

Solutions that shine

Sunwire SolSwitch API

for Application Providers using JSON/HTTP

850 Barrydowne Road, Sudbury, ON P3A 3T7

1-833-727-6777 www.sunwire.ca



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Sunwire SolSwitch API

This document outlines the API interface used for interacting with SolSwitch systems through outside applications. The functions available and the guidelines for using them are described below. The API functions use JSON for communication and follow the following guidelines:

The application provider will provide a delivery agent that can send JSON over HTTP as contenttype application/json.

For security reasons, the API requires either a system generated API key to be used or a specific IP address to be given permission to connect. For additional security, both measures can be enabled.

The JSON document must be posted to the API URL as the contents of the HTTP POST, i.e. the HTTP POST will deliver the document as content-type application/json and not as an embedded file inside an encoded form. This means that the delivery agent will need to access the HTTP POST content directly instead of using encoded form methods or tools for encoding name-value pairs.

All API URLs will be formatted as follows, where 'solswitch' is the IP or domain of the desired system, and 'function' is the name of the function being called (as provided below):

solswitch/api/function/

Any questions related to the use and functionality of the API can be directed to <u>software@sunwire.ca</u>



Call Functions

Add Header

Insert a custom header into an upcoming outbound call.

Add Header URL: solswitch/api/addheader/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been
	enabled.
srcnumber	The source number to apply the new custom header to. Optional if
	dstnumber is set. If call originating from an extension, srcnumber should
	be the extension number.
dstnumber	The destination number to apply the new custom header to. Optional if
	srcnumber is set.
header-name	The name of the custom header to be applied.
value	The value of the custom header.

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.

Request	Response (SUCCESS)
POST /api/addheader HTTP/1.1	{
Content-Type: application/json	"Status": "OK"
Content-Length: 124	}
{	Response (FAIL)
"Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",	{
"srcnumber": "123",	"Status": "FAIL",
"header-name": "ExampleHeader",	"Reason": "Missing
"value": "ExampleValue"	required field destination
}	number or source number "
	}



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Hold Call

The Hold Call function is used to put an active call on hold.

Hold Call URL: solswitch/api/holdcall/

The Request must contain the following attributes:

Channel	Channel of an active call to be put on hold, as returned by 'List Active Calls'.
Customer	ID of the customer the function should run on, should be a numeric value. Optional field, if not provided the system will default to CustID 1.
Кеу	API key for connection to the system. Required field if an API key has been
	enabled.

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.

Request	Response (SUCCESS)
POST /api/holdcall HTTP/1.1	{
Content-Type: application/json	"Status": "OK"
Content-Length: 96	}
{	Response (FAIL)
"Channel": "SIP/Example2-000003ee",	{
"Customer": "4",	"Status": "FAIL",
"Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd"	"Reason": "Unknown
}	Customer ID"
	}



New Call

The New Call function is used to generate a call from a user's extension to a specified destination.

New Call URL: solswitch/api/newcall/

The Request must contain the following attributes:

Extension	The extension number of the user on the system. Extensions are numeric
	values, 3 to 5 digits in length.
Destination	The destination the call should be connected to. Destination is a numeric
	value.
Customer	ID of the customer the function should run on, should be a numeric value.
	Optional field, if not provided the system will default to CustID 1.
Кеу	API key for connection to the system. Required field if an API key has been
	enabled.

The Request may contain the following attributes:

CustomDVData	An array containing kay value pairs for substitution when using a DigitValidation as the Extension attribute.
	When processing replacements we use \${} to determine variable names. For example to replace a variable URL within the request you would use \${URL} to denote where to place that data and pass an array containing the key URL with some value.
CustomDVDigits	An array containing special instruction for handling digits being pressed when using a DigitValidation as the Extension attribute. The digit is the index of the array with the value containing the instructions. All attribute values are passed through substitution for the CustomDVData array. Setting the URL attribute to "https://\${URL}/api/" would replace \${URL} with whatever you set in the above array.
	Attributes URL – URL to use in place of the set URL for the Digit Validation Method – POST or GET Auth – Type of authentication to use. For example "Header" authorization would expect AuthInfo to contain "type" and "credentials" AuthInfo – Dependant on the Auth type above



Response – A special response to send if the request to the URL was
successful
CustomData – An array containing data to be sent to the URL instead of
the regular call data
Headers – An array of headers to add to the request
NoURL – Boolean value determining whether or not to try to call out to
the URL of the DigitValidation

The Response will contain the following attributes:

Status	ʻOK' or ʻFAIL'	
CallID	ID of the connected call (On OK return status).	
Channel	Source channel of the connected call (On OK return status).	
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and	
	explanations can be found at the end of this document.	

Request	Response (SUCCESS)
POST /api/newcall HTTP/1.1	{
Content-Type: application/json	"Status": "OK",
Content-Length: 109	"CallID": "758923",
{	"Channel":
"Extension": "123",	"SIP/Example2-000004fb"
"Destination": "17055551234",	}
"Customer": "4",	Response (FAIL)
"Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd"	{
}	"Status": "FAIL",
	"Reason": "Error with
	Key"
	}



Outbound Fax

The Outbound Fax function is used to send a fax to a specified number.

Outbound Fax URL: solswitch/api/fax/

The Request may contain the following attributes:

Customer	ID of the customer the function should run on, should be a numeric value.	
	Optional field, if not provided the system will default to CustID 1.	
Кеу	API key for connection to the system. Required field if an API key has been	
	enabled.	
То	The fax number to send to. No '-'s allowed	
From	The fax number to send from. No '-'s allowed. Must be set up as a	
	FaxToEmail DID.	
File	Location of the .pdf file to send. This file must be accessible from the	
	SolSwitch.	

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and explanations can be found at the end of this document.
Status	The only thing we return with this is whether or not the fax was queued properly.

```
Request
POST /api/fax HTTP/1.1
Content-Type: application/json
Content-Length: 74
{
    "Customer": "4",
    "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",
    "To": "7055553482",
    "From": "7055551234",
    "File": "http://path.to.file/faxMe.pdf"
}
Response (SUCCESS)
{
    "Status": "OK"
```

```
}
```



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Response (FAIL)

{

```
"Status": "FAIL",
"Reason": "You must upload a file to fax"
```



Transfer Call

The Transfer Call function is used to transfer a current active call to a new destination.

Transfer Call URL: solswitch/api/transfercall/

The Request must contain the following attributes:

Channel	Channel of the call to be transferred to a new destination, as returned by	
	'List Active Calls'.	
Destination	The destination the call should be transferred to. Destination is a numeric	
	value.	
Customer	ID of the customer the function should run on, should be a numeric value.	
	Optional field, if not provided the system will default to CustID 1.	
Кеу	API key for connection to the system. Required field if an API key has been	
	enabled.	

The Response will contain the following attributes:

Status	'OK' or 'FAIL'	
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and	
	explanations can be found at the end of this document.	

Request	Response (SUCCESS)
POST /api/transfercall HTTP/1.1 Content-Type: application/json Content-Length: 124	{ "Status": "OK" }
<pre>{ "Channel": "SIP/Example2-000003ee", "Destination": "17055551234", "Customer": "4", "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd" }</pre>	Response (FAIL) { "Status": "FAIL", "Reason": "IP address not allowed" }



Transmit DTMF

The Transmit DTMF function is used to send a DTMF tone to a specified channel.

Transmit DTMF URL: solswitch/api/dtmf/

The Request must contain the following attributes:

Tone	The DTMF tone to be transmitted, accepted values are: 0-9 * #	
Channel	Channel of an active call where the tones should be sent. This would be	
	the channel of the desired recipient, as returned by the 'List Active Calls'	
	function.	
Customer	ID of the customer the function should run on, should be a numeric value.	
	Optional field, if not provided the system will default to CustID 1.	
Кеу	API key for connection to the system. Required field if an API key has been	
	enabled.	

The Response will contain the following attributes:

Status	'OK' or 'FAIL'	
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and	
	explanations can be found at the end of this document.	

Request	Response (SUCCESS)
POST /api/dtmf HTTP/1.1	{
Content-Type: application/json	"Status": "OK"
Content-Length: 107	}
<pre>{ "Tone": "#1", "Channel": "SIP/Example-000003ee", "Customer": "4", "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd" }</pre>	Response (FAIL) { "Status": "FAIL", "Reason": "Unknown Channel" }



Call Reporting

Agent Stats

The Agent Stats function returns all relevant information for Agent busy status.

Agent Stats URL: solswitch/api/agentstats/

The Request may contain the following attributes:

Customer	ID of the customer the function should run on, should be a numeric value. Optional field, if not provided the system will default to CustID 1.
Кеу	API key for connection to the system. Required field if an API key has been enabled.
Extension	Optional. If provided will only return information related to given extension.
Date	Optional. If provided will only return information related to given date. If no date is provided, return will default to the current date. Format: YYYY-MM-DD
DateStart	Conditionally Optional. If provided, DateEnd is required. This will limit the returned data to be within DateStart and DateEnd . Format: YYYY-MM-DD
DateEnd	Conditionally Optional. If provided, DateStart is required. This will limit the returned data to be within DateStart and DateEnd . Format: YYYY-MM-DD

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.
Extension IDs	Details on the individual extensions (On OK return status)
	Attributes
	ActionIDs – Array of all actions performed by the extension
ActionIDs	Array of all actions performed by the extension
	<u>Attributes</u>
	Action – The new status of the extension
	DateTime – The datetime this action was done



DateTimeUnix – The unixtime the action was done
ReasonCode – The reason code used to enable busy/paused status if one
was required

Example

```
Request
POST /api/agentstats HTTP/1.1
Content-Type: application/json
Content-Length: 74
{
    "Customer": "4",
    "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",
    "Date": "2018-05-30"
```

Response (SUCCESS)

```
"Status": "OK",
     "220": {
       "978398": {
        "Action": "In",
         "DateTime": "2018-05-30 00:00:00",
         "DateTimeUnix": 1527652800,
         "ReasonCode": ""
       },
       "978400": {
         "Action": "Paused",
         "DateTime": "2018-05-30 11:28:35",
         "DateTimeUnix": 1527694115,
         "ReasonCode": "10"
       },
       "978401": {
         "Action": "Out",
         "DateTime": "2018-05-30 23:59:59",
         "DateTimeUnix": 1527739199,
         "ReasonCode": ""
       }
     }
Response (FAIL)
     "Status": "FAIL",
     "Reason": "No matching end time"
```



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Call Recording

The Call Recording function is used to retrieve the URL(s) for the audio file(s) of a recorded call. A single call could have multiple recordings if the call went to multiple places on the system (ex, if the call was transferred to a second extension).

Call Recording URL: solswitch/api/recording/

The Request must contain the following attributes:

CallID	Unique ID of the call to retrieve recordings for
Customer	ID of the customer the function should run on, should be a numeric value.
	Optional field, if not provided the system will default to CustID 1.
Кеу	API key for connection to the system. Required field if an API key has been
	enabled.

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Recording	Array of call recordings and relevant information.
	<u>Attributes</u>
	StartTime – Time that this portion of the call connected
	EndTime – Time that this portion of the call ended
	Duration – Duration of this portion of the call
	SourceName – Name of the caller
	SourceNumber – Extension or number of caller
	SourceChannel – Channel of the source of the call
	DestinationNumber – Extension or number the call was connected to
	DestinationChannel – Channel of the destination of the call
	DialedNumber – Actual number dialed for this portion of the call
	URL – URL to download the MP3 file of the recording
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.

```
Request
POST /api/recording HTTP/1.1
Content-Type: application/json
Content-Length: 78
```



```
"CallID": "62135",
     "Customer": "4",
     "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd"
Response (SUCCESS)
     "Status": "OK"
     "Recording": [
      {
        "StartTime": "2018-01-20 14:00:00",
        "EndTime": "2018-01-20 14:01:23",
        "Duration": "00:01:23",
        "SourceName": "Example Caller",
        "SourceNumber": "7055551234",
        "SourceChannel": "SIP/Example3-000006e1",
        "DestinationNumber": "456",
        "DestinationChannel": "SIP/Example2-000003ee",
        "DialedNumber": "7052221234",
        "URL": "solswitch/download-
file.php?id=621351&sc=a7ebe5fa6b5c110d9be13d23fefaa256"
      },
        "StartTime": "2018-01-20 14:01:23",
        "EndTime": "2018-01-20 14:14:35",
        "Duration": "00:13:12",
        "SourceName": "Example Caller",
        "SourceNumber": "7055551234",
        "SourceChannel": "SIP/Example3-000006e1",
        "DestinationNumber": "654",
        "DestinationChannel": "SIP/Example-000003f2",
        "DialedNumber": "654",
        "URL": "solswitch/download-
file.php?id=721892&sc=c56afe7890d5c64b784cadeffe45acb45"
       },
    1
Response (FAIL)
     "Status": "FAIL",
     "Reason": "Unknown CallID"
```



Caller ID Request

The Caller ID Request function returns all relevant information about an ongoing call.

Caller ID Request URL: solswitch/api/calleridrequest/

The Request may contain the following attributes:

Customer	ID of the customer the function should run on, should be a numeric value. Optional field, if not provided the system will default to CustID 1.
Кеу	API key for connection to the system. Required field if an API key has been enabled.
Extension	Extension number of the person you'd like to get the Caller ID information from.

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.
DailedNumber	This is the DID the calling party dialed to begin the call
IVROption	If the person calling came in through an IVR this will be the option
	selected. Otherwise it will be -1
CallerNumber	The is the caller ID number of the calling party
CallerName	This is the caller ID name of the calling party. If no caller ID name was
	supplied this will be the same as the CallerNumber

Example

{

```
Request
POST /api/calleridrequest HTTP/1.1
Content-Type: application/json
Content-Length: 74
{
    "Customer": "4",
    "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",
    "Extension": "220"
}
```

Response (SUCCESS)

"Status": "OK", "DialedNumber": "7055551234", "IVROption": "3",



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"CallerNumber": "7055554321", "CallerName": "Test Caller"

Response (FAIL)

{

"Status": "FAIL", "Reason": "Invalid extension number given"



CDR Export

The CDR Export function returns all relevant information about calls between 2 dates.

CDR Export URL: solswitch/api/cdrexport/

The Request may contain the following attributes:

Customer	ID of the customer the function should run on, should be a numeric value.
	Optional field, if not provided the system will default to CustID 1.
Кеу	API key for connection to the system. Required field if an API key has been
	enabled.
DateStart	This will limit the returned data to be within Date Start and Date End .
	Format: YYYY-MM-DD
DateEnd	This will limit the returned data to be within Date Start and Date End .
	Format: YYYY-MM-DD

The Response will contain the following attributes:

Status	ʻOK' or ʻFAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error
	messages and explanations can be found at the end of this
	document.
CallID	This has an array of returned data sorted by CallID
LegID	The ID of the call Leg
StartTime	This is the time the call connected to the SolSwitch
ConnectTime	This is the time the call was connected to a second party
EndTime	This is the time the call was ended by either party
SourceName	Caller ID name of the calling party
SourceNumber	Caller ID number of the calling party
DestinationName	Caller ID name of the called party
DestinationNumber	Caller ID number of the called party
Disposition	This is what happened during that leg of the call. It will show if
	a call was answered, transferred, etc
DialedNumber	This is the number that was dialed to reach the called party
SourceType	See <u>RouteTypes</u> for ID values
DestinationType	See <u>RouteTypes</u> for ID values
CallCode	Call Reason Code if agent was required to enter a reason for
	the call.



Example

```
Request
POST /api/cdrexport HTTP/1.1
Content-Type: application/json
Content-Length: 74
{
    "Customer": "4",
    "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",
    "DateStart": "2018-05-15 00:00:00",
    "DateEnd": "2018-05-15 23:59:59"
}
```

Response (SUCCESS)

```
"Status": "OK",
   "669932": [{
     "LegID": "669932",
     "StartTime": "2018-05-15 11:07:45",
     "ConnectTime": "",
    "EndTime": "2018-05-15 11:07:47",
     "SourceName": "Test Phone #1",
     "SourceNumber": "220",
    "DestinationName": "Test Phone #2",
     "DestinationNumber": "290",
     "Disposition": "NOANSWER",
     "DialedNumber": "290",
     "SourceType": "7",
     "DestinationType": "7",
     "CallCode": ""
   },
     "LegID": "669933",
     "StartTime": "2018-05-15 11:31:42",
     "ConnectTime": "2018-05-15 11:31:44",
     "EndTime": "2018-05-15 11:31:51",
     "SourceName": "Test Phone #1",
     "SourceNumber": "7055551234",
     "DestinationName": "Test Phone #2",
     "DestinationNumber": "290",
     "Disposition": "ANSWERED",
     "DialedNumber": "7055553584",
     "SourceType": "15",
     "DestinationType": "7",
     "CallCode": ""
   }]
Response (FAIL)
```



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"Status": "FAIL", "Reason": "No matching end time" }

** note if a call has multiple legs it will show as an array of legs. Otherwise it will be a single object



List Active Calls

The List Active Calls function returns all relevant information of current active calls.

List Active Calls URL: solswitch/api/listactivecalls/

The Request may contain the following attributes:

Customer	ID of the customer the function should run on, should be a numeric value. Optional field, if not provided the system will default to CustID 1.
Кеу	API key for connection to the system. Required field if an API key has been enabled.

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.
Calls	Details on the individual calls (On OK return status)
	Attributes
	CallID – The unique ID of the call
	SourceNumber – The phone number or extension of the source of the call
	SourceChannel – The call channel connected to the source of the call
	DestinationNumber – The phone number or extension of the destination
	of the call
	DestinationChannel – The call channel connected to the destination of
	the call
	Duration – Length of the call in format HH:MM:SS

Example

{

```
Request
POST /api/listactivecalls HTTP/1.1
Content-Type: application/json
Content-Length: 74
{
    "Customer": "4",
    "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd"
}
Response (SUCCESS)
```

```
"Status": "OK",
```



```
"Calls":
              ſ
      {
        "CallID": "667890",
        "SourceNumber": "7055551234",
        "SourceChannel": "SIP/Example-000003f2",
        "DestinationNumber": "123",
        "DestinationChannel": "SIP/Example2-000003ee",
        "Duration": "00:01:23"
       },
       {
         "CallID": "667891",
         "SourceNumber": "345",
         "SourceChannel": "SIP/Example3-000006e1",
         "DestinationNumber": "7055551234",
         "DestinationChannel": "SIP/Example4-000004fe",
         "Duration": "00:00:46"
       },
    ]
Response (FAIL)
{
     "Status": "FAIL",
     "Reason": "IP does not have access"
```



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Live Queue Stats

Insert a custom header into an upcoming outbound-call

Add Header URL: solswitch/api/livequeuestat/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been enabled.
customer	ID of the customer the function should run on, should be a numeric value.
	Optional field, if not provided the system will default to CustID 1.
queuelD	ID of the Queue the function should run on, should be numeric value.
	Optional field, if not provided the system will default to All Queues

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Ext	Extension of the Queue
Queue	Name of the Queue
Calls	Current Calls of that queue
Callback	Number of callers waiting to be called back
Avail.Agnts	Available Agents for that queue
Abandoned	Number of calls Abandoned
WaitTime	Current smallest wait time
EstimatedWaitTime	Average Wait time for that queue
Voicemail	Current amount of voicemail
ServiceLevel	Service Level of the queue at that moment
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and explanations can be found at the end of this document.

```
Request
POST /api/livequeuestat HTTP/1.1
Content-Type: application/json
Content-Length: 124
{
    "Key": "FzeKKeEKSwXG2FW8jd",
    "customer": "1",
    "queueID": "7"
}
```



```
Response (SUCCESS)
[
    {
        "Ext": "222",
        "Queue": "JVQueue",
        "Calls": "0",
        "Callback": "0",
        "Avail.Agnts": "2",
        "Answered": "0",
        "Abandoned": "0",
        "WaitTime": "00:00:00",
        "EstimatedWaitTime": "00:00:07",
        "Voicemail": "0",
        "ServiceLevel": "0.0000"
    },
{will repeat for every available/requested Queue}
    {
        "Status": "OK"
    }
1
Response (FAIL)
{
     "Status": "FAIL",
     "Reason": "No access to customer number 1"
```



System Management

911 Info

List the current 911 information for each DID on the SolSwitch.

911 Info URL: solswitch/api/911info/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been
	enabled.

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Data	Array of 911 information
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and explanations can be found at the end of this document.

```
Request
                                             Response (SUCCESS)
POST /api/911info HTTP/1.1
                                               "Status": "OK",
Content-Type: application/json
Content-Length: 124
                                                "Data" : {
                                                 "custnum" : "12345",
{
"Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd"
                                                 "did" : "1234567894",
                                                 "streetnumber" : "850",
}
                                                  "streetname" : "Fake St",
                                                 "unit" : "2",
                                                 "city" : "Sudbury",
                                                 "province" : "ON",
                                                 "country" : "Canada",
                                                  "postalcode" : "P3B1Y4"
                                               },
                                                { Continues for every entry }
                                             Response (FAIL)
                                              {
                                                   "Status": "FAIL",
                                                   "Reason": "IP address not
                                             allowed"
```



Solutions that shine

Add DID

Add a new DID to the SolSwitch

Transfer Call URL: solswitch/api/adddid/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been	
	enabled.	
DID	The new DID to add	

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.

Request	Response (SUCCESS)
POST /api/adddid HTTP/1.1	{
Content-Type: application/json	"Status": "OK"
Content-Length: 124	}
{	Response (FAIL)
"Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",	{
"DID": "7051234567"	"Status": "FAIL",
}	"Reason": "Invalid DID
	provided"
	}



Solutions that shine

Create Customer

The Create Customer function will create a customer account on the SolSwitch using the supplied information and return the new customer ID.

Create Customer URL: solswitch/api/createcustomer/

The Request may contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key
	has been enabled.
RouteGroupID	The ID of the default route group to be assigned
TollPlanID	The ID of the toll plan to apply to this customer
MaxSIPAccounts	The maximum number of SIP accounts to allow the customer to use
MaxTrunks	The maximum number of trunks this customer can use at once
CustomerNumber	The internal customer's number. To be used for toll billing if you
	need a specific customer number
FirstName	First name of the customer
LastName	Last name of the customer
Company	Optional. The company the customer represents.
AddressStreetNumber	Optional. Address street number
AddressStreetName	Optional. Address street name
AddressUnit	Optional. Address unit number
PostalCode	Optional. Postal code (L#L#L#)
City	Optional. City the company is located in
Province	Optional. Province code (ON)
Country	Optional. Country of residence
PhoneNumber	Optional. Phone number without any '-'s

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and explanations can be found at the end of this document.
CustomerID	This is a 0 or 1 boolean representation of the state



Solutions that shine

Example

```
Request
POST /api/createcustomer HTTP/1.1
Content-Type: application/json
Content-Length: 74
{
    "Customer": "4",
    "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",
    "RouteGroupID": "7",
    "TollPlanID": "2",
    "MaxSIPAccounts": "2",
    "MaxTrunks": "4",
    "CustomerNumber": "123456789",
    "FirstName": "Test",
    "LastName": "Name"
}
```

Response (SUCCESS)

```
"Status": "OK",
"CustomerID": "127"
```

Response (FAIL)

}

{

```
"Status": "FAIL",
"Reason": "Missing required field FirstName"
```



Check Time Rule

Used to find the current status (Open or Closed) of a time rule on the system.

Check Time Rule URL: solswitch/api/checktimerule/

The Request may contain the following attributes:

Customer	ID of the customer the function should run on, should be a numeric value. Optional field, if not provided the system will default to CustID 1.
Кеу	API key for connection to the system. Required field if an API key has been enabled.
ID	The time rule's ID

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and explanations can be found at the end of this document.
TimeRuleStatus	This is a 0 or 1 boolean representation of the state
TimeRuleText	This is the text form of the above (0 – Open, 1 – Closed)

Example

```
Request
POST /api/checktimerule HTTP/1.1
Content-Type: application/json
Content-Length: 74
{
    "Customer": "4",
    "Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",
    "ID": "132"
}
```

Response (SUCCESS)

```
"Status": "OK",
"TimeRuleStatus": "O",
"TimeRuleText": "Open"
}
Response (FAIL)
{
    "Status": "FAIL",
    "Reason": "Time rule not found"
```



DID Report

Pull a list of DIDs on the system with their current customer and route information.

DID Report URL: solswitch/api/didreport/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been	1
	enabled.	

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.
DID	DID number
IRID	Internal Routing ID
CustID	ID of the customer sending post request
PrimaryRoute	Used for Load balancing. 0 is default in most cases, or 1 if priority routing
	is set up for that customer and server.

```
Request
                                               Response (SUCCESS)
POST /api/didreport HTTP/1.1
                                                {
                                                  "0": {
Content-Type: application/json
                                                       "DID": "7058053584",
Content-Length: 124
                                                       "IRID": "182",
{
                                                       "CustID": "1",
  "Key":"FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd"
                                                       "PrimaryRoute": 1
}
                                                 },
                                                { Continues for every entry },
                                                  "Status": "OK"
                                               Response (FAIL)
                                                {
                                                     "Status": "FAIL",
                                                     "Reason": "Error with Key"
```



Solutions that shine

Find Me Follow Me Details

Pass in a Find Me Follow Me ID to retrieve Name, Numbers, OverflowRouteID, OverflowRouteType, Recording, AutoAnswer, StepTime, and Extension linked to the ID.

Add Header URL: solswitch/api/findmefollowme/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been
	enabled.
ID	FindMeFollowMe ID to retrieve data for
The Response will contain the following attributes:	

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and
	explanations can be found at the end of this document.

```
Request
                                               Response (SUCCESS)
POST /api/findmefollowme/ HTTP/1.1
                                               {
Content-Type: application/json
                                                    "Status": "OK",
                                                   "ID": "5",
{
   "Key":
                                                    "Name": "dave-test",
                                                    "Numbers": [
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",
   "ID": "5"
                                                       "1112223333",
                                                       "2223334444",
}
                                                        "3334445555"
                                                   ],
                                                   "OverflowRouteID": "148",
                                                   "OverflowRouteType":"12",
                                                   "Recording": "0",
                                                   "AutoAnswer": "0",
                                                    "StepTime": "25",
                                                    "Extension": "9991"
                                               Response (FAIL)
                                               {
                                                     "Status": "FAIL",
                                                    "Reason": "No Records
                                               Found."
```



Firewall Management Suite

/api/firewall/view

This endpoint will list the available firewall rules on the system. There will also be an optional ID value that will display information about just the requested firewall rule.

The Request may contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been enabled.
ID	The ID of the specific firewall rule to view (Overrides the ViewType option below to Full)
ViewType	Can be set to Full or Partial to control how much data will be returned: Full – Each listing will be provided with as much information as possible Partial – Each listing will be provided with and ID and Name Default - Partial

The Response will contain the following attributes:

Status		'OK' or 'FAIL'	
Results		An array with each row containing the following:	
ID		ID of the firewall rule. To be used with other endpoints	
Name Position		Name of the firewall rule	
		The order priority of the firewall rule. Lower numbered	
		items will be checked before higher numbered ones	
RuleTypeAddressTypeAddress		This will be Allow or Deny	
		This will be Address, Subnet or Country	
		If AddressType is Address or Subnet this will contain the IP	
		address or IP subnet of the rule	
	Country	If the AddressType is Country this will contain the country	
		code of the selected country (Canada = CA, United Kingdom	
		= UK, etc)	
	Web	This will be set to 1 if the rule's filtering is applied to web	
		traffic	
	SysAdmin	This will be set to 1 if the rule's filtering is applied to web	
		traffic on SysAdmin accounts	
	Provisioning	This will be set to 1 if the rule's filtering is applied to	
		provisioning traffic	



SIP	This will be set to 1 if the rule's filtering is applied to SIP traffic
-----	-------------------------------------------------------------------------

Exampl	е

Request	Response (SUCCESS)
POST /api/firewall/view/ HTTP/1.1	{
Content-Type: application/json	"Status": "OK",
{	"Results": [
"Key":	{
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",	"ID": "5",
"ID": "5"	"Name": "Test name"
}	}
]
	}
	Response (FAIL)
	{
	"Status": "FAIL",
	"Reason": "No Records
	Found."
	}


/api/firewall/add/

This endpoint will add a new rule to the firewall in the given position, or at the end if no position is given.

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been enabled.
Name	Name of the firewall rule
RuleType	This will be Allow or Deny
AddressType	This will be Address, Subnet or Country

The Request may contain the following attributes:

Position	The order priority of the firewall rule. This will shift all positions down so
	entering 3 for example will increment the current rules of priority 3 or
	more by 1. If omitted this will default to the highest possible position
Address	If AddressType is Address or Subnet this must contain the IP address or IP
	subnet of the rule [xxx.xxx.xxx for address and xxx.xxx.xxx/yy for
	subnet]
Country	If the AddressType is Country this must contain the country code of the
	selected country [Canada = CA, United Kingdom = UK, etc]
Web	Boolean value [0 – Disabled on web traffic, 1 – Enabled on web traffic]
	Default 1
SysAdmin	Boolean value [0 – Disabled on SysAdmin web traffic, 1 – Enabled on
	SysAdmin web traffic]
	Default 1
Provisioning	Boolean value [0 – Disabled on provisioning traffic, 1 – Enabled on
	provisioning traffic]
	Default 1
SIP	Boolean value [0 – Disabled on SIP traffic, 1 – Enabled on SIP traffic]
	Default 1

Status	'OK' or 'FAIL'
ID	The ID of the new firewall rule



Request	Response (SUCCESS)
POST /api/firewall/add/ HTTP/1.1	{
Content-Type: application/json	"Status": "OK",
{	"ID": "4"
"Key":	}
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",	Response (FAIL)
"Name": "Test Rule",	
"RuleType": "Allow",	"Status": "FAIL",
"AddressType": "Address"	"Reason": "No Records
"Address": "127.0.0.1"	Found."
}	}



/api/firewall/edit/

This endpoint will allow editing of existing firewall rules.

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been enabled.
ID	The ID of the rule to be edited

The Request may contain the following attributes:

Nama	
Name	The new name of the firewall rule
RuleType	This will be Allow or Deny
AddressType	This will be Address, Subnet or Country
Position	The order priority of the firewall rule. This will shift all positions down so entering 3 for example will increment the current rules of priority 3 or more by 1. If omitted this will default to the highest possible position
Address	If AddressType is Address or Subnet this must contain the IP address or IP subnet of the rule [xxx.xxx.xxx for address and xxx.xxx.xxx/yy for subnet]
Country	If the AddressType is Country this must contain the country code of the selected country [Canada = CA, United Kingdom = UK, etc]
Web	Boolean value [0 – Disabled on web traffic, 1 – Enabled on web traffic] <i>Default</i> 1
SysAdmin	Boolean value [0 – Disabled on SysAdmin web traffic, 1 – Enabled on SysAdmin web traffic] Default 1
Provisioning	Boolean value [0 – Disabled on provisioning traffic, 1 – Enabled on provisioning traffic] Default 1
SIP	Boolean value [0 – Disabled on SIP traffic, 1 – Enabled on SIP traffic] Default 1

Status	'OK' or 'FAIL'



equest	Response (SUCCESS)
OST /api/firewall/edit/ HTTP/1.1	{
ontent-Type: application/json	"Status": "OK"
	}
"Key":	Response (FAIL)
YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",	
"ID": "4",	"Status": "FAIL",
"Name": "Test Rule Renamed"	"Reason": "No Records
	Found."
	1



/api/firewall/delete/

This endpoint will allow deletion of existing firewall rules.

The Request must contain the following attributes:

ID The ID of the rule to be deleted	
-------------------------------------	--

The Response will contain the following attributes:

Status	'OK' or 'FAIL'

<pre>Request POST /api/firewall/delete/ HTTP/1.1 Content-Type: application/json { "Key": "YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd", "ID": "4" }</pre>	<pre>Response (SUCCESS) { "Status": "OK" } Response (FAIL) { "Status": "FAIL", "Reason": "No Records Found." }</pre>



Get Customer Information

The Get Customer Information function will return all information related to a customer.

Get Customer Information URL: solswitch/api/getcustomerinformation/

The Request may contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been enabled.
CustomerNumber	The CustomerNumber on the account. Not the CustID, but the customer number entered when creating the account. Usually links with an external CRM.

The Response will contain the following attributes:

Status	'OK' or 'FAIL'	
Reason	Reason for fail status (Only if status is FAIL). A list of error	
	messages and explanations can be found at the end of this	
	document.	
ID	The CustID on the SolSwitch. Use this to preform more API calls	
firstname	First name of the customer	
lastname	Last name of the customer	
company	The company the customer represents.	
streetnumber	Address street number	
streetname	Address street name	
unit	Address unit number	
postalcode	Postal code (L#L#L#)	
city	City the company is located in	
province	Province code (ON)	
country	Country of residence	
telephone	Phone number without any '-'s	



Solutions that shine

Response (SUCCESS)

{

```
"Status": "OK",
   "ID": "127",
   "firstname": "Test",
   "lastname": "Name",
   "company": "Sunwire",
  "streetnumber": "850",
  "streetname": "Barrydowne Road",
   "unit": "303",
   "postalcode": "P3A3T7",
   "city": "Sudbury",
   "province": "ON",
   "country": "Canada",
   "telephone": "7055551234"
}
Response (FAIL)
{
     "Status": "FAIL",
     "Reason": "No results returned"
```



Solutions that shine

Monitoring Notifications

When monitoring is enabled on an extension, through Toggle Monitor, event notifications will be POSTed to the notification URL (Configured in SolSwitch settings).

Notifications will be sent on incoming and outgoing calls to monitored extensions, for the following events:

- Call Incoming
- Call Connected
- Call Disconnected

The notifications will contain the following attributes:

Event	Event The event that triggered the notification (Incoming, Connected,	
	Disconnected).	
CallID	The unique ID of the call	
Customer	ID of the customer for the notifying extension.	
SourceNumber The phone number or extension of the source of the call		
SourceChannel The call channel connected to the source of the call		
DestinationNumber The extension of the destination of the call		
DestinationChannel	The call channel connected to the destination of the call	
DialedNumber	The actual number dialed by the source of the call	

```
Request
POST /example HTTP/1.1
Content-Type: application/json
Content-Length: 200
{
    "Event": "Incoming",
    "CallID": "843597",
    "Customer": "4",
    "SourceNumber": "7055551234"
    "SourceChannel": "SIP/Example-00003ee",
    "DestinationChannel": "SIP/Example-0004f2be",
    "DialedNumber": "7055216777"
```



Solutions that shine

Remove DID

Delete a DID from the SolSwitch.

Transfer Call URL: solswitch/api/removedid/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been	
	enabled.	
DID	The DID to remove	
	The DID to remove	

The Response will contain the following attributes:

Status	'OK' or 'FAIL'	
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and	
	explanations can be found at the end of this document.	

Request	Response (SUCCESS)
POST /api/removedid HTTP/1.1	{
Content-Type: application/json	"Status": "OK"
Content-Length: 124	}
{	Response (FAIL)
"Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",	{
"DID": "7051234567"	"Status": "FAIL",
}	"Reason": "Invalid DID
	provided"
	}



Scheduled Routing Details

Pass a Route ID to return Route Type, InternalRouteID, Extension, Name, and Default Route at present moment in time if between DateTo and DateFrom, TimeTo and TimeFrom in ScheduledRoutingOptions table.

Add Header URL: solswitch/api/scheduledrouting/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been enabled.	
ID	The ID of the scheduled route you want data for if there's a scheduled route for the current time. If there isn't – the default route is returned.	

The Response will contain the following attributes:

Status	'OK' or 'Fail'	
Reason	If the ID is non numerical or there's no records found for the ID.	

Request	Response (SUCCESS)
POST /api/scheduledrouting/ HTTP/1.1	{
Content-Type: application/json	"Status": "OK",
{	"Name": "Test 2",
"Key":	"Extension": "101",
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",	"RouteExt": "9696",
"ID": "2"	"RouteType": "7",
}	"IRID": "68",
	"RouteName": "dave-ext"
	}
	Response (FAIL)
	{
	"Status": "FAIL",
	"Reason": "No data found."
	}



SIP Account Management Suite

/api/sipaccounts/view/

This endpoint will list the available SIP accounts on the system. There will also be an optional ID value that will display information about just the requested SIP account.

The Request may contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been	
	enabled.	
ID	The ID of the specific SIP account to view (Overrides the ViewType option	
	below to Full)	
ViewType	Can be set to Full or Partial to control how much data will be returned:	
	Full – Each listing will be provided with as much information as possible	
	Partial – Each listing will be provided with and ID, Username and	
	Description	
	Default - Partial	

Status		ʻOK' or ʻFAIL'
Results		An array with each row containing the following:
	ID	ID of the SIP account. To be used with other endpoints
	CustID	The Customer ID for the SIP account
	Description	The given description of the SIP account
	Username	SIP account username for static and dynamic SIP
		accounts
	Host	SIP account host for static SIP accounts
	NAT	Boolean [1 – Yes, 0 – No]
	Туре	[static, dynamic, register]
	DTMFMode	[rfc2833, inband]
	Port	SIP port, typically 5060
	DeleteBlock	Boolean [1 – Yes, 0 – No]
	NotifyEmail	Email address
	FaxCodec	Boolean [1 – Yes, 0 – No]
	VoiceCodec	Boolean [1 – Yes, 0 – No]
	VoiceCodec1	Boolean [1 – Yes, 0 – No]
	VoiceCodec2	Boolean [1 – Yes, 0 – No]
	VoiceCodec3	Boolean [1 – Yes, 0 – No]



VoiceCodec4	Boolean [1 – Yes, 0 – No]
Debug	Boolean [1 – Yes, 0 – No]
RegisterUsername	Username for Register type
RegisterName	Name / BTN for register type
RegisterDomain	Domain for register type
TransportType	TCP, UDP, SRTP
G722Codec	Boolean [1 – Yes, 0 – No]
G729Codec	Boolean [1 – Yes, 0 – No]
DynamicFeatures	Boolean [1 – Yes, 0 – No]
SIPPostAPI	Boolean [1 – Yes, 0 – No]
ACLAIlow	String containing the ACL allow list
ACLDeny	String containing the ACL Deny list
AllowInternational	Boolean [1 – Yes, 0 – No]
SIPNotifyAPI	Boolean [1 – Yes, 0 – No]
StayInAudioPath	Boolean [1 – Yes, 0 – No]
Active	Boolean [1 – Yes, 0 – No]

```
Request
                                         Response (SUCCESS)
POST /api/sipaccounts/view/ HTTP/1.1
                                         {
Content-Type: application/json
                                             "Status": "OK",
                                             "Results": [
{
   "Key":
                                                {
                                                 "ID": "5",
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",
   "ID": "5"
                                                 "Name": "Test name",
                                                 "Description": "Test Desc"
}
                                               }
                                             ]
                                         }
                                         Response (FAIL)
                                         {
                                              "Status": "FAIL",
                                              "Reason": "No Records Found."
```



/api/sipaccounts/add/

This endpoint will add a new SIP account

The Request must contain the following attributes:

API key for connection to the system. Required field if	
an API key has been enabled.	
The Customer ID for the SIP account	
The given description of the SIP account	
e SIP account username for static and dynamic SIP	
accounts	
[static, dynamic, register]	

If Type is set to static the following attributes are required:

Password	Password for static and dynamic SIP accounts
Host	SIP account host for static SIP accounts
If Type is set to dynamic the following attributes are required:	

If Type is set to dynamic the following attributes are required:

Password	Password for static and dynamic SIP accounts	
If Type is set to register the following attributes are required:		

RegisterUsername	Username for Register type	
RegisterPassword	Password for Register type	
RegisterName	Name / BTN for register type	
RegisterDomain	Domain for register type	

The Request may contain the following attributes:

NAT	Boolean [1 – Yes, 0 – No]
	Default 1
DTMFMode	[rfc2833, inband]
	Default rfc2833
Port	SIP port, typically 5060
	Default 5060
DeleteBlock	Boolean [1 – Yes, 0 – No]
	Default 0
NotifyEmail	Email address
FaxCodec	Boolean [1 – Yes, 0 – No]



	Default 0	
VoiceCodec	Boolean [1 – Yes, 0 – No]	
	Default 0	
VoiceCodec1	Boolean [1 – Yes, 0 – No]	
	Default 0	
VoiceCodec2	Boolean [1 – Yes, 0 – No]	
	Default 0	
VoiceCodec3	Boolean [1 – Yes, 0 – No]	
	Default 0	
VoiceCodec4	Boolean [1 – Yes, 0 – No]	
	Default 0	
Debug	Boolean [1 – Yes, 0 – No]	
	Default 0	
TransportType	TCP, UDP, SRTP	
	Default UDP	
G722Codec	Boolean [1 – Yes, 0 – No]	
	Default 0	
G729Codec	Boolean [1 – Yes, 0 – No]	
	Default 0	
DynamicFeatures	Boolean [1 – Yes, 0 – No]	
	Default 1	
SIPPostAPI	Boolean [1 – Yes, 0 – No]	
	Default 0	
ACLAllow	String containing the ACL allow list	
ACLDeny	String containing the ACL Deny list	
AllowInternational	Boolean [1 – Yes, 0 – No]	
	Default 0	
SIPNotifyAPI	Boolean [1 – Yes, 0 – No]	
	Default 0	
StayInAudioPath	Boolean [1 – Yes, 0 – No]	
	Default 1	
Active	Boolean [1 – Yes, 0 – No]	
	Default 1	

Status	'OK' or 'FAIL'
ID	The ID of the newly created SIP Account



Request	Response (SUCCESS)
POST /api/sipaccounts/add/ HTTP/1.1	{
Content-Type: application/json {	"Status": "OK", "ID": "4"
"Key":	}
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",	Response (FAIL)
"Description": "Test SIP",	{
"CustID": "1",	"Status": "FAIL",
"Username": "TestSIPAcc",	"Reason": "No Records
"Type": "dymamic"	Found."
}	}



/api/sipaccounts/edit/

This endpoint will edit an existing SIP account

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if
	an API key has been enabled.
ID	The ID of the SIP account to be edited

The Request may contain the following attributes:

CustID	The Customer ID for the SIP account
Description	The given description of the SIP account
Username	SIP account username for static and dynamic SIP
	accounts
Password	Password for static and dynamic SIP accounts
Host	SIP account host for static SIP accounts
NAT	Boolean [1 – Yes, 0 – No]
Туре	[static, dynamic, register]
DTMFMode	[rfc2833, inband]
Port	SIP port, typically 5060
DeleteBlock	Boolean [1 – Yes, 0 – No]
NotifyEmail	Email address
FaxCodec	Boolean [1 – Yes, 0 – No]
VoiceCodec	Boolean [1 – Yes, 0 – No]
VoiceCodec1	Boolean [1 – Yes, 0 – No]
VoiceCodec2	Boolean [1 – Yes, 0 – No]
VoiceCodec3	Boolean [1 – Yes, 0 – No]
VoiceCodec4	Boolean [1 – Yes, 0 – No]
Debug	Boolean [1 – Yes, 0 – No]
RegisterUsername	Username for Register type
RegisterPassword	Password for Register type
RegisterName	Name / BTN for register type
RegisterDomain	Domain for register type
TransportType	TCP, UDP, SRTP
G722Codec	Boolean [1 – Yes, 0 – No]
G729Codec	Boolean [1 – Yes, 0 – No]
DynamicFeatures	Boolean [1 – Yes, 0 – No]



SIPPostAPI	Boolean [1 – Yes, 0 – No]	
ACLAllow	String containing the ACL allow list	
ACLDeny	String containing the ACL Deny list	
AllowInternational	Boolean [1 – Yes, 0 – No]	
SIPNotifyAPI	Boolean [1 – Yes, 0 – No]	
StayInAudioPath	Boolean [1 – Yes, 0 – No]	
Active	Boolean [1 – Yes, 0 – No]	

Status '	OK' or 'FAIL'
Example	
<pre>Request POST /api/sipaccounts/edit/ Content-Type: application/js { "Key": "YGLbZZaJWVMJfOXHCTIEADFGIRI "ID": "4", "Description": "Test Tru }</pre>	on "Status": "OK" } Response (FAIL) { "Status": "FAIL",



/api/sipaccounts/delete/

This endpoint will allow deletion of existing SIP accounts.

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been
	enabled.
ID	The ID of the trunk to be deleted

Status	'OK' or 'FAIL'	
Example		
<pre>Request POST /api/sipaccounts/delet Content-Type: application/5 { "Key": "YGLbZZaJWVMJfOXHCTIEADFGIF "ID": "4" }</pre>	son "Status": "OK" } Response (FAIL)	ords



Solutions that shine

Toggle Monitoring

The toggle monitoring function allows event monitoring to be turned on or off for extensions. Monitoring can also be enabled/disabled for extensions directly through the SolSwitch web interface.

When enabled, notifications will be sent to the notification URL (Configured in SolSwitch settings) when the extension receives an incoming or outgoing call. The SolSwitch portal allows for greater customization of what events are sent to the notification URL

Toggle Monitoring URL: solswitch/api/monitor/

The Request must contain the following attributes:

Extension	The extension number to adjust monitoring for. Extensions are numeric	
	values, 3 to 5 digits in length.	
Enabled	Whether monitoring should be enabled or disabled. Accepted values are 1	
	and 0, where 1 = Enabled and 0 = Disabled.	
Customer	ID of the customer the function should run on, should be a numeric value.	
	Optional field, if not provided the system will default to CustID 1.	
Кеу	API key for connection to the system. Required field if an API key has been	
	enabled.	

The Response will contain the following attributes:

Status	'OK' or 'FAIL'	
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and	
	explanations can be found at the end of this document.	

Request	Response (SUCCESS)
POST /api/monitor HTTP/1.1	{
Content-Type: application/json	"Status": "OK"
Content-Length: 107	}
{	Response (FAIL)
"Extension": "123",	{
"Enabled": "1",	"Status": "FAIL",
"Customer": "4",	"Reason": "Unknown
"Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd"	Extension Number"
}	}



Toll Billing Info

This is used to sync two SolSwitch's toll billing rates and related toll settings. This is generally used when deploying multiple independent sets of SolSwitch systems which will be using the same billing settings.

Only a SolSwitch can use this API call as it involves accessing the database tables and comparing entries. For more information see the **Advanced Tools > Toll Management > Toll Sync** on the SolSwitch web portal.



Solutions that shine

Toll Rates

List the current toll rate locations for a certain toll plan.

Toll Rates URL: solswitch/api/tollrates/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been	
	enabled.	
tollPlanID	The ID of the toll rate list to search on.	

The Request may contain the following attribute:

The Response will contain the following attributes:

Status	'OK' or 'FAIL'	
Array	Data from the toll rates	
Reason	Reason for fail status (Only if status is FAIL). A list of error messages and explanations can be found at the end of this document.	

Request	Response (SUCCESS)
POST /api/tollrates	{
HTTP/1.1	"Status": "OK",
Content-Type: application/json	{
Content-Length: 124	"Prefix" : "1705",
{	"Area" : "Sudbury, ON",
"Key": "FzeKKeEKSIUXa7ZRMx3FciZwXG2FW8jd",	"Value" : "0.03"
"tollPlanID": "11"	},
}	{ Continues for every entry }
	}
	Response (FAIL)
	{
	"Status": "FAIL",
	"Reason": "IP address not
	allowed"
	}



Solutions that shine

Toll Reporting

Load a report of tolls for the specified time period – either as a per-customer summary, or as a per-call breakdown for a single customer.

If API permissions are set to allow access to a single customer, the report will always pull the single customer breakdown for that customer.

Toll Reporting URL: solswitch/api/tollreport/

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been enabled.
Customer	
Customer	ID of the customer the function should run on, should be a numeric value.
	Optional field, if not provided the system will default to CustID 1.
DateStart	This will limit the returned data to be within Date Start and Date End .
	Format: YYYY-MM-DD
	OR Format: YYYY-MM-DD HH:MM:SS
DateEnd	This will limit the returned data to be within Date Start and Date End .
	Format: YYYY-MM-DD
	OR Format: YYYY-MM-DD HH:MM:SS

The Request may contain the following attribute:

CustNum	Customer Number (as configured in customer settings).
	When left empty, report will run as a per-customer summary if access is granted to all customers. When provided, report will be per-call breakdown for the specified customer.

Status	'OK' or 'FAIL'	
Array	Data from the toll report	
Reason	Reason Reason for fail status (Only if status is FAIL). A list of error messages and explanations can be found at the end of this document.	



Request	Response (SUCCESS)
POST /api/tollreport	{
HTTP/1.1	"Status": "OK",
Content-Type: application/json	"0": {
Content-Length: 162	"CustNum": "5678",
{	"Company": "Main",
"Key": "1234", "DateStart": "2024-07-01",	"Area": "Canada - AB", "BataCast": "0.0200"
"DateEnd": "2024-07-01"	"RateCost": "0.0300", "CallCost": "0.32"
}	},
,	"1": {
	"CustNum": "5678",
	"Company": "Main",
	"Area": "Canada - BC",
	"RateCost": "0.0300",
	"CallCost": "0.08"
	}
	}
	Response (FAIL)
	{ "Status": "FAIL",
	"Reason": "IP address not allowed"
POST /api/tollreport	Response (SUCCESS)
HTTP/1.1	{
Content-Type: application/json	"Status": "OK",
Content-Length: 179	"0": {
"Key": "1234",	"Company": "Main",
"DateStart": "2024-07-01",	"Area": "Toll Free",
"DateEnd": "2024-08-01",	"RateCost": "0.0500", "CallCost": "0.06",
"CustNum": "5678"	"CallID": "3753672",
}	"StartTime": "2024-07-16 10:43:35",
	"Length": "68",
	"SrcNumber": "4167769547",
	"DstNumber": "18004614219"
	},
	"1": {
	"Company": "Main", "Area": "Tall Free"
	"Area": "Toll Free", "RateCost": "0.0500",
	"CallCost": "0.03",
	"CallID": "3754222",
	"StartTime": "2024-07-16 10:45:07",
	"Length": "30",
	"SrcNumber": "4167769547",
	"DstNumber": "18004614219"



} Response (FAIL)
{ "Status": "FAIL", "Reason": "IP address not allowed"
}



Trunk Management Suite

/api/trunks/view/

This endpoint will list the available trunks on the system. There will also be an optional ID value that will display information about just the requested trunk.

The Request may contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been
	enabled.
ID	The ID of the specific trunk to view (Overrides the ViewType option below
	to Full)
ViewType	Can be set to Full or Partial to control how much data will be returned:
	Full – Each listing will be provided with as much information as possible
	Partial – Each listing will be provided with and ID, Name and Description
	Default - Partial

Status		'OK' or 'FAIL'	
Results		An array with each row containing the following:	
	ID	ID of the trunk. To be used with other endpoints	
	Name	Name of the firewall rule	
	Description	The order priority of the firewall rule. Lower numbered	
		items will be checked before higher numbered ones	
	TrunkType	1 – SIP Account, 2 – Line Card	
	SIPAccountsID	ID of the SIP Account tied to this trunk	
	ChannelGroup	0 - 9 Line Card Channel Group	
	ChannelOrder	Outbound call order for Line Card trunk	
		g – Sequential Ascending	
		G – Sequential Descending	
		r – Round Robin Ascending	
		R – Round Robin Descending	
	UseDIDTable	Boolean [1 – Yes, 0 – No]	
	UseRouteGroup	Boolean [1 – Yes, 0 – No]	
	RouteGroupID	The ID of the route group to be assigned	
	AddPrefix	Prefix to be added to calls	
	StripDigit	Number of digits to strip from DIDs	
	CallLimit	0 – Unlimited, # - Max calls on trunk	



DefaultDID	
UseLocalRouting	Boolean [1 – Yes, 0 – No]
AccessibleSID	Boolean [1 – Yes, 0 – No]
Record	Boolean [1 – Yes, 0 – No]
ApplyToll	Boolean [1 – Yes, 0 – No]
UseE164	Boolean [1 – Yes, 0 – No]
CanConf	Boolean [1 – Yes, 0 – No]
UnlimitedOutbound	Boolean [1 – Yes, 0 – No]
AutoLearnRoutes	Boolean [1 – Yes, 0 – No]
AutoLearnAPIKey	Blank string or API key
AutoLearnWeight	Boolean [1 – Yes, 0 – No]
AutoLearnValidated	Boolean [1 – Yes, 0 – No]

Request	Response (SUCCESS)
POST /api/trunks/view/ HTTP/1.1	{
Content-Type: application/json	"Status": "OK",
{	"Results": [
"Key":	{
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",	"ID": "5",
"ID": "5"	"Name": "Test name",
}	"Description": "Test Desc"
,	}
	,
	}
	Response (FAIL)
	"Status": "FAIL",
	"Reason": "No Records Found."
	}



/api/trunks/add/

This endpoint will add a new trunk

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if
	an API key has been enabled.
Name	Name of the firewall rule
Description	The order priority of the firewall rule. Lower numbered
	items will be checked before higher numbered ones
TrunkType	1 – SIP Account, 2 – Line Card
SIPAccountsID	ID of the SIP Account tied to this trunk

The Request may contain the following attributes:

Channel Channel	0. O Line Cand Channel Crown
ChannelGroup	0 - 9 Line Card Channel Group
ChannelOrder	Outbound call order for Line Card trunk
	g – Sequential Ascending
	G – Sequential Descending
	r – Round Robin Ascending
	R – Round Robin Descending
	A blank string can be provided if not using the LineCard
	trunk type
UseDIDTable	Boolean [1 – Yes, 0 – No]
	Default 0
UseRouteGroup	Boolean [1 – Yes, 0 – No]
	Default 0
RouteGroupID	The ID of the route group to be assigned
AddPrefix	Blank string or prefix to be added to calls
StripDigit	Number of digits to strip from DIDs
CallLimit	0 – Unlimited, # - Max calls on trunk
	Default 0
UseLocalRouting	Boolean [1 – Yes, 0 – No]
	Default 0
AccessibleSID	Boolean [1 – Yes, 0 – No]
	Default 0
Record	Boolean [1 – Yes, 0 – No]
	Default 0
ApplyToll	Boolean [1 – Yes, 0 – No]



	Default 0
UseE164	Boolean [1 – Yes, 0 – No]
	Default 0
CanConf	Boolean [1 – Yes, 0 – No]
	Default 0
UnlimitedOutbound	Boolean [1 – Yes, 0 – No]
	Default 0
AutoLearnRoutes	Boolean [1 – Yes, 0 – No]
	Default 0
AutoLearnAPIKey	Blank string or API key
	Default 0
AutoLearnWeight	Integer value for the weight of this trunk for auto
	learning
	Default 23
AutoLearnValidated	Boolean [1 – Yes, 0 – No]
	Default 0

The Response will contain the following attributes:

Status	'OK' or 'FAIL'
ID	The ID of the newly created trunk

```
Response (SUCCESS)
Request
POST /api/trunks/add/ HTTP/1.1
                                               {
Content-Type: application/json
                                                    "Status": "OK",
                                                    "ID": "7"
{
    "Key":
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",
                                               Response (FAIL)
    "Name": "Main Trunk",
                                                {
    "Description": "Main outbound trunk",
                                                     "Status": "FAIL",
    "SIPAccountsID": "4",
                                                    "Reason": "No Records
    "TrunkType": "1"
                                               Found."
}
                                               }
```



/api/trunks/edit/

This endpoint will edit an existing trunk

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if
	an API key has been enabled.
ID	The ID of the trunk to be edited

The Request may contain the following attributes:

Name	Name of the firewall rule
Description	The order priority of the firewall rule. Lower numbered
	items will be checked before higher numbered ones
TrunkType	1 – SIP Account, 2 – Line Card
SIPAccountsID	ID of the SIP Account tied to this trunk
ChannelGroup	0 - 9 Line Card Channel Group
ChannelOrder	Outbound call order for Line Card trunk
	g – Sequential Ascending
	G – Sequential Descending
	r – Round Robin Ascending
	R – Round Robin Descending
	A blank string can be provided if not using the LineCard
	trunk type
UseDIDTable	Boolean [1 – Yes, 0 – No]
UseRouteGroup	Boolean [1 – Yes, 0 – No]
RouteGroupID	The ID of the route group to be assigned
AddPrefix	Blank string or prefix to be added to calls
StripDigit	Number of digits to strip from DIDs
CallLimit	0 – Unlimited, # - Max calls on trunk
UseLocalRouting	Boolean [1 – Yes, 0 – No]
AccessibleSID	Boolean [1 – Yes, 0 – No]
Record	Boolean [1 – Yes, 0 – No]
ApplyToll	Boolean [1 – Yes, 0 – No]
UseE164	Boolean [1 – Yes, 0 – No]
CanConf	Boolean [1 – Yes, 0 – No]
UnlimitedOutbound	Boolean [1 – Yes, 0 – No]
AutoLearnRoutes	Boolean [1 – Yes, 0 – No]





AutoLearnAPIKey	Blank string or API key
AutoLearnWeight	Boolean [1 – Yes, 0 – No]
AutoLearnValidated	Boolean [1 – Yes, 0 – No]

The Response will contain the following attributes:

Status 'OK' or 'FAIL'	
-----------------------	--

Request	Response (SUCCESS)
POST /api/trunks/edit/ HTTP/1.1	{
Content-Type: application/json	"Status": "OK"
{	}
"Key":	Response (FAIL)
"YGLbZZaJWVMJfOXHCTIEADFGIRLbHZAd",	{
"ID": "4",	"Status": "FAIL",
"Name": "Test Trunk Renamed"	"Reason": "No Records
}	Found."
	}



/api/trunks/delete/

This endpoint will allow deletion of existing trunks.

The Request must contain the following attributes:

Кеу	API key for connection to the system. Required field if an API key has been
	enabled.
ID	The ID of the trunk to be deleted

Status	'OK' or 'FAIL'	
Example		
<pre>Request POST /api/trunks/delete/ HT Content-Type: application/; { "Key": "YGLbZZaJWVMJfOXHCTIEADFGIE "ID": "4" }</pre>	json	<pre>Response (SUCCESS) { "Status": "OK" } Response (FAIL) { "Status": "FAIL", "Reason": "No Records Found." }</pre>



Error Messages

Below are error messages that can be received from the API, and their reasons.

Invalid API function	The function being called does not exist

CallID

Invalid CallID	The call ID provided is not valid (must be a positive	
	integer value).	
Unknown CallID	The provided call ID does not match any calls on record	

Call

Call did not start	New call unable to start or unable to retrieve call
	information.

Channel

Invalid Channel	The channel field isn't set
Unknown Channel	The provided channel does not match any active calls

Customer

Invalid Customer ID	The customer ID provided is not valid (must be a positive
	integer value).
Unknown Customer ID	No customer exists with the given ID.
No access to customer number #	Your IP/API Key does not have access rights to the given
	customer ID.

Date

No matching end time	Start time provided but no end time
Invalid date format	Provided format does not match the required

Destination

Invalid Destination	The destination number isn't set or isn't numeric
---------------------	---------------------------------------------------



DID

Invalid DID Provided	The DID is not a numeric entry. Must not contain "(", ")"
	or "-"

Extension

Invalid Extension Number	The extension number isn't set or isn't numeric.
Unknown Extension Number	The provided extension number does not exist on the
	specified customer.

Enabled

Invalid Enabled Value	Enabled value not set or is an invalid character. Accepted
	inputs are 1 or 0.

Fax

Cannot send fax, no destination	The To variable was not set, or was not set to a valid
number	number
Cannot send fax, no source	The From variable was not set, or was not set to a valid
number	number
From phone number provided is	The From variable does not point to a valid FaxToEmail
not a valid fax to email account.	account

File

You must upload a file to fax	No File variable was passed to the function
Error converting file for faxing. If	Error in the converting process of the .pdf. Make sure no
this problem persists, please	non-standard encoding is being used when rendering the
contact the system	.pdf.
administrator.	
Only PDFs are accepted, type	The File variable was not a .pdf file.
Detected: <filetype></filetype>	

IP

IP does not have access	The IP being used to connect does not have permission
	to connect to the API function.



Key

Error with Key	The API key provided is invalid or does not have access to
	the specified API function.

Recording

Call not recorded	The requested call was not recorded. This could be due to recording not being set up for the involved parties, or one of the involved parties having privacy enabled.
Recording not generated	The requested call was recorded, but the system is still working on generating the recording. This will generally be completed within a couple minutes of the call ending.

Time Rules

Time rule not found	There is no time rule with the supplied ID on the
	requested customer.

Tone

Invalid Tone	Tone not set or contains invalid characters. Accepted
	characters are: *, #, 0, 1, 2, 3, 4, 5, 6, 7, 8, 9

Unknown

Missing required field <field></field>	A required parameter was not passed to the API. Check documentation on the function you're trying to use.
No results to display	No data was returned from a function that should always return data (Eg /api/getcustomerinformation)



Solutions that shine

Route Types

Below is a table describing the route types for SourceType and DestinationType values.

ID, RouteType

1	Queue
2	FaxToEmail
3	Voicemail
4	VirtualExtension
5	RingGroup
6	IVR
7	Extension
8	Recording
9	MeetMe
10	PageGroup
11	RouteGroup
12	FollowMe
13	ParkingLot
14	VoIP Line
15	Trunk
16	QueueCallback
17	TimeRule
18	Sol-Cast
19	NotifyQueue
20	ScheduledRouting
21	FaxSwitch
22	DV
23	Hold



Example API Calls

Below are some example calls of how to use and access SolSwitch API.

PHP CDR Export Example Call

## Request ##	## Response ##
</td <td>{</td>	{
\$array = array("LegID":"6166",
"Key" => "YOUR_KEY_HERE",	"StartTime":"2021-08-04 10:43:18",
"DateStart" => "2021-02-16",	"ConnectTime":"",
"DateEnd" => "2021-02-16");	"EndTime":"2021-08-04-10:43:20",
	"SourceName":"test-ext2",
\$json = json_encode(\$array, 128);	"SourceNumber":"9697",
	"DestinationName":"test-mitel-ext",
<pre>\$url = "http://SS_IP_HERE/api/cdrexport/";</pre>	"DestinationNmber":"9696",
	"Disposition":"NOANSWER",
\$curl = curl_init();	"DialedNumber":"9696",
curl_setopt(\$curl, CURLOPT_POST, 1);	"SourceType":"7",
curl_setopt(\$curl, CURLOPT_URL, \$url);	"DestinationType":"7",
curl_setopt(\$curl, CURLOPT_RETURNTRANSFER,	"CallCode":""
TRUE);	}
curl_setopt(\$curl, CURLOPT_HTTPHEADER,	
Array('Content-Type: application/json'));	
curl_setopt(\$curl, CURLOPT_POSTFIELDS, \$json);	
<pre>\$result = curl_exec(\$curl);</pre>	
curl_close(\$curl);	
print \$result;	

850 Barrydowne Road, Sudbury, ON P3A 3T7



CommandLine cURL List Active Calls Example Call

```
JSON file contents:
{
  "Customer":"1",
  "Key":"YOUR_KEY_HERE"
}
cURL command to run:
curl -s -header 'Content-Type: application/json' -request POST -data-binary "@./YOUR_JSON_FILE.json"
http://SS_IP_HERE/api/listactivecalls | jq
Results:
{
  "Status":"OK",
  "Calls":
  [{
    "CallID":"25169817",
    "SourceNumber":"490",
.....,
    "Duration":"00:00:12"
 }]
}
```



Python Scheduled Routing Details Example Call

```
### Request ###
import requests
url = "http://SS IP HERE/api/scheduledrouting/"
headers = {"Content-Type":"application/json","Content-Length": "74"}
jsonBody = {
 "Customer":"1",
 "Key":"YOUR KEY HERE",
 "ID":"2"
}
response = requests.request("POST", url, headers=headers, json=jsonBody)
if response.status_code == 200:
  print(reponse.text)
elif response.status code == 404:
  print('**Not found.**')
                                         ### Response ###
{
  "Status": "OK",
  "Name": "Test 2",
  "Extension": "102",
  "RouteExt": "9991",
  "RouteType": "12",
  "IRID": "5",
  "RouteName": "test-ext"
```