



# **IntelliSoftware**

## **SMS Gateway - HTTP Interface**

**Version 1.10**

**Content subject to change**

IntelliSoftware Ltd.  
Arena Business Centre  
Holyrood Close  
Poole  
Dorset  
ENGLAND  
BH17 7FJ  
Tel: +44 (0)1202 311572  
Fax: +44 (0)870 762 0876  
Web: [www.intellisoftware.co.uk](http://www.intellisoftware.co.uk)

# Contents

- 1. Document History**
- 2. HTTP Interface Overview**
- 3. Submitting to our gateway**
  - 3.1. Send Text Message**
  - 3.2. Send MMS Message**
  - 3.3. Send WAP Push Message**
  - 3.4. Send Binary Message**
  - 3.5. Send Unicode Message**
  - 3.6. Get Credit Balance**
  - 3.7. Retrieve MMS Message**
- 4. Responses back from our gateway**
  - 4.1. Receive SMS Message**
  - 4.2. Message Status Report**
  - 4.3. Receive MMS Message**
  - 4.4. Network Codes**
- 5. Advanced Features**
  - 5.1. Send to Distribution Lists (Group Send)**
  - 5.2. Reply Tracking**

## 1. Document History

Version	Date	Author	Description
1.0	09/12/2000	Chris Vine	First Release
1.1	20/07/2002	Chris Vine	Added Receive Message forwarding
1.2	14/08/2002	Chris Vine	Added Message Status Report forwarding
1.3	25/03/2005	Chris Vine	Added Binary and WAP Push SMS Submissions
1.4	28/07/2005	Chris Vine	Added MMS Support
1.5	23/08/2005	Chris Vine	Corrected Retrieve MMS URL
1.6	16/11/2005	Chris Vine	Corrected 'Message Expired' status code
1.7	19/10/2006	Chris Vine	Added Unicode Support and Advanced Features
1.8	23/02/2009	Chris Vine	Added MMS Messaging
1.9	27/04/2009	Chris Vine	Updated Company Address
1.10	14/01/2010	Chris Vine	Added parameter 'sent' to received SMS message forwarding

## 2. HTTP Interface Overview

The SMS Gateway provides a HTTP and HTTPS interface to enable your applications to send and receive messages over the Internet. Message parameters are submitted in HTTP form fields, using either POST or GET method. Click on the Services below to see details of the required Form fields.

### Services:

<b>Send Text Message</b>	Sends a standard SMS text message.
<b>Send MMS Message</b>	Sends a Multimedia MMS message.
<b>Send WAP Push Message</b>	Sends a WAP PUSH message. WAP PUSH messages can be used to send multimedia content to mobile phones.
<b>Send Binary Message</b>	Sends a Binary Message. Binary Messages can be used to send SmartMessages, such as Ringtones and Logos.
<b>Send Unicode Message</b>	Sends a Unicode Message.
<b>Get Credit Balance</b>	Returns the current balance of your account.
<b>Retrieve MMS Message</b>	Retrieves an MMS Message part.

### Receiving:

<b>Receive SMS Message</b>	We can forward SMS messages that arrive in your SMS Inbox to your web server using a HTTP POST.
<b>Message Status Report</b>	Message Delivery Reports can be sent to your web server using a HTTP POST.
<b>Receive MMS Message</b>	We can forward a notification that an MMS messages has arrive in your MMS Inbox to your web server using a HTTP POST.

### 3. Submitting to our gateway

#### 3.1. Send Text Message

You can send SMS messages using the HTTP/S interface. Parameters are specified in the URL or as POST parameters:

**`http://www.intellisoftware.co.uk/smsgateway/sendmsg.aspx?username=MyUsername  
&password=MyPassword&to=44771012345,44771054321&text=TheMessage`**

For secure SSL connection use **https**:

##### Parameters:

username=	This is the username of your account
password=	This is the password for your account
to=	This is the destination phone number. A maximum of 100 numbers can be specified, separated by commas.
text=	The content of the text message
from=	(Optional) This is the source/sender's phone number
maxconcat=	Maximum number of concatenated SMS messages that will be sent per recipient (Default is 1)

##### Responses:

ID:10011000000000000001	Message has been sent to the gateway. The unique message ID follows 'ID:'
ERR:LOGIN_INVALID	Username or Password is invalid
ERR:INSUFFICIENT_CREDIT	Insufficient credit balance to fulfil request
ERR:NO_XXXXXXXXXX	A mandatory parameter is missing
ERR:INVALID_NUMBER	Unable to route to the destination phone number
ERR:INVALID_REQUEST	The request was not valid
ERR:GATEWAY_ERROR	Unable to process request at this time
ERR:INTERNAL_ERROR	Unable to process request at this time

##### Response Formats:

Single line response is returned when sending to a single recipient or when the whole submission fails:

```
ID:10011000000000000001
```

```
ERR:INSUFFICIENT_CREDIT
```

Multiline response is returned when sending to multiple recipients:

```
44771012345, ID:10011000000000000001  
44771012346, ID:10011000000000000001  
44771054321, ERR:INVALID_NUMBER
```

A line is returned per recipient. Each line contains the recipient's number (international format), followed by comma, followed by the response. The ID applies to the whole submission and is identical for each recipient.

NOTE: The phone numbers listed in the response may not be identical to the numbers submitted. This is due to processing done to the numbers, e.g. international dialling codes added, duplicate numbers removed.

## 3.2. Send MMS Message

You can send MMS messages using the HTTP/S interface. The MMS message is submitted over the HTTP interface using the Multipart Form Data format.

### Submission URL:

<http://www.intellisoftware.co.uk/msgateway/default.aspx>

For secure SSL connection use **https**:

### Request Data:

Request data contains submission parameters and the MMS message part files

```
Content-Type: multipart/form-data; boundary=AaB03x
--AaB03x
Content-Disposition: form-data; name="username"
Content-Type: text/plain

YourUsername
--AaB03x
Content-Disposition: form-data; name="password"
Content-Type: text/plain

YourPassword
--AaB03x
Content-Disposition: form-data; name="to"
Content-Type: text/plain

0771012345
--AaB03x
Content-Disposition: form-data; name="from"
Content-Type: text/plain

0771054321
--AaB03x
Content-Disposition: form-data; name="type"
Content-Type: text/plain

5
--AaB03x
Content-Disposition: form-data; name="text"
Content-Type: text/plain

MMS Message Subject
--AaB03x
Content-Disposition: form-data; filename="file1.txt"
Content-Type: text/plain

... contents of file1.txt ...
--AaB03x
Content-Disposition: form-data; filename="file2.gif"
Content-Type: image/gif
Content-Transfer-Encoding: binary

...contents of file2.gif...
--AaB03x--
```

**Parameters:**

username=	This is the username of your account
password=	This is the password for your account
to=	This is the destination phone number. A maximum of 100 numbers can be specified, separated by commas.
text=	The content of the MMS message subject message (UTF-8 Encoded)
from=	(Optional) This is the source/sender's phone number. Leave blank to receive replies. Can be numerical (e.g. long number or shortcode), alphanumeric sender's Id's not supported.
type=	Message Type (5 = MMS Message)

**Responses:**

ID:10011000000000000001	Message has been sent to the gateway. The unique message ID follows 'ID:'
ERR:LOGIN_INVALID	Username or Password is invalid
ERR:INSUFFICIENT_CREDIT	Insufficient credit balance to fulfil request
ERR:NO_XXXXXXXXXX	A mandatory parameter is missing
ERR:INVALID_NUMBER	Unable to route to the destination phone number
ERR:INVALID_REQUEST	The request was not valid
ERR:GATEWAY_ERROR	Unable to process request at this time
ERR:INTERNAL_ERROR	Unable to process request at this time

**Response Formats:**

Single line response is returned when sending to a single recipient or when the whole submission fails:

```
ID:10011000000000000001
```

```
ERR:INSUFFICIENT_CREDIT
```

Multiline response is returned when sending to multiple recipients:

```
44771012345, ID:10011000000000000001  
44771012346, ID:10011000000000000001  
44771054321, ERR:INVALID_NUMBER
```

A line is returned per recipient. Each line contains the recipient's number (international format), followed by comma, followed by the response. The ID applies to the whole submission and is identical for each recipient.

NOTE: The phone numbers listed in the response may not be identical to the numbers submitted. This is due to processing done to the numbers, e.g. international dialling codes added, duplicate numbers removed.

### 3.3. Send WAP Push Message

You can send a WAP PUSH message using the HTTP/S interface. WAP PUSH messages can send multimedia content, such as an Image, Wallpaper, Ringtone or a link to WAP website.

The example below sends a link to an image:

```
http://www.intellisoftware.co.uk/smsgateway/sendmsg.aspx?username=MyUsername
&password=MyPassword&to=44771012345,44771054321&type=4
&text=The+message+text&href=http://www.intellisoftware.co.uk/images/IntelliSMS.gif
```

For secure SSL connection use **https**:

#### Parameters:

username=	This is the username of your account
password=	This is the password for your account
to=	This is the destination phone number. A maximum of 100 numbers can be specified, separated by commas.
type=	Message Type (4 = WAP PUSH)
text=	Display Text for WAP PUSH message
href=	URL link to resource ( should start with 'http://' or 'https://' )
from=	(Optional) This is the source/sender's phone number

#### Responses:

ID:10011000000000000001	Message has been sent to the gateway. The unique message ID follows 'ID:'
ERR:LOGIN_INVALID	Username or Password is invalid
ERR:INSUFFICIENT_CREDIT	Insufficient credit balance to fulfil request
ERR:NO_XXXXXXXXXX	A mandatory parameter is missing
ERR:INVALID_NUMBER	Unable to route to the destination phone number
ERR:INVALID_REQUEST	The request was not valid. Check sizes of text and href parameters, see note below.
ERR:PARAMETER_MISSING	The mandatory 'href' parameter is missing
ERR:GATEWAY_ERROR	Unable to process request at this time
ERR:INTERNAL_ERROR	Unable to process request at this time

#### Considerations:

Our gateway will only send one SMS message per submission. Therefore a WAP PUSH message is charged at 1 credit.

An INVALID\_REQUEST will result if the submitted text and href parameters would require 2 SMS messages to be sent. As a guide, the href and text parameters combined should not exceed 114 characters (assuming href starts with 'http://www.' )



### 3.5. Send Unicode Message

You can send Unicode SMS messages using the HTTP/S interface. The Unicode format is used to send multilingual messages not support by the standard GSM character set.

See [Unicode Character Codes](#) for more details.

The example below sends a Unicode message:

**[http://www.intellisoftware.co.uk/smsgateway/sendmsg.aspx?username=MyUsername  
&password=MyPassword&to=44771012345,44771054321&type=2 &hex=00480045004C004C004F](http://www.intellisoftware.co.uk/smsgateway/sendmsg.aspx?username=MyUsername&password=MyPassword&to=44771012345,44771054321&type=2 &hex=00480045004C004C004F)**

For secure SSL connection use **https**:

#### Parameters:

username=	This is the username of your account
password=	This is the password for your account
to=	This is the destination phone number. A maximum of 100 numbers can be specified, separated by commas.
type=	Message Type (2 = Unicode)
hex=	Unicode text encoded in hexadecimal (140 octets max, 70 unicode characters)
from=	(Optional) This is the source/sender's phone number

#### Responses:

ID:100110000000000000000001	Message has been sent to the gateway. The unique message ID follows 'ID:'
ERR:LOGIN_INVALID	Username or Password is invalid
ERR:INSUFFICIENT_CREDIT	Insufficient credit balance to fulfil request
ERR:NO_XXXXXXXXXXXX	A mandatory parameter is missing
ERR:INVALID_NUMBER	Unable to route to the destination phone number
ERR:INVALID_REQUEST	The request was not valid
ERR:PARAMETER_MISSING	The mandatory 'hex' parameter is missing
ERR:PARAMETER_INVALID	The 'hex' parameter are malformed
ERR:GATEWAY_ERROR	Unable to process request at this time
ERR:INTERNAL_ERROR	Unable to process request at this time

### 3.6. Get Credit Balance

You can obtain your current balance via the HTTP interface as follows:

<http://www.intellisoftware.co.uk/msgateway/getbalance.aspx?username=MyUsername&password=MyPassword>

#### Parameters:

username=	This is the username of your account
password=	This is the password for your account

#### Responses:

BALANCE:100	The number of remaining credits follows 'BALANCE:'
ERR:LOGIN_INVALID	Username or Password is invalid
ERR:NO_XXXXXXXXXX	A mandatory parameter is missing
ERR:INTERNAL_ERROR	Unable to process request at this time

### 3.7. Retrieve MMS Message

You can retrieve an MMS Message part via the HTTP interface as follows:

**[http://www.intellisoftware.co.uk/smsgateway/retrievemms.aspx?  
username=MyUsername&password=MyPassword&msgid=50011000000001  
&msgpart=cid1.gif](http://www.intellisoftware.co.uk/smsgateway/retrievemms.aspx?username=MyUsername&password=MyPassword&msgid=50011000000001&msgpart=cid1.gif)**

#### Parameters:

username=	This is the username of your account
password=	This is the password for your account
msgid=	Unique message id
msgpart=	Filename or Index (1 based) of required MMS Message part

#### Responses:

ERR:LOGIN_INVALID	Username or Password is invalid
ERR:MSGID_INVALID	Message id does not match a received MMS message
ERR:NO_USERNAME	The username parameter is missing
ERR:NO_PASSWORD	The password parameter is missing
ERR:NO_MSGID	The msgid parameter is missing
ERR:PARAMETER_MISSING	The msgpart parameter is missing
ERR:PARAMETER_INVALID	A parameter is invalid
ERR:GATEWAY_ERROR	Unable to process request at this time
ERR:INTERNAL_ERROR	Unable to process request at this time

To receiving notifications when an MMS message has been received please see section 4.3.

## 4. Responses back from our gateway

### 4.1. Receive SMS Message

Our server can be configured to forward received SMS messages to you webserver via a HTTP POST.

To configure HTTP forwarding please login into your account and go to Preferences and then select the Forwarding tab.

#### POST Fields:

from	The mobile number of the message sender.
text	The content of the text message
msgid	IntelliSoftware's allocated message id
sent	Date and time message was sent (in W3CDTF DateTime Format) Examples: 2010-02-03T13:50:05-00:00 = 3rd February 2010 13:50:05 GMT 2010-06-10T14:45:12+01:00 = 10th June 2010 14:45:12 BST
networkcode	The sender's home network. This parameter is only available for messages received on shortcodes. See <a href="#">Network Code table</a> for values.

#### HTTP Response:

Our server expects a HTTP 200 (OK) status. Any content returned by your server will be ignored.

If anything other than a status 200 is returned then our server will consider this an error. On an error condition our server will retry to delivery the same message every 5 minute until the error is resolved.

#### ASP Example:

```
<%  
From = Request("from")  
Text = Request("text")  
  
-- Place code here to use From and Text values  
-- e.g. store message to a database  
  
%>
```

## 4.2. Message Status Report

Our server can be configured to forward message status reports (e.g. Delivery Reports) to your webserver via a HTTP POST.

To configure HTTP forwarding please login into your account and go to Preferences and then select the Forwarding tab.

### POST Fields:

msgid	Unique message id (as returned when message was sent)
status	The message status: 0 - Unknown 1 - OK 2 - Message Queued 3 - Message Sent 4 - Message Delivered 5 - Error With Request 6 - Unable To Deliver 7 - Routing Error 8 - Message Expired
toaddr	Phone Number message was sent to

### HTTP Response:

Our server expects a HTTP 200 (OK) status. Any content returned by your server will be ignored.

If anything other than a status 200 is returned then our server will consider this an error. On an error condition our server will retry to delivery the same status report every 5 minute until the error is resolved.

### ASP Example:

```
<%  
MsgId = Request("msgid")  
Status = Request("status")  
ToAddr = Request("toaddr")  
  
-- Place code here to use MsgId, Status and ToAddr values  
-- e.g. store status report to a database  
  
%>
```

### 4.3. Receive MMS Message

Our server can be configured to forward received MMS messages to you webserver via a HTTP POST.

To configure HTTP forwarding please login into your account and go to Preferences and then select the Forwarding tab.

#### POST Fields:

from	The mobile number of the message sender.
text	The MMS message's Subject field
msgid	The message id, this is required to retrieve the MMS message contents
type	The message type: 1 - SMS Text message 5 - MMS Message
filelist	Comma separated list of component filenames

#### HTTP Response:

Our server expects a HTTP 200 (OK) status. Any content returned by your server will be ignored.

If anything other than a status 200 is returned then our server will consider this an error. On an error condition our server will retry to delivery the same message every 5 minute until the error is resolved.

#### ASP Example:

```
<%  
From      = Request("from")  
Text      = Request("text")  
MsgId     = Request("msgid")  
Type      = Request("type")  
FileList  = Request("filelist")  
  
-- Place code here to use values  
-- e.g. store message to a database  
  
%>
```

To retrieve MMS message content see section 3.7.

#### 4.4. Network Codes

Here is a list of network codes returned by the IntelliSoftware SMS platform:

234010	O2 (UK)
234015	Vodafone (UK)
234020	Three (UK)
234030	T-Mobile (UK)
234033	Orange (UK)
0	Network Unknown

## 5. Advanced Features

### 5.1. Send to Distribution Lists (Group Send)

Our gateway allows you to send SMS messages to preconfigured Distribution Lists or Groups. To send to a Distribution List or Group simply insert the Group Name where you would normally place the recipient's phone number. Distribution Lists or Groups are setup in your online account login on the Contacts page.

### 5.2. Reply Tracking

The IntelliSoftware platform provides tracking of SMS replies, allowing you to determine which particular message a mobile user is replying to. When you submit a message to the SMS Gateway you can supply a User Context parameter. When a reply is received, the IntelliSoftware platform will include the User Context parameter when forwarding the message to your server.

The User Context can be supplied to the IntelliSoftware platform in the following ways:

.Net Component	use SendMsgWithUserContext method
COM Component	use SendMessageWithUserContext method
HTTP Interface	add 'usercontext' POST/GET parameter
PHP SDK	use SendMessageWithUserContext method
Java SDK	use SendMessageWithUserContext method

The IntelliSoftware platform will forward the User Context for received messages in the following ways:

HTTP Interface	'usercontext' POST/GET parameter
----------------	----------------------------------