

API Documentation International SMS Service

USER GUIDE

TELSPIEL COMMUNICATIONS PVT LTD

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Preamble

This document underlines the specifications of the HTTP/HTTPS based API provided by telSpiel for the automated sending of SMS via Internet within telSpiel infrastructure. The document is intended for developers planning on integrating their systems with telSpiel's SMS service. It also provides the information about sending the Unicode and Flash messages.

Customer Support Team

As an organisation we do follow strict timelines and adhere highest level of SLAs to fulfil our commitment. Our customer support team professional are highly qualified industry veterans are handholding with you 24X7X365 from proof of concept till post-sales support. Our team is reachable at following touchpoints.

Touchpoint	Technical Support	Campaigns	Account Configuration
Email	care@telspiel.com	campaigns@telspiel.com	configuration@telspiel.com
Phone	(+91) 9999998898 (Ext 1)	(+91) 9999998898 (Ext 2)	(+91) 999998898 (Ext 3)
Availability	24 / 7	09:00 Hrs - 21:00 Hrs	09:00 Hrs - 21:00 Hrs

Sample HTTPS URL Format

The below HTTPS API can be used by Client to send the messages to telSpiel's Server. A sample of the URL could be in the below format.

Base URL

All URLs referenced in the API documentation have the following base:

http://telspl.in/bulksms/bulksms?

Sample format

http://telspl.in/bulksms/bulksms?username=XXXX&password=YYYYY&type=Y&dlr=Z&destination=QQQQQQQQ&source=RRRR&message=SSSSSSS<&url=KKKK>

API Parameters Specification

Whenever the Client Application hits the HTTP URL, it should include the following parameters as per the requirement. Please note that all the parameters (especially message and URL) should be URL-UTF-8 encoded. The following parameters should be used in the same order as given below to call HTTP API.



Parameter Name	Description
Username	User ID; will be provided by SMS Platform
Password	Password; will be provided by SMS platform
Destination	The target mobile number on which the SMS is being sent (may or may not include a '+' sign), multiple mobile numbers can be separated by commas (note the comma (',') should be URL encoded).
DLR	0: No Delivery report required 1: Delivery report required
Source	The source address that should appear in the message. Max Length of 18 if Only Numeric Max Length of 11 if Alpha numeric If you wish plus ('+') should be prefixed to the sender address when the message is displayed on his cell phone, please prefix the plus sign to your sender address while submitting the message (note the plus sign should be URL encoded). Additional restrictions on this field may be enforced by the SMSC.
Туре	Type of message 0: Plain Text (GSM 3.38 Character encoding) 1: Flash Message (GSM 3.38 Character encoding) 2: Unicode 3: Reserved 4: WAP Push 5: Plain Text (ISO-8859-1 Character encoding) 6: Unicode Flash



	7: Flash Message (ISO-8859-1 Character encoding)
	The message to send (Can be used for 'long' messages, that is, messages longer than 160 characters for plain text, 140 for flash and 280 for Unicode) for concatenated (long) messages we will be counting as one message for every 153 characters for plain text.
Message	268 characters for Unicode, as the rest of the characters will be used by the system for packing extra information for reassembling the message on the cell phone.
	In case of WAP Push (type = 4), this is the text that would appear in the message. Also in the latter case, to send non-English characters in the message, you only have to directly URL encode them (using UTF-8 character encoding scheme).
URL	If sending a WAP Push message (type=4), this holds the link that you wish to send, for any other type of message, no value needs to be supplied for this field (if specified will be ignored). Just like "message" field, this field should also be URL encoded with UTF-8 character encoding (even for sending non-ASCII domain names).

Sample Error Response

API Response Sample Format

<Error_Code>|<destination>|<mess
age_id>,<Error_Code>|<destination>|<mess
age_id>...

Exceptions

A request containing multiple destinations will be aborted immediately if any error other than "Invalid Destination" is found, in case an invalid destination is found we just skip that destination and proceed to the next destination.

If while processing the request the SMPP Server goes down, the HTTP API will retry a fixed number (with a gap of ten milliseconds between consecutive retries) of times to reconnect to the SMPP server and submit the message.



In case the SMPP server does not come up before the fixed number of attempts are exhausted, the batch will be aborted at that destination and a message will be returned in following format: -

<Error_Code>|<destination>|<message_id>,<Error_Code>|<destination>|<message_id>,1709|<destination_at_which_batch_aborted>

The third and final situation which can arise is the credits can get exhausted in the middle of a request being serviced. In case such a situation occurs, we will be aborting the batch on the destination at which we got the "Insufficient_Credit" error, and a response in the following format will be returned to the client: -

<Error_Code>|<destination>|<message_id>,<Error_Code>|<destination>|<message_id>,1025|<destination_at_which_batch_aborted>



Error Code Description

The below error can be displayed while hitting the HTTP API if there is any wrong parameter entered or issue with the account.

Error Code	Description
1701	Success, Message Submitted Successfully, In this case you will receive the response 1701 <cell_no> <message id="">, The message Id can then be used later to map the delivery reports to this message.</message></cell_no>
1702	Invalid URL Error, this means that one of the parameters was not provided or left blank
1703	Invalid value in "username" or "password" field
1704	Invalid value in "type" field
1705	Invalid "Message"
1706	Invalid "Destination"
1707	Invalid "Source" sender
1708	Invalid value for "DLR" field
1709	User validation failed
1710	Internal error
1715	Response timeout
1025	Insufficient credits

Note:

Along with the above errors codes, standard SMPP v3.4 error codes may also be returned where applicable.



Apart from 1709, Please DO NOT RETRY re-sending the message for any other error code (including SMPP v3.4 Error codes).

For 1715, Do not re-submit the same message again.

Send Plain Message (GSM 03.38 character set)

HTTP API has end to end support for plain text message.

Sample Format

http://telspl.in/bulksms/bulksms?username=XXXX&password=YYYYY&type=0&dlr=1 &destination=%2B8302584891&source=XXXXXX&message=Demo%20Message!!!

Observation

- 1. 'type=0', indicates this is a message of type plain text, this mode supports all characters falling under the GSM 03.38 character set.
- 2. 'dlr=1', indicates delivery report for this message is enabled.
- 3. 'message=Demo%20Message!!!', The message field contains the content to send in an URL encoded format, on using the appropriate username and password in the above link you will get the 'Demo Message!!!' on your mobile phone.
- 4. 'destination=%2B8302584891', An optional plus is included in the destination field here, Do note that the '+' sign is URL encoded.

Send Plain Message (ISO-8859-1 character set)

HTTP API has end to end support for plain text message.

Sample Format

http://telspl.in/bulksms/bulksms?username=XXXX&password=YYYYY&type=5&dlr=0 &destination=8302584891&source=XXXXXXX&message=Demo%20Message!!!

Observation

- 1. 'type=5', indicates message is of type plain text, this mode supports all characters falling under the ISO-8859-1 character set.
- 2. 'dlr=0', indicates delivery report for this message is not enabled.
- 3. 'message=Demo%20Message!!!', the message field contains the message to send in an URL encoded format, on using the appropriate username and password in the above link you will get the message "Demo Message!!!" on your mobile phone.
- 4. 'destination=8302584891, the optional '+' has been omitted.



Send Flash Message (GSM 03.38 character set)

HTTP API has end to end support for flash message.

Sample Format

http://telspl.in/bulksms/bulksms?username=XXXX&password=YYYYY&type=1&dlr=0 &destination=8302584891&source=XXXXXXX&message=Demo%20Message!!!

Observation

- 1. 'type=1', indicates message is of type flash message, this mode supports all characters falling under the GSM 03.38 character set.
- 2. 'dlr=0', indicates delivery report for this message is not enabled.
- 3. 'message=Demo%20Message!!!', the message field contains the message to send in an URL encoded format, on using the appropriate username and password in the above link you will get the message "Demo Message!!!" on your mobile phone.
- 4. 'destination=8302584891, the optional '+' has been omitted.

Send Unicode/Multilingual Flash Message (UTM-16BE format)

HTTP API has end to end support for Unicode flash message.

Sample Format

http://telspl.in/bulksms/bulksms?username=XXXX&password=YYYYY&type=6&dlr=0 &destination=8302584891&source=XXXXXXX&message=00440065006D006F0020004 D00650073007300610067006500210021

Observation

- 1. 'type=6', indicates message is of type Unicode flash message, this mode supports all characters falling under the UTM-16BE format.
- 2. 'dlr=0', indicates delivery report for this message is not enabled.
- 3. 'message=00440065006D006F0020004D00650073007300610067006500210021 0021, the message field contains the message to send in an URL encoded format, on using the appropriate username and password in the above link you will get the message "Demo Message!!!" on your mobile phone.
- 4. 'destination=8302584891, the optional '+' has been omitted.



Send Unicode/Multilingual Message (UTM-16BE format)

HTTP API has end to end support for Unicode message.

Sample Format

http://telspl.in/bulksms/bulksms?username=XXXX&password=YYYYY&type=2&dlr=0 &destination=8302584891&source=XXXXXXX&message=00440065006D006F0020004 D00650073007300610067006500210021

Observation

- 1. 'type=2', indicates message is of type Unicode message, this mode supports all characters falling under the UTM-16BE format.
- 2. 'dlr=0', indicates delivery report for this message is not enabled.
- 3. 'message=00440065006D006F0020004D00650073007300610067006500210021 0021, the message field contains the message to send in an URL encoded format, on using the appropriate username and password in the above link you will get the message "Demo Message!!!" on your mobile phone.
- 4. 'destination=8302584891, the optional '+' has been omitted.



API Call (Using .NET)

```
Imports System.IO
Imports System.Net
Imports System.Data
Partial Class SendUsingSMPP
Inherits System.Web.UI.Page
Protected Sub Page_Load(ByVal sender As Object, ByVal e As
System.EventArgs) Handles Me.Load
Dim WebRequest As Net.WebRequest 'object for WebRequest
Dim WebResonse As Net.WebResponse 'object for WebResponse
......
' DEFINE PARAMETERS USED IN URL
......
'To what server you need to connect to for submission
'i.e. Dim Server As String = "xxxxx.xxxxx.xxxxx"
Dim Server As String = ""
'Port that is to be used like 8080 or 8000
Dim Port As String = ""
'Username that is to be used for submission
'i.e. Dim UserName As String = "tester"
Dim UserName As String = ""
' password that is to be used along with username
'i.e. Dim Password As String = "password"
Dim Password As String = ""
'What type of the message that is to be sent.
'0:means plain text
'1:means flash
'2:means Unicode (Message content should be in Hex)
'6:means Unicode Flash(Message content should be in Hex)
Dim type As Integer = 0
'Message content that is to be transmitted
Dim Message As String = "Test Message"
'Url Encode message
Message = HttpUtility.UrlEncode(Message)
If (Message = 2) Or (Message = 6) Then
        Message = ConvertToUnicode(Message)
End If
'Require DLR or not
'0:means DLR is not Required
'1:means DLR is Required
Dim DLR As Integer = 1
'Sender Id to be used for submitting the message
'i.e. Dim SenderName As String = "test"
Dim Source As String = ""
'Destinations to which message is to be sent For submitting more
'destination at once destinations should be comma separated Like
```



```
'91999000123,91999000124
Dim Destination As String = ""
Dim WebResponseString As String = ""
Dim URL As String = "http://" & Server & ":" & Port &
"/bulksms/bulksms?username=" & UserName & "&password=" & Password & "&type=" &
type & "&dlr=" & DLR & "&destination=" & Destination & "&source=" &Source & "&message=" & Message & ""
WebRequest = Net.HttpWebRequest.Create(URL) 'Hit URL Link
WebRequest.Timeout = 25000
WebResonse = WebRequest.GetResponse 'Get Response
Dim reader As IO.StreamReader = New
IO.StreamReader(WebResonse.GetResponseStream)
'Read Response and store in variable
WebResponseString = reader.ReadToEnd()
WebResonse.Close()
Response.Write(WebResponseString) 'Display Response.
Catch ex As Exception
WebResponseString = "Request Timeout" 'If any exception
Response.Write(WebResponseString)
End Try
End Sub
'Function To Convert String to Unicode if MessageType=2 and 6.
Public Function ConvertToUnicode(ByVal str As String) As String
Dim ArrayOFBytes() As Byte =
System.Text.Encoding.Unicode.GetBytes(str)
Dim UnicodeString As String = ""
Dim v As Integer
For v = 0 To ArrayOFBytes.Length - 1
If v Mod 2 = 0 Then
Dim t As Integer = ArrayOFBytes(v)
ArrayOFBytes(v) = ArrayOFBytes(v + 1)
ArrayOFBytes(v + 1) = t
End If
Next
For v = 0 To ArrayOFBytes.Length - 1
Dim c As String = Hex$(ArrayOFBytes(v))
If c.Length = 1 Then
c = "0" & c
End If
UnicodeString = UnicodeString & c
Next
Return UnicodeString
End Function
```

End Class



API Call (Using PHP)

```
<?php
class Sender{
var $host;
var $port;
* Username that is to be used for submission
var $strUserName;
* password that is to be used along with username
var $strPassword;
* Sender Id to be used for submitting the message
var $strSender;
/*
* Message content that is to be transmitted
var $strMessage;
* Mobile No is to be transmitted.
*/
var $strMobile;
*What type of the message that is to be sent
* 0:means plain text
* 1:means flash
* 2:means Unicode (Message content should be in Hex) 
* 6:means Unicode Flash (Message content should be in Hex) 
* 
*/
var $strMessageType;
* Require DLR or not
* 0:means DLR is not Required 
* 1:means DLR is Required 
* 
*/
var $strDlr;
private function sms__unicode($message){
$hex1=";
if (function_exists('iconv')) {
$latin = @iconv('UTF-8', 'ISO-8859-1', $message);
```

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```
if (strcmp($latin, $message)) {
 $arr = unpack('H*hex', @iconv('UTF-8', 'UCS-
 2BE', $message));
 $hex1 = strtoupper($arr['hex']);
 if($hex1 ==''){
 $hex2=";
 $hex="';
 for ($i=0; $i < strlen($message); $i++){
 $hex = dechex(ord($message[$i]));
 $len =strlen($hex);
 4 - 1e^{2}
 if(\$len < 4){
 for($j=0;$j<$add;$j++){
 $hex="0".$hex;
 $hex2.=$hex;
 return $hex2;
 else{
 return $hex1;
 }
 print 'iconv Function Not Exists !';
 //Constructor..
 public function Sender ($host,$port,$username,$password,$sender, $message,$mobile,
 $msgtype,$dlr){
 $this->host=$host;
 $this->port=$port;
 $this->strUserName = $username;
 $this->strPassword = $password;
 $this->strSender= $sender;
 $this->strMessage=$message; //URL Encode The Message..
 $this->strMobile=$mobile;
 $this->strMessageType=$msgtype;
 $this->strDlr=$dlr;
 public function Submit(){
 if($this->strMessageType=="2" ||
 $this->strMessageType=="6") {
 //Call The Function Of String To HEX.
$this->strMessage = $this->sms_unicode($this->strMessage);
```

ß



```
try{
// http Url to send sms.
$live_url="http://".$this->host.":".$this->port."/bulksms/bulksms?username=".$this-
>strUserName."&password=".$this->strPassword."&type=".$this->strMessageType."&dlr=".$this-
>strDlr."&destination=".$this->strMobile."&source=".$this->strSender."&message=".$this->strMessage."";
$parse url=file($live url);
echo $parse_url[0];
}catch(Exception $e){
echo 'Message:' .$e->getMessage();
}
}
else
$this->strMessage=urlencode($this->strMessage);
try{
// http Url to send sms.
$live_url="http://".$this->host.":".
$this->port."/bulksms/bulksms?username=".$this->strUserName."&password=".$this-
>strPassword."&type=".$this->strMessageType."&dlr=".$this->strDlr."&destination=".$this-
>strMobile."&source=".$this-
>strSender."&message=".$this->strMessage."";
$parse_url=file($live_url);
echo $parse_url[0];
catch(Exception $e){
echo 'Message:' .$e->getMessage();
}
//Call The Constructor.
$obj = new Sender("IP","Port","","","Tester"," قوي الله عرب $3"," 919990001245
,"2","1");
$obj->Submit ();
?>
```

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API Call (Using JAVA)

```
import java.io.BufferedReader;
   import java.io.DataOutputStream;
   import java.io.InputStreamReader;
   import java.net.HttpURLConnection;
   import java.net.URL;
import java.net.URLEncoder;
   *An Example Class to use for the submission using HTTP API You can perform
   *your own validations into this Class For username, password, destination,
   *source, dlr, type, message, server and port
   **/
public class Sender {
   // Username that is to be used for submission
   String username;
   // password that is to be used along with username
   String password;
   // Message content that is to be transmitted
   String message;
   *What type of the message that is to be sent
   * 0:means plain text
   * 1:means flash 
   * 2:means Unicode (Message content should be in Hex) 
   * 6: means Unicode Flash (Message content should be in Hex) 
   * 
   */
   String type;
   * Require DLR or not
   * < U|>
   * 0:means DLR is not Required 
   * 1:means DLR is Required 
   * 
   */
   String dlr;
   *Destinations to which message is to be sent For submitting more than one
   * destination at once destinations should be comma separated Like
   * 91999000123,91999000124
   String destination;
   // Sender Id to be used for submitting the message
```

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```
String source;
    // To what server you need to connect to for submission
    String server;
    // Port that is to be used like 8080 or 8000
int port;
    public Sender(String server, int port, String username, String password,
    String message, String dlr, String type, String destination,
    String source) {
    this.username = username;
    this.password = password;
    this.message = message;
    this.dlr = dlr;
    this.type = type;
    this.destination = destination;
    this.source = source;
    this.server = server;
this.port = port;
private void submitMessage() {
  try {
    // Url that will be called to submit the message
    URL sendUrl = new URL("http://" + this.server + ":" + this.port
    + "/bulksms/bulksms");
    HttpURLConnection httpConnection = (HttpURLConnection) sendUrl
    .openConnection();
    // This method sets the method type to POST so that
    // will be send as a POST request
    httpConnection.setRequestMethod("POST");
    // This method is set as true wince we intend to send
    // input to the server httpConnection.setDoInput(true);
    // This method implies that we intend to receive data from server.
    httpConnection.setDoOutput(true);
    // Implies do not use cached data
    httpConnection.setUseCaches(false);
    // Data that will be sent over the stream to the server. DataOutputStream
    dataStreamToServer = new DataOutputStream(
    httpConnection.getOutputStream());
    dataStreamToServer.writeBytes("username="
    + URLEncoder.encode(this.username, "UTF-8") + "&password="
    + URLEncoder.encode(this.password, "UTF-8") + "&type="
+ URLEncoder.encode(this.type, "UTF-8") + "&dlr="
    + URLEncoder.encode(this.dlr, "UTF-8") + "&destination="
    + URLEncoder.encode(this.destination, "UTF-8") + "&source="
    + URLEncoder.encode(this.source, "UTF-8") + "&message="
    + URLEncoder.encode(this.message, "UTF-8"));
```



```
dataStreamToServer.flush();
    dataStreamToServer.close();
    // Here take the output value of the server.
    BufferedReader dataStreamFromUrl = new BufferedReader(
            new InputStreamReader(httpConnection.getInputStream()));
            String dataFromUrl = "", dataBuffer = "";
            // Writing information from the stream to the buffer
            while ((dataBuffer = dataStreamFromUrl.readLine()) != null) {
                    dataFromUrl += dataBuffer;
            * Now dataFromUrl variable contains the Response received from the
            * server so we can parse the response and process it accordingly.
            dataStreamFromUrl.close();
            System.out.println("Response: " + dataFromUrl);
} catch (Exception ex) {
            ex.printStackTrace();
    }
public static void main(String[] args) {
  try {
            // Below exmaple is for sending Plain text
            Sender s = new Sender("smpp2.xxxxxxxx.com", 8080, "tester909",
            "test11", "test for unicode", "1", "0", "919869533416",
            "Update");
            s.submitMessage();
            // Below exmaple is for sending unicode
            Sender s1 = new Sender("smpp2.xxxxxxxxx.com", 8080, "xxxx",
            "xxx", convertToUnicode("test for unicode").toString(),
            "1", "2", "919869533416", "Update");
            s1.submitMessage();
} catch (Exception ex) {
}
    *Below method converts the unicode to hex value
    * @param regText
    *@return
private static StringBuffer convertToUnicode(String regText) {
            char[] chars = regText.toCharArray();
            StringBuffer hexString = new StringBuffer();
```

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GSM 03.38 Character Set

GSM 03.38 Character set

	GSM 03.38																
		x0	x1	x2	хЗ	x4	х5	хб	x7	x8	x 9	xΑ	хB	хC	хD	хE	хF
	0x	(3)	£	\$	¥	è	é	ù	ì	ò	Ç	LF	Ø	Ø	CR	Å	å
	1x	Δ	_	Φ	Γ	Λ	Ω	П	Э	Σ	Θ	Ξ	ESC	Æ	æ	В	É
	2x	SP	!	"	#	×	%	&	-	()	*	+	,	-		/
	3x	0	1	2	3	4	5	6	7	8	9	-:	;	\	=	>	?
	4x	i	Α	В	С	D	Е	F	G	Н	Ι	J	K	L	Μ	N	0
	5x	Р	Q	R	s	Т	U	٧	W	Χ	Υ	Z	Ä	Ö	Ñ	Ü	§
	бх	ن.	а	b	С	d	е	f	g	h	i	j	k	1	m	n	0
	7x	р	q	r	s	t	u	٧	W	Х	У	z	ä	ö	ñ	ü	à
1B	0x												FF				
1B	1 x					^											
1B	2x									{	}						\
1B	3x													[~]	
1B	4x	_															
1B	5x																
1B	бх						€										
1B	7x																



ISO-8859-1 Character Set

ISO-8859-1 Character set

						ISC)/II	EC 8	885	9-1						
	x0	x1	x2	хЗ	х4	х5	х6	х7	х8	х9	xΑ	хВ	хC	хD	хE	хF
0x	0x unused															
1x	unuseu															
2x	SP	!	"	#	\$	%	&	'	()	*	+	,	-		/
3x	0	1	2	3	4	5	6	7	8	9	:	.,	<	=	>	?
4x	@	Α	В	С	D	Е	F	G	Н	I	J	K	L	М	N	0
5x	Р	Q	R	S	Т	U	V	W	Χ	Υ	Z	[\]	^	_
бх	`	а	b	С	d	е	f	g	h	i	j	k	-	m	n	0
7x	р	q	r	s	t	u	٧	W	Х	у	Z	{		}	2	
8x								uni	used	4						
9x								un	15 e 0							
Ax	NBSP	i	¢	£	×	¥	1	§	:	©	a	«	Г	SHY	®	_
Вх	0	±	2	3	,	μ	¶		,	1	0	*	1/4	1/2	3/4	خ
Сх	À	Á	Â	Ã	Ä	Å	Æ	Ç	È	É	Ê	Ë	Ì	Í	Î	Ϊ
Dx	Ð	Ñ	Ò	Ó	Ô	õ	Ö	×	Ø	Ù	Ú	Û	Ü	Ý	Þ	ß
Ex	à	á	â	ã	ä	å	æ	ç	è	é	ê	ë	ì	ĺ	î	Ϊ
Fx	ð	ñ	ò	ó	ô	õ	ö	÷	Ø	ù	ú	û	ü	ý	þ	ÿ

Code values 00–1F, 7F, and 80–9F are not assigned to characters by ISO/IEC 8859-1.

Connect telSpiel

Website: www.telspiel.com

Phone: (+91) 120-4552429

Email: care@telspiel.com

Address:

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UP, India









