SIM900 supports sending and receiving MMS only through HTTP protocol.
2. Unicode (both little endian and big endian) and UTF8 are character sets supported and ASCII is supported only for English and numerals.
3. The maximum data size of an MMS is 300 Kbytes.
4. The maximum size of an image file is 300 Kbytes.
5. The maximum size of a text file is 15360 bytes.
6. The maximum number of files to be enclosed is 10.
7. It is necessary to input text data into modem with header of Unicode (both little endian and big endian, “FF FE” is the header for Unicode little endian and “FE FF” is the header for Unicode big endian)
8. It includes “MMS PUSH” in “+CMTI: …” when the received short message is a MMS push message (either M-Notification.ind or M-Delivery.ind [2]).
9. If the current received MMS push message is a concatenated message, it will include “,<m>,<n>” after “MMS PUSH”. <m> is the total number of the parts of the concatenated message and <n> is the index of the current part in the whole concatenated message. For example: +CMTI: "SM",1,"MMS PUSH",2,1. In the URC, 2 means the concatenated push message include two parts and 1 means the current message is the first part. When all the parts of the concatenated push message have been received, it will prompt “+CMTI: …” URC with “MMS PUSH” and without “,<m>,<n>”. For example: +CMTI: "SM",1,"MMS PUSH"
10. X-profile parameters need to be configured for some MMS server, or some problems like image compression error may occur, also the x-profile address which is not configured by default should be set according to the customer’s own hardware environment.
11. The output text from the modem is encoded with little endian Unicode, but the head of Unicode is omitted.
12. It is highly recommended that the parameter <subject> of “AT+CMMSSENDCFG” be set to “2” if not used in china.

1.2 ReferenceA

[1] SIM900 AT Commands Set
[2] wap-209-mmsencapsulation-20020105-a

1.3 Glossary

MMS	multimedia short message
URL	Uniform Resource Locator
UART	Universal Asynchronous Receiver and transmitter
PDU	Protocol Data Unit

2 AT commands

2.1 AT+CMMSCURL

AT+CMMSCURL	**Set the URL of the mms center**
Test Command **AT+CMMSCURL=?**	Response **+CMMSCURL: "URL"** **OK** Parameter See Write Command
Read Command **AT+CMMSCURL?**	Response **+CMMSCURL: <mmscurl>** **OK**
	Parameter See Write Command
Write Command **AT+CMMSCURL=<mmscurl>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter <**mmscurl**> The URL of the mms center.
Reference	Note

2.2 AT+CMMSPROTO

AT+CMMSPROTO	**Set the protocol parameter and MMS proxy**
Test Command **AT+CMMSPROTO=?**	Response **+CMMSPROTO: "(0-255).(0-255).(0-255).(0-255)",(1-65535)** **OK**
	Parameters See Write Command
Read Command **AT+CMMSPROTO?**	Response **+CMMSPROTO: <Gateway>,<Port>**

	OK
	Parameters See Write Command
Write Command **AT+CMMSPROTO=<Gateway>,<Port>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameters <**Gateway**> IP address of MMS proxy. <**Port**> Port of MMS proxy.
Reference	Note

2.3 AT+CMMSCID

AT+CMMSCID Set the network parameters for MMS	
Test Command **AT+CMMSCID=?**	Response **+CMMSCID: (1-3)** **OK**
	Parameter See Write Command
Read Command **AT+CMMSCID?**	Response **+CMMSCID: <value>** **OK**
	Parameter See Write Command
Write Command **AT+CMMSCID=<value>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter

	<value> network parameters, refer to AT+SAPBR
Reference	Note

2.4 AT+CMMSSENDCFG

AT+CMMSSENDCFG Set the parameters for sending MMS	
Test Command **AT+CMMSSENDCFG=?**	Response **+CMMSSENDCFG: (0-6), (0-3),(0,1), (0,1),(0-2),(0-4),(1-2),(0,1)** **OK**
	Parameter See Write Command
Read Command **AT+CMMSSENDCFG?**	Response **+CMMSSENDCFG: <valid>,<pri>,<sendrep>,<readrep>,<visible>,<class>,<subctrl>,<notifrspcheck>** **OK**
	Parameter See Write Command
Write Command **AT+CMMSSENDCFG=[<valid>[,<pri>[,<sendrep>[,<readrep>[,<visible>[,<class>[,<subctrl>[,<notifrspcheck>]]]]]]]]**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter <**valid**> The valid time of sent MMS 0 1 hour 1 12 hours 2 24 hours 3 2 days 4 1 week 5 maximum 6 Not set (default) <**pri**> Priority 0 lowest 1 normal 2 highest 3 Not Set (default) <**sendrep**> Whether it need deliver report

	0 No (default) 1 Yes <**readrep**> Whether it need receive report 0 No (default) 1 Yes <**visible**> Whether it need show the sender address 0 hide the sender address 1 show the sender address even if it is a secret address 2 Not set (default) <**class**> The class of the MMS 0 Personal 1 Advertisement 2 Informational 3 Auto 4 Not set (default) **<subctrl>** Subject control 1 For Chinese character code 2 For English character code **<notifrspcheck>** Whether it need to check the HTTP response of mms notifyrsp ind then to proceed the next step. 0 Waiting for HTTP response 1 Skip waiting for HTTP response
Reference	Note

2.5 AT+CMMSEDIT

AT+CMMSEDIT Enter or exit edit mode	
Test Command **AT+CMMSEDIT=?**	Response **+CMMSEDIT: (0,1)** **OK**
	Parameter See Write Command
Read Command **AT+CMMSEDIT?**	Response **+CMMSEDIT: <mode>** **OK**
	Parameter See Write Command
Write Command **AT+CMMSEDIT=<**	Response **OK**

mode>	or **ERROR** or **+CME ERROR: <err>** Parameter <**mode**> Whether it allows to edit MMS 0 Not allow to edit MMS 1 Allow to edit MMS
Reference	Note It includes adding and deleting receipt, downloading and deleting files, downloading title to edit MMS.

2.6 AT+CMMSDOWN

AT+CMMSDOWN	**Download the file data or title from UART**
Test Command **AT+CMMSDOWN=?**	Response **+CMMSDOWN: "PIC", (1-307200), (5000-),"NAME"** **+CMMSDOWN: "TEXT", (1-15360), (2000-),"NAME"** **+CMMSDOWN: "TITLE", (1-40), (2000-)** **+CMMSDOWN: "AUDIO_AAC", (1-307200), (5000-), "NAME"** **+CMMSDOWN: "AUDIO_AMR", (1-307200), (5000-), "NAME"** **+CMMSDOWN: "AUDIO_BASIC", (1-307200), (5000-), "NAME"** **+CMMSDOWN: "AUDIO_MID", (1-307200), (5000-), "NAME"** **+CMMSDOWN: "AUDIO_MPEG", (1-307200), (5000-), "NAME"** **+CMMSDOWN: "VIDEO_3GPP", (1-307200), (5000-), "NAME"** **+CMMSDOWN: "VIDEO_MP4", (1-307200), (5000-), "NAME"** **OK**
Read Command **AT+CMMSDOWN?**	Response **ERROR**
Write Command **AT+CMMSDOWN=<type>,<size>,<time>[,<name>]**	Response **CONNECT** or **ERROR** or **+CME ERROR: <err>**

	Parameters <**type**> A string parameter which indicates type of downloaded data “TITLE”: mms title data “TEXT”: mms text data “PIC”: mms image data “AUDIO_AAC” mms aac audio data “AUDIO_AMR”: mms amr audio data “AUDIO_BASIC”: mms basic audio data “AUDIO_MID”: mms mid audio data “AUDIO_MPEG”: mms mpeg audio data “VIDEO_3GPP”: mms 3gpp video data “VIDEO_MP4”: mms mp4 video data <**size**> Size in bytes of the data to be downloaded. <**time**> Maximum time in milliseconds to download data. <**name**> The file name of the image or the text to be downloaded, including extended name. The default name for image is “image<n>.jpg” ; for text is “text<n>.txt”; for audio_aac is “audio<n>.aac”; for audio_amr is “audio<n>.amr”; for audio_basic is “audio<n>.au”; for audio_mid is “audio<n>.mid”; for audio_mpeg is “audio <n>.mp3”; for video_3gpp is “audio<n>.3gp”; for video_mp4 is “video<n>.mp4”. <n> is in the range of 0~255.
Reference	Note ● It is strongly recommended to set the time long enough to download all the file data and make sure that the real size of the file to download is not bigger than <size>. ● The maximum size of <name> is 40 bytes and only ASCII code is recognized for <name>.

2.7 AT+CMMSDELFILE

AT+CMMSDELFILE	**Delete the file of the edited MMS by file index**
Test Command **AT+CMMSDELFILE=?**	Response **OK**
Write Command **AT+CMMSDELFILE=<fileIndex>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**

	Parameter <**fileIndex**> The index of the file to be deleted in the MMS. Refer to "+CMMSVIEW"
Reference	Note This command is valid when it is allowed to edit MMS

2.8 AT+CMMSSEND

AT+CMMSSEND	**Start mms sending**
Test Command **AT+CMMSSEND=?**	Response **+CMMSSEND: "ADDRESS"** **OK**
Write Command **AT+CMMSSEND=<address>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter <**address**> a string parameter which indicates address of recipients.
Execution Command **AT+CMMSSEND**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
Reference	Note It is not allowed to input <address> when it not allowed to edit MMS.

2.9 AT+CMMSRECP

AT+CMMSRECP	**Add recipients**
Test Command **AT+CMMSRECP=?**	Response **+CMMSRECP: "ADDRESS"** **OK**
Read Command **AT+CMMSRECP?**	Response **+CMMSRECP:** the list of **<addr>**s

	OK
	Parameter See Write Command
Write Command **AT+CMMSRECP=<addr>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter <**addr**> a string parameter which indicates phone number or email address of recipients. The maximum length of the string is 40.
Reference	Note The maximum of recipients is 20 and this command is valid only when it is allowed to edit MMS.

2.10 AT+CMMSCC

AT+CMMSCC Add copy recipients	
Test Command **AT+CMMSCC=?**	Response **+CMMSCC: "ADDRESS"** **OK**
Read Command **AT+CMMSCC?**	Response **+CMMSCC:** the list of <**addr**>s **OK**
	Parameter See Write Command
Write Command **AT+CMMSCC=<addr>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter <**addr**> a string parameter which indicates phone number or email address of copy recipients. The maximum length of the string is 40.
Reference	Note

	The maximum of copy recipients is 20 and this command is valid only when it is not allowed to edit MMS.

2.11 AT+CMMSBCC

AT+CMMSBCC Add Secret Recipients	
Test Command **AT+CMMSBCC=?**	Response **+CMMSBCC: "ADDRESS"** **OK**
Read Command **AT+CMMSBCC?**	Response **+CMMSBCC:** the list of **<addr>**s **OK**
	Parameter See Write Command
Write Command **AT+CMMSBCC=<addr>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter **<addr>** a string parameter which indicates phone number or email address of secret recipients. The maximum length of the string is 40.
Reference	Note The maximum of secret recipients is 20 and this command is valid only when it is allowed to edit MMS.

2.12 AT+CMMSDELRECP

AT+CMMSDELRECP Delete recipients	
Test Command **AT+CMMSDELRECP=?**	Response **+CMMSDELRECP: "ADDRESS"** **OK**
Write Command **AT+CMMSDELRECP=<addr>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**

	Parameter <**addr**> a string parameter which indicates phone number or email address of recipient. The maximum length of the string is 40.
Execution Command **AT+CMMSDELRECP**	Delete all the recipients Response **OK**
Reference	Note This command is valid when it is allowed to edit MMS.

2.13 AT+CMMSDELCC

AT+CMMSDELCC	**Delete copy recipients**
Test Command **AT+CMMSDELCC=?**	Response **+CMMSDELCC: "ADDRESS"** **OK**
Write Command **AT+CMMSDELCC=<addr>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter <**addr**> a string parameter which indicates phone number or email address of copy recipients. The maximum length of the string is 40.
Execution Command **AT+CMMSDELCC**	Delete all the copy recipients Response **OK**
Reference	Note This command is valid when it is allowed to edit MMS.

2.14 AT+CMMSDELBCC

AT+CMMSDELBCC	**Delete secret recipients**
Test Command **AT+CMMSDELBCC=?**	Response **+CMMSDELBCC: "ADDRESS"** **OK**
Write Command **AT+CMMSDELBC**	Response **OK**

C=<addr>	or **ERROR** or **+CME ERROR: <err>**
	Parameter <**addr**> a string parameter which indicates phone number or email address of recipient. The maximum length of the string is 40.
Execution Command **AT+CMMSDELBCC**	Delete all the secret recipients Response **OK**
Reference	Note This command is valid when it is allowed to edit MMS.

2.15 AT+CMMSRECV

AT+CMMSRECV	**Receive MMS**
Test Command **AT+CMMSRECV=?**	Response **+CMMSRECV: (range of <index>)** **OK**
Write Command **AT+CMMSRECV=<index>**	Response **+CMMSRECV:** **"<sender>","<time>","<subject>",<size><CR><LF>** list of **<fileIndex,name,type,filesize><CR><LF>** **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameters **<index>** The index of the push message saved in the SIM message box. **<sender>** The address of the sender **<time>** The time to receive the MMS **<subject>** the title of the MMS **<size>** The size of the MMS **<fileIndex,name,type,filesize>** The index, name and size of every file included in the MMS. The types are defined as following. 2 text 3 text/html

	4 text/plain 5 image 6 image/gif 7 image/jpg 8 image/tif 9 image/png 10 smil
Reference	Note ● This command is valid only when it is not allowed to edit MMS and the buffer for MMS will be clear up. So it is recommended to save the MMS in the buffer before receiving MMS. ● The received MMS is just saved in the buffer but not saved in the flash.

2.16 AT+CMMSVIEW

AT+CMMSVIEW	**Get the MMS into buffer and show the information**
Test Command **AT+CMMSVIEW=?**	Response **OK**
Execution Command **AT+CMMSVIEW**	Response **+CMMSVIEW: <mmstype>,"<sender>", "<receipts>", "<ccs>", "<bccs>", "<datetime>","<subject>",<size><CR><LF>list of <fileIndex, name, filesize><CR><LF>** **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameters **<mmstype>** The type of MMS 0 Received mms 1 Sent mms 2 Unsent mms **<sender>** The address of th sender **<receipts>** List of recipients, Separated by ";" **<ccs>** List of copy recipients , Separated by ";" **<bccs>** List of secret recipients , Separated by ";" **<datetime>** The time of receive MMS **<subject>** The title of MMS **<size>** Data size of MMS

2.17 AT+CMMSREAD

AT+CMMSREAD Read the given file of the MMS in the buffer	
Test Command **AT+CMMSREAD=?**	Response **OK**
Write Command **AT+CMMSREAD=<fileIndex>**	Response **+CMMSREAD: <name> <datSize>** **File content** **OK**
	Parameters <**fileIndex**> the index of the file to be read from the MMS in the buffer，i.e. the parameter <fileIndex> in "AT+CMMSRECV" and "AT+CMMSVIEW" <**name**> the file name to be read <**datSize**> the size of the file to be read.
Reference	Note If the file type is text, the character set of the output text is Unicode little endian without the header "FF FE".

2.18 AT+CMMSRDPUSH

AT+CMMSRDPUSH Read the information of the MMS PUSH message	
Test Command **AT+CMMSRDPUSH=?**	Response **+CMMSRDPUSH: (**range of <**index**>**)** **OK**
Write Command **AT+CMMSRDPUSH=<index>**	Response **+CMMSRDPUSH: 2,"<sender>","<subject>","<transaction>","<location>","<time>",<class>,<size>** **OK** or **+CMMSRDPUSH: 6, "<receiver>","<time>",<status>** **OK** or **+CMMSRDPUSH: 255**

	OK or **+CME ERROR: <err>**
	Parameters The first parameter of the response should be 2 or 6, or the other type of the MMS PDU. 2 m-notification-ind[2]. To inform the contents of a received MMS 6 m-delivery-ind[2]. A delivery report 255 unknown MMS PDU <**index**> The index of the push message saved in the SIM message box. <**sender**> The address of the sender <**receiver**> The address of the receiver <**subject**> The title of the MMS <**transaction**> The X-Mms-Transation-ID[2] of the received MMS <**location**> The X-Mms-Content-Location[2] of the received MMS <**class**> The X-Mms-Class[2] of the received MMS 0 Personal 1 Advertisement 2 Informational 3 Auto <**time**> Date and time of the received push message. <**size**> The size of the MMS <**status**> The status of the sent MMS 0 Expired 1 Retrieved 2 Rejected 3 Defered 4 Unrecognized
Reference	Note ● This command is valid only when it is not allowed to edit MMS and the buffer for MMS will be clear up. So it is recommended to save the MMS in the buffer before receiving MMS. ● The received MMS is just saved in the buffer but not saved in the flash.

2.19 AT+CMMSUA

AT+CMMSUA Set User Agent	
Test Command **AT+CMMSUA=?**	Response **+CMMSUA: "UserAgent"** **OK**
	Parameter See Write Command
Read Command **AT+CMMSUA?**	Response **+CMMSUA: <UA>** **OK**
	Parameter See Write Command
Write Command **AT+CMMSUA=<UA>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter **<UA>** string type user agent name
Reference	Note

2.20 AT+CMMSPROFILE

AT+CMMSPROFILE Set User Agent Profile	
Test Command **AT+CMMSPROFILE=?**	Response **+CMMSPROFILE: "UserAgentProfile"** **OK**
	Parameter See Write Command
Read Command **AT+CMMSPROFILE?**	Response **+CMMSPROFILE: <UAProfile>** **OK**
	Parameter See Write Command

Write Command **AT+CMMSPROFILE=<UAProfile>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter <**UAProfile**> string type user agent profile
Reference	Note

2.21 AT+CMMSTIMEOUT

AT+CMMSTIMEOUT Set MMS Timeout	
Test Command **AT+CMMSTIMEOUT=?**	Response **+CMMSTIMEOUT: (10-1000),(10-1000)** **OK**
	Parameters See Write Command
Read Command **AT+CMMSTIMEOUT?**	Response **+CMMSTIMEOUT: <Send timeout>,<Recv timeout>** **OK**
	Parameters See Write Command
Write Command **AT+CMMSTIMEOUT=<Send timeout>,<Recv timeout>**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameters **<Send timeout>** Send timeout time, integer type, in seconds. **<Recv timeout>** Receive timeout time, integer type, in seconds.
Reference	Note

2.22 AT+CMMSSTATUS

AT+CMMSSTATUS Get MMS Status	
Test Command **AT+CMMSSTATUS=?**	Response **OK**
	Parameter See Write Command
Read Command **AT+CMMSSTATUS?**	Response **+CMMSSTATUS:<status>** **OK** or **ERROR** or **+CME ERROR: <err>**
	Parameter **<status>** status of MMS action MMS_IDLE MMS_DOWNLOADING MMS_DOWNLOADED MMS_SENDING MMS_RECEIVING MMS_RECEIVED MMS_READING MMS_READING_PUSH
Reference	Note

2.23 AT+CMMSINIT

AT+CMMSINIT Initialize MMS Function	
Test Command **AT+CMMSINIT=?**	Response **OK**
	Parameter See Write Command
Execution Command **AT+CMMSINIT**	Response **OK** or **ERROR** or **+CME ERROR: <err>**

	NO Parameter
Reference	Note When first entering the MMS function, this command must be executed.

2.24 AT+CMMSTERM

AT+CMMSTERM	**Exit MMS Function**
Test Command **AT+CMMSTERM=?**	Response **OK**
	Parameter See Write Command
Execution Command **AT+CMMSTERM**	Response **OK** or **ERROR** or **+CME ERROR: <err>**
	NO Parameter
Reference	Note When exiting the MMS function, this command must be executed.

2.25 AT+CMMSSCONT

AT+CMMSSCONT	**Save MMS Context**
Test Command **AT+CMMSSCONT=?**	Response **OK**
	Parameter See Write Command
Read Command **AT+CMMSSCONT?**	Response **+CMMSSCONT: <mode>** **+CMMSCID: <value>** **+CMMSCURL: <mmscurl>** **+CMMSUA: <UA>** **+CMMSPROFILE: <UAProfile>**

	+CMMSPROTO: <Gateway>,<Port> **+CMMSSENDCFG:<valid>,<pri>,<sendrep>,<readrep>,<visible>,<class>,<subctrl>,<notifyskip>** **+CMMSTIMEOUT: <Send timeout>,<Recv timeout>** **OK**
	Parameter See Write Command
Execution Command **AT+CMMSSCONT**	Response **OK**
	Parameter **<mode>** 0 saved, the value from NVRAM 1 unsaved, the value from RAM For other parameters, see the related command.
Reference	Note

2.26 AT+CMMSTYPECTL

AT+CMMSTYPECTL	**Set the Assembling Method of MMS to be Sent**
Test Command **AT+CMMSTYPECTL=?**	Response **+CMMSTYPECTL: (0,1)** **OK**
	Parameter See Write Command
Read Command **AT+CMMSTYPECTL?**	Response **+CMMSTYPECLT: <mode>** **OK**
	Parameter See Write Command
Write Command **AT+CMMSTYPECTL=<mode>**	Response **OK**

	Parameter **<mode>** 0 application/vnd.wap.multipart.mixed method 1 application/vnd.wap.multipart.related method
Reference	Note

3 Supported unsolicited result codes

3.1 Summary of CME ERROR Codes

Final result code +CME ERROR: <err> indicates an error related to mobile equipment or network. The operation is similar to result code ERROR. None of the following commands in the same Command line should be executed. Neither ERROR nor OK result code will be returned. The following <err> is just the additional <err> code for MMS. About other <err> codes, please refer to [1].

Code of <err>	Meaning
171	MMS task is busy now
172	The mms data is oversized
173	The operation is overtime
174	There is no mms receiver
175	The storage for address is full
176	Failed to find the address
177	The connection to network is failed
178	Failed to read push message
179	This is not a mms push message
180	Gprs in not attached
181	Tcpip stack is busy
182	The mms storage is full
183	The box is empty
184	Failed to save mms
185	It is in edit mode
186	It is not in edit mode
187	No content in the buffer
188	Not find the file
189	Failed to receive MMS
190	Failed to read mms
191	Not M-Notification.ind[2]
192	The mms inclosure is full
193	Unknown

4 Examples

SIM900_MMS module provides MMS solution which communicates via HTTP protocol.
Unicode (little endian and big endian) and UTF8 character set are supported, also ASCII is only supported for English and numerals. SIM900_MMS module can send JPG format pictures. When receiving the title, text and picture data of MMS, module can create a MMS file automatically. You can make phone number or e-mail address as MMS destination.

4.1 Initialization

AT+CMMSINIT //First entering the mms function, this command must be executed.

OK

4.2 Configuration

Before sending or receiving MMS, please configure parameters as following.

AT+CMMSCURL=“mmsc.monternet.com” //Set the MMS center URL without “http://”

OK

AT+CMMSCID=1 //Set bearer context id

OK

AT+CMMSPROTO=“10.0.0.172”,80 //Set the IP address and port of MMS proxy to “10.0.0.172” and 80.

OK

AT+CMMSSENDCFG=6,3,0,0,2,4 //Set the parameter for the MMS PDU to send. This is unnecessary to set. About the details of these parameters, please refer to [2].

OK

4.3 Active bearer profile

AT+SAPBR=3,1,"Contype","GPRS" //Set bearer parameter

OK

AT+SAPBR=3,1,"APN","CMWAP"

OK

AT+SAPBR=1,1 //Active bearer context

OK

AT+SAPBR=2,1
+SAPBR: 1,1,"10.89.193.1"
OK

4.4 Send MMS

AT+CMMSEDIT=1 //Enter edit mode to edit MMS

OK

AT+CMMSDOWN="PIC",12963,20000 //Download an image whose size is 12963 Bytes and the maximum latency time for downloading is 20000 ms. It is recommended to set the latency time as long as enough to download all the data in the latency time.

CONNECT //This means it is ready to receive data from UART. And DCD has been set to low.

... ... //Receive data from UART without echo.

Note: data flow is from module serial port to module buffer; these data are ready for sending latter.

OK //This means all data has been received over, and DCD is set to high.

AT+CMMSDOWN="TITLE",3,5000 //Download a title for the MMS, it is not necessary to download a title for the MMS.

CONNECT //It is similar with downloading an image.

... ...

OK // data is received here, for example, is "hua"

AT+CMMSDOWN="TEXT",5,5000 //Download a text whose size is 5 Bytes and the maximum latency time is 5000 ms. Same as downloading an image, it is recommended to set the latency time long enough.

CONNECT //It is similar to the previous downloading operations.

.....

Note: here, if the data is in Unicode (big endian) format, it must begin with "FE FF"; if the data is in Unicode (little endian) format, it must follow with "FF FE". For example, the data

is “00 31 00 32 00 33 00 34” in big endian format, then before sending, it should be encode to “FE FF 00 31 00 32 00 33 00 34”.

OK // data,for example is “ilove”

AT+CMMSRECP=“13918181818” //Add the first recipient.
OK //Successfully to add a recipient.

Note: following AT commands in italics are optional

AT+CMMSCC=”13564545454” // add copy address
OK
AT+CMMSBCC=”simcom@sim.com” // add secret email address
OK
AT+CMMSDELBCC // delete BCC address
OK
AT+CMMSDELCC // delete CC address
OK
AT+CMMSCC=”simcom@sim.com” // add email address as secret destination
OK

AT+CMMSVIEW
+CMMSVIEW:
2, "", "13918181818","","simcom@sim.com","2003-01-01,12:07:18","480055004100",13054
1,"image1.jpg", 7, 12963
2,"text0.txt", 4, 5

OK

AT+CMMSDELFILE=2
OK

Note: here, TEXT data of MMS is cancelled, that’s” text0.txt”.

AT+CMMSVIEW
+CMMSVIEW:
2, "", "13918619573","","inviolet@163.com","2003-01-01,12:07:18","480055004100",13007
1,"image1.jpg", 7, 12963

OK

Note: here you can see that the second part of MMS has been cancelled.

AT+CMMSSEND // send MMS
…… // sending, serial port will not respond to any AT command

OK // sent successfully

AT+CMMSEDIT=0 //Exit from edit mode and the MMS in buffer will be cleared up.

OK

4.5 Receive MMS

+CMTI: "SM",3,"**MMS PUSH**" //received a MMS push message

AT+CMMSEDIT=0 //exit edit mode. It is not allowed to receive MMS in edit mode.

OK

AT+CMMSRECV=3 //Receive the MMS from the MMS proxy

+CMMSRECV: "+8613818181818", "2008-05-02, 03:38:12","", 26670

1, "image0.jpg",7,26625

OK //Successfully receives the MMS and the MMS includes the file “image0.jpg” whose size is 26625 Bytes. The sender is “+8613818181818”. The size the MMS body is 26670 Bytes.

AT+CMGD=3 //Delete the MMS push message.

OK

4.6 Receive MMS when the MMS push message is a concatenated message

+CMTI: "SM",1,"MMS PUSH",**2**,**1** //receive the first part of a concatenated MMS push message which includes two parts

+CMTI: "SM",2,"MMS PUSH",**2**,**2** //receive the second part of a concatenated MMS push message which include two parts

+CMTI: "SM",1,"MMS PUSH" //receive all the parts of the concatenated MMS push message

AT+CMMSEDIT=0 //exit edit mode. It is not allowed to receive MMS in edit mode.

AT+CMMSRECV=1 //Receive the MMS from the MMS proxy

+CMMSRECV: "+85266097746","2009-04-15,10:41:21","",49

1,"text0.txt",4,7

OK

AT+CMGD=1 //Delete the MMS push message and all the parts of the concatenated MMS push message will be deleted.

OK

4.7 Read a file of MMS

```
AT+CMMSREAD=1                    //The parameter 1 is the index of the file in the MMS.
                                   Please refer to the response of AT+CMMSRECV=3.
+CMMSREAD: "image0.jpg", 26625   //Include file name and size
……                               //The data of the file “image0.jpg”
OK                               //All the data of the file has been read over
```

4.8 Exit MMS function

```
AT+CMMSTERM                      // Exiting the MMS function

OK
```

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