Avaya Solution & Interoperability Test Lab

# Application Notes for configuring Avaya Proactive Contact R5.1 with CallScripter R4.5 using Avaya PG230 Digital Switch – Issue 1.0

## Abstract

These Application Notes describe the configuration steps required for CallScripter R4.5 to successfully interoperate with Avaya Proactive Contact R5.1 using Avaya PG230 Digital Switch.

Information in these Application Notes has been obtained through DevConnect compliance testing and additional technical discussions. Testing was conducted via the DevConnect Program at the Avaya Solution and Interoperability Test Lab.

# 1. Introduction

These Application Notes describe a compliance tested configuration comprised of Avaya Proactive Contact R5.1 using an Avaya PG230 Digital Switch (also known as hard dialer) and CallScripter R4.5.

Avaya Proactive Contact R5.1 uses an Avaya PG230 Digital Switch to connect Avaya Proactive Contact Agent headsets and connect outbound calls to Avaya Proactive Contact Agents via a Q-Sig trunk with Avaya Aura® Communication Manager.

Avaya Proactive Contact Agents log into Proactive Contact using the intuitive CallScripter web interface. The dialer selection, login credentials, job selection, tenant selection, agent state, call control options and all other agent interactions are presented to the user by the CallScripter.CTI.ProactiveContact.dll toolbar provider which communicates with the Avaya Proactive Contact R5.1 Agent Application Programming Interface (API) via moagent32.dll.

The CallScripter Application can be used in either hard-dialer or soft-dialer Computer Telephony Integration CTI environments and can identify the appropriate functionality to offer the agent depending on the dialer environment capabilities. CallScripter can handle inbound, outbound, blend and managed jobs, and is able to support multi-dialer, multi-tenant and multi-unit work list configurations.

CallScripter is configured so that the appropriate pre-configured Script is presented to the agent according to the job through which outbound calls are delivered to the agent. The script can be fully customized according to customer needs and can present a variety of options and pages through which the agent navigates during each outbound call transaction.

# 2. General Test Approach and Test Results

The interoperability compliance testing evaluated the ability of CallScripter to carry out call handling functions in a variety of scenarios through the API with Proactive Contact. The feature test cases were performed automatically. Outbound calls were automatically placed and delivered to CallScripter by Proactive Contact. Different types of jobs were exercised, along with a variety of actions initiated from CallScripter, to verify proper generation and handling of supported messages from Proactive Contact. The Proactive Contact Editor was used to start/stop and configure jobs. The verification included checking the display of fields, options, and values on CallScripter, and verification of the exchanged API events in the agentx_API.trans log files was also performed. All test cases were executed.

DevConnect Compliance Testing is conducted jointly by Avaya and DevConnect members. The jointly-defined test plan focuses on exercising APIs and/or standards-based interfaces pertinent to the interoperability of the tested products and their functionalities. DevConnect Compliance Testing is not intended to substitute full product performance or feature testing performed by DevConnect members, nor is it to be construed as an endorsement by Avaya of the suitability or completeness of a DevConnect member's solution.

## 2.1. Interoperability Compliance Testing

The feature testing focused on verifying successful login of Proactive Contact Agents using CallScripter and the display of CallScripter Scripts with appropriate options, fields, and values for the following scenarios:

- Outbound, inbound, blend and managed jobs
- Select dialer, select tenant, login, join job, select unit work list, go on/off break, change job, leave job, and logoff
- Hold, retrieve, call transfer, NVDT forward work, conference, place manual call, place managed call, cancel managed call, agent drop, release line, hang-up, and finish work
- Set recall and Agent Owned Recall and update customer fields
- Set completion codes

## 2.2. Test Results

All test cases were completed successfully with the following observations:

- During a blend job where an inbound call immediately follows an outbound call, the call record for the outbound call remains on the Script the agent is using. This is resolved in v.1.0.0.3 of CallScripter.CTI.ProactiveContact.dll
- Where a shadow job is used for recalls the correct script failed to pop. This was due to the dynamic nature under which shadow jobs are created and the field used in the AORNotify message to trigger the Script pop. e.g. Proactive Contact will send:

  AGTAORNotify NAgent server **shadowjob_2**Allid**outbnd2** to the agent.

  Where shadowjob_2 is the job dynamically created for the recalls and outbnd2 is the original job which would be linked to a Script to pop.
  CallScripter.CTI.ProactiveContact.dll v1.0.0.4 resolves this issue.

## 2.3. Support

Support for the CallScripter product can be obtained as follows:

- Website: http://www.callscripter.com
- Email: helpdesk@callscripter.com
- Phone: +44 (0)844 544 8882

## Reference Configuration

**Figure 1** below shows the compliance tested configuration comprising of Avaya Aura® Communication Manager hosted on an Avaya S8800 Media Server connected to an Avaya G450 Media Gateway. QSIG trunks from the Avaya G450 Media Gateway provide the path for calls to the Avaya PG230 Digital Switch which is controlled by Avaya Proactive Contact R5.1. A further PRI trunk provides access to a simulated PSTN. Avaya Proactive Contact Agents are logged into Proactive Contact using the web based CallScripter interface and Avaya 96xx IP Deskphones provide the agent headsets.

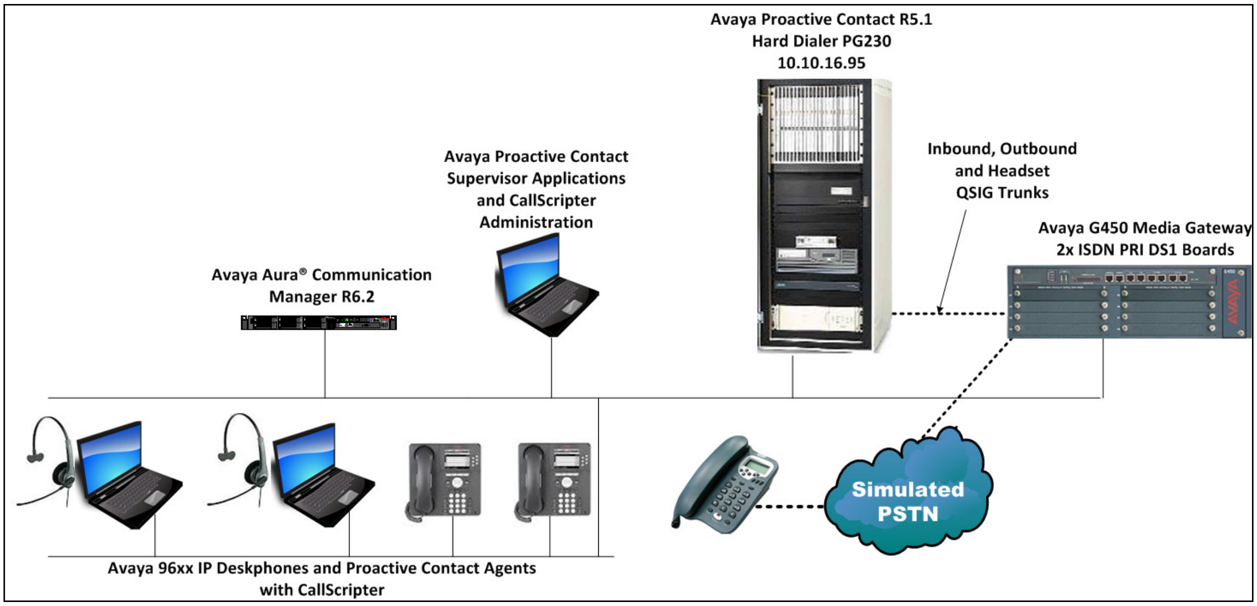

Avaya Proactive Contact R5.1
Hard Dialer PG230
10.10.16.95
Inbound, Outbound and Headset QSIG Trunks
Avaya Proactive Contact Supervisor Applications and CallScripter Administration
Avaya G450 Media Gateway
2x ISDN PRI DS1 Boards
Avaya Aura® Communication Manager R6.2
Simulated PSTN
Avaya 96xx IP Deskphones and Proactive Contact Agents with CallScripter

**Figure 1: Avaya Proactive Contact with CallScripter Configuration**

## 3. Equipment and Software Validated

The following equipment and software were used for the sample configuration provided:

| Equipment/Software | Release/Version |
|---|---|
| Avaya Aura® Communication Manager running on Avaya S8800 Server | R6.2 SP6 |
| Avaya Proactive Contact Running on HP DL360 | R5.1.0.0.1802 |
| Avaya 9630 IP Deskphone | 3.2 |
| Avaya PG230 | Generic Software 15.3.1 |
| CallScripter running on Windows Vista PC | CallScripter Environment 4.5.24.5654<br>CallScripter.CTI.ProactiveContact.dll 1.0.0.0 |

# 4. Configure Avaya Aura® Communication Manager

This section provides the procedures for configuring Communication Manager to support the PG230 integration. These application notes assume configuration of Communication Manager with Proactive Contact has already been performed. For illustratative purposes the procedures necessary for configuration includes the following area.

- Configure Trunks to Avaya PG230 Digital Switch

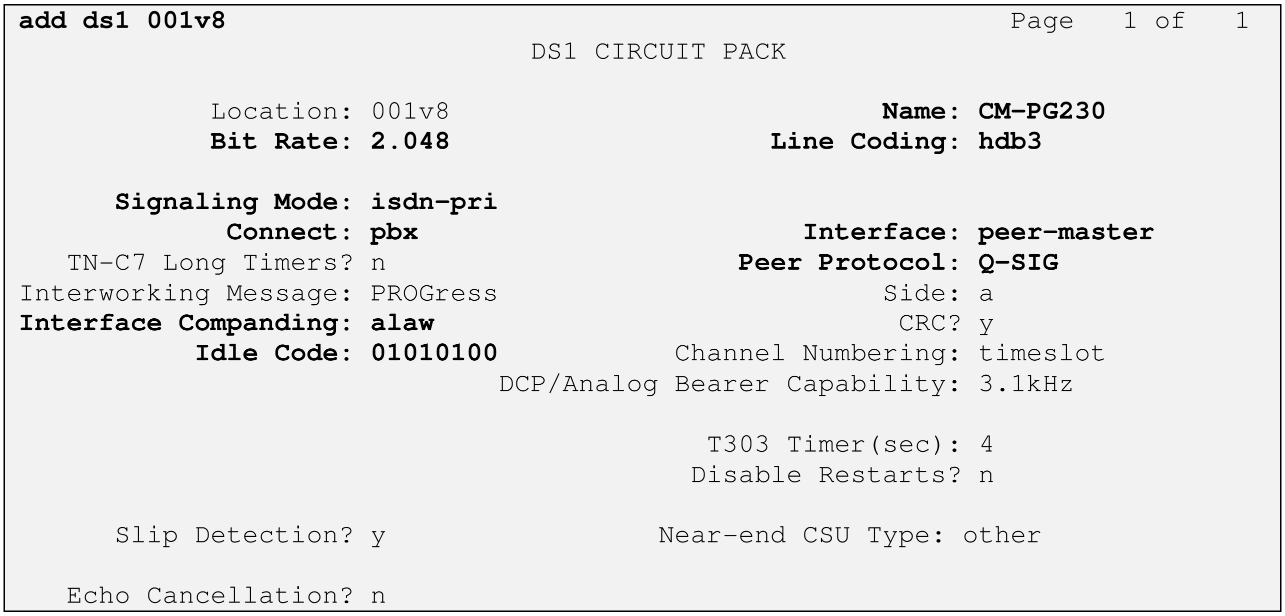
## 4.1. Configure Trunks to Avaya PG230 Digital Switch

A number of trunks are required for the purpose of communication between PG230 and Communication Manager. One trunk for calls in each of the following categories

- Agent Headsets (Dialback)
- Outbound
- Inbound
- Transfer

The physical connection is made between PG230 and the MM710 contained within the G450 Media Gateway. Enter the **add ds1 xxxxx** command, where **xxxxx** is the location of the DS1 media module pack. Configure the following

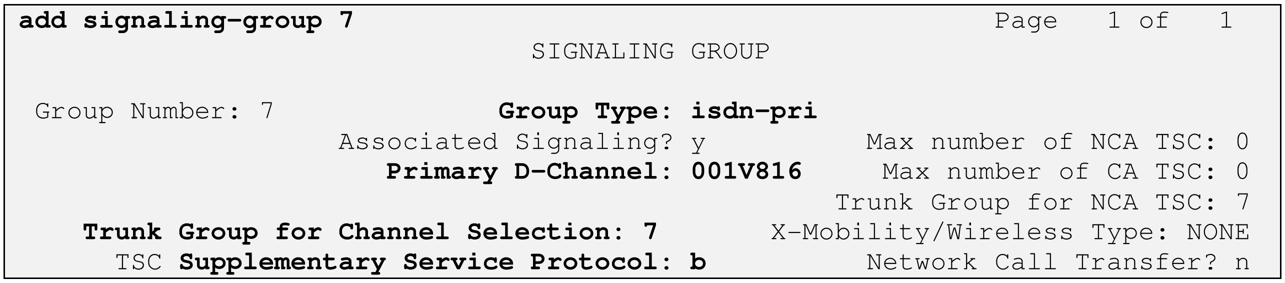
- **Name** set to any descriptive string value, in this case, it was **CM-PG230**
- **Bit Rate** set to **2.048**
- **Line Coding** set to **hdb3**
- **Signaling Mode** set to **isdn-pri**
- **Connect** set to **pbx**
- **Interface** set to **peer-master**
- **Peer Protocol** set to **Q-SIG**
- **Interface Companding** set to **alaw**
- **Idle Code** set to **01010100**



```
add ds1 001v8                                                      Page   1 of   1
                                DS1 CIRCUIT PACK

            Location: 001v8                            Name: CM-PG230
            Bit Rate: 2.048                     Line Coding: hdb3

      Signaling Mode: isdn-pri
             Connect: pbx                         Interface: peer-master
   TN-C7 Long Timers? n                       Peer Protocol: Q-SIG
Interworking Message: PROGress                         Side: a
Interface Companding: alaw                             CRC? y
           Idle Code: 01010100          Channel Numbering: timeslot
                              DCP/Analog Bearer Capability: 3.1kHz

                                            T303 Timer(sec): 4
                                          Disable Restarts? n

      Slip Detection? y                 Near-end CSU Type: other

   Echo Cancellation? n
```

Configure a Signaling Group for the previously configured DS1 board 001v8. Enter the **add signaling-group n** command, where **n** is an unused signaling group number. Configure the following on **Page 1.**

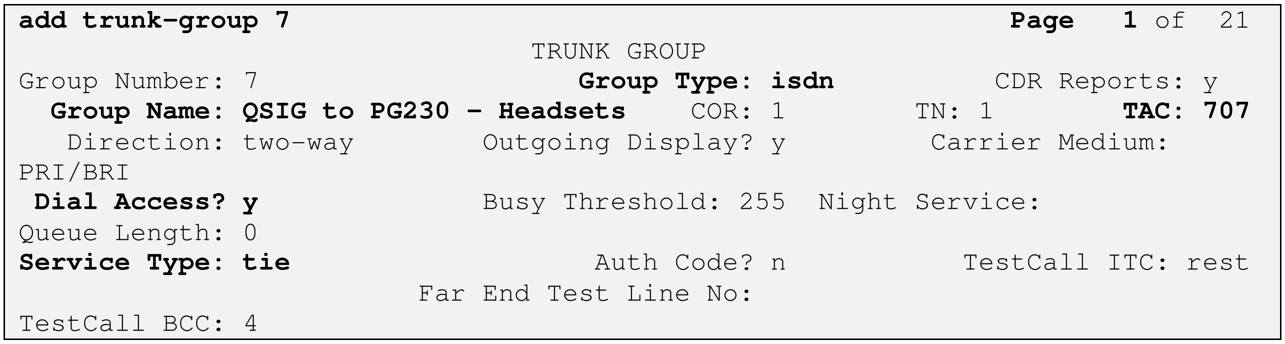
- **Group Type** set to **isdn-pri**
- **Primary D-Channel** enter the DS1 board number followed by 16
- **Trunk Group for Channel Selection** enter the 1st trunk group number that was configured for DS1 board 001v8; in this case trunk group **7**
- **TSC Supplementary Service Protocol** set to **b**



```
add signaling-group 7                                       Page   1 of   1
                                SIGNALING GROUP

 Group Number: 7                Group Type: isdn-pri
                    Associated Signaling? y          Max number of NCA TSC: 0
                       Primary D-Channel: 001V816     Max number of CA TSC: 0
                                                    Trunk Group for NCA TSC: 7
    Trunk Group for Channel Selection: 7       X-Mobility/Wireless Type: NONE
      TSC Supplementary Service Protocol: b          Network Call Transfer? n
```

Configure a trunk group used for inbound calls. Enter the **add trunk-group n** command, where **n** is an available trunk group number. Configure the following on **Page 1.**

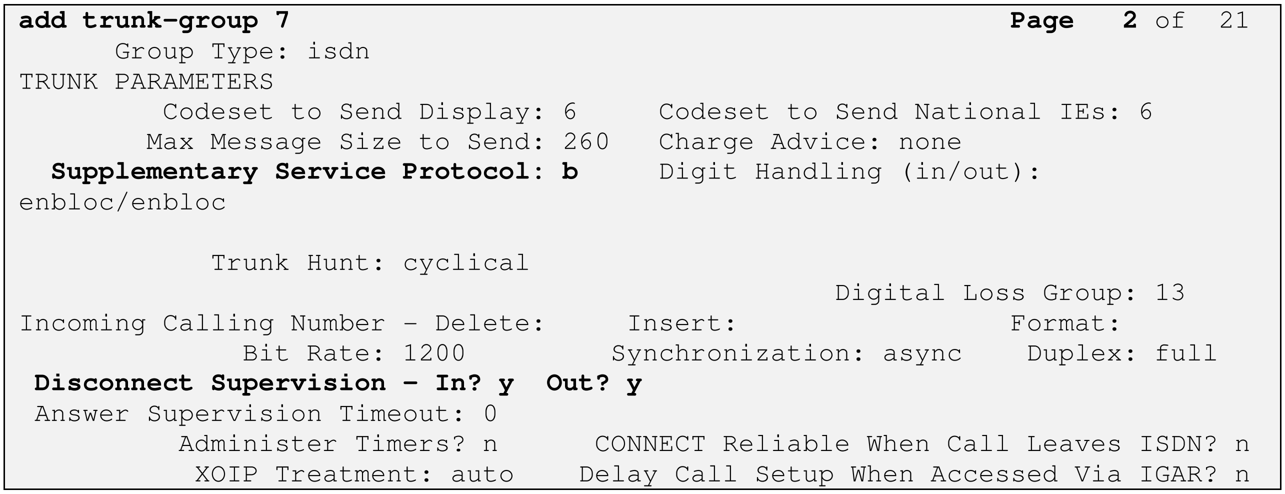
- **Group Type** set to **isdn**
- **Group Name** set to any descriptive string value, in this case, it was **QSIG to PG230 - Headsets**
- **TAC** enter a Trunk Access Code that is valid in the provisioned dial plan
- **Dial Access** set to **y**
- **Service Type** set to **tie**



```
add trunk-group 7                                             Page   1 of  21
                                TRUNK GROUP
Group Number: 7                    Group Type: isdn          CDR Reports: y
  Group Name: QSIG to PG230 - Headsets    COR: 1        TN: 1        TAC: 707
   Direction: two-way        Outgoing Display? y        Carrier Medium:
PRI/BRI
 Dial Access? y              Busy Threshold: 255  Night Service:
Queue Length: 0
Service Type: tie                   Auth Code? n           TestCall ITC: rest
                         Far End Test Line No:
TestCall BCC: 4
```

On **Page 2** of the trunk group configuration, specify the following:

- **Supplementary Service Protocol** set to **b**
- **Disconnect Supervision**
  - **In** set to **y**
  - **Out** set to **y**



```
add trunk-group 7                                             Page   2 of  21
      Group Type: isdn
TRUNK PARAMETERS
         Codeset to Send Display: 6     Codeset to Send National IEs: 6
        Max Message Size to Send: 260   Charge Advice: none
  Supplementary Service Protocol: b     Digit Handling (in/out):
enbloc/enbloc

            Trunk Hunt: cyclical
                                                   Digital Loss Group: 13
Incoming Calling Number - Delete:     Insert:               Format:
             Bit Rate: 1200        Synchronization: async    Duplex: full
 Disconnect Supervision - In? y  Out? y
 Answer Supervision Timeout: 0
          Administer Timers? n      CONNECT Reliable When Call Leaves ISDN? n
           XOIP Treatment: auto    Delay Call Setup When Accessed Via IGAR? n
```

On **Page 5**, configure **GROUP MEMBER ASSIGNMENTS** as follows:

- **Port** enter the DS1 board number followed by the trunk member number. The ports configured on Communication Manager must be mapped to the ports configured on the PG230 Digital Switch.
- **Sig Grp** enter the number of the signaling group configured for the DS1 board 001v8, in this case it is Signaling Group **7**.

```
add trunk-group 7                                                 Page   5 of  21
                                 TRUNK GROUP
                                      Administered Members (min/max):   1/5
GROUP MEMBER ASSIGNMENTS                  Total Administered Members:   5

       Port    Code Sfx Name         Night            Sig Grp
  1: 001V801  MM710                                     7
  2: 001V802  MM710                                     7
  3: 001V803  MM710                                     7
  4: 001V804  MM710                                     7
  5: 001V805  MM710                                     7
```

**Note**: There is different port numbering between PG230 Digital Switch and Communication Manager; therefore ports 2-6 on PG230 Digital Switch correspond to ports 1-5 on Communication Manager.

Repeat the above configuration steps in order to configure remaining trunk groups for Outbound Inbound and Transfer calls. For each trunk group make sure that the number of ports in GROUP MEMBER ASSIGNMENTS is correctly mapped to the number of ports configured on the PG230. Also, for every trunk group, configure each port with signaling group 7.

Enter **list trunk-group** command, to list all trunk groups that were configured on the Communication Manager. Below is the list of all trunk groups that were configured for the E1 QSIG trunk between Communication Manager and PG230 Digital Switch. In addition, note the presence of the preconfigured Simulated PSTN trunk, the configuration of which is outside of the scope of these Application Notes.

```
list trunk-group
                                TRUNK GROUPS

Grp                                                 No.                    Out Que
No.  TAC  Group Type    Group Name                  Mem TN  COR CDR Meas Dsp Len

2    702  isdn          Simulated PSTN to CM6.0.1   8   1   1   r   both n   0
7    707  isdn          QSIG to PG230 - Headsets    5   1   1   y   both y   0
8    708  isdn          QSIG to PG230 - Outbound    10  1   1   y   both n   0
9    709  isdn          QSIG to PG230 - Inbound     5   1   1   y   both n   0
10   710  isdn          QSIG to PG230 - Transfer    5   1   1   y   both n   0
```

# 5. Configure Avaya Proactive Contact

It is assumed a fully operating Proactive Contact has been implemented. If assistance is required with Proactive Contact, please contact Avaya Professional Services or an Avaya Business Partner. The following pages illustrate the configuration of Proactive Contact.

## 5.1. Configure dgswitch.cfg

Edit **/opt/avaya/pds/config/dgswitch.cfg** as shown below. The format used is based on the location of the ports in the PG230 Digital Switch; therefore Proactive Contact is configured with the same number of Inbound Ports as the number of inbound lines on the PG230 Digital Switch. The inbound ports configured on Proactive Contact correspond to the ports of the inbound trunk group configured on Communication Manager in **Section 4.1**, the same is true for Headset, Outbound and Transfer trunk ports. Note the headset group 15 specified here as in opmon.cfg.

```
# Headset Ports
H:1:361:1::#H:15:1:1-1-21-4-2
H:2:362:1::#H:15:1:1-1-21-4-3
H:3:363:1::#H:15:1:1-1-21-4-4
H:4:364:1::#H:15:1:1-1-21-4-5
H:5:365:1::#H:15:1:1-1-21-4-6

# Normal Outbound Trunks
N:1:366:1::#O:10:1:1-1-21-4-7
N:2:367:1::#O:10:1:1-1-21-4-8
N:3:368:1::#O:10:1:1-1-21-4-9
N:4:369:1::#O:10:1:1-1-21-4-10
N:5:370:1::#O:10:1:1-1-21-4-11
N:6:371:1::#O:10:1:1-1-21-4-12
N:7:372:1::#O:10:1:1-1-21-4-13
N:8:373:1::#O:10:1:1-1-21-4-14
N:9:374:1::#O:10:1:1-1-21-4-15
N:10:375:1::#O:10:1:1-1-21-4-16

# Normal Inbound Trunks

N:11:377:1::#I:11:1:1-1-21-4-18
N:12:378:1::#I:11:1:1-1-21-4-19
N:13:379:1::#I:11:1:1-1-21-4-20
N:14:380:1::#I:11:1:1-1-21-4-21
N:15:381:1::#I:11:1:1-1-21-4-22

# Transfer-thru Trunks
T:1:382:1::#T:12:1:1-1-21-4-23
T:1:383:1::#T:12:1:1-1-21-4-23
T:1:384:1::#T:12:1:1-1-21-4-23
T:1:385:1::#T:12:1:1-1-21-4-23
T:1:386:1::#T:12:1:1-1-21-4-23
```

Edit only the last 4 lines of **/opt/avaya/pds/config/voicemsg.cfg**, this file refers to the announcements recorded on the PG230.

```
250:greeting:1027:Female:Folder4:Voice:Message27
251:inbound:1028:Female:Folder4:Voice:Message28
252:outbound:1029:Female:Folder4:Voice:Message29
253:notLoggedIn:1030:Female:Folder4:Voice:Message30
```

Navigate to the **/opt/avaya/pds/scripts** directory and copy the telephny_hd.spt file to the telephny.spt file using the following command **cp telephny_hd.spt telephny.spt**. This file defines Hard Dialer specific parameters.

## 5.2. Configure master.cfg

Amendments to the **master.cfg** file, located in the **/opt/avaya/pds/etc** directory, were made as follows:

```
DBKGROUP:15,1,1
DBSERVERIP:10.10.16.95
IICB_HOST:devconhd501
INBNDSYS:YES
LINEASSIGN:REG,O=1-10;INB,I=11-15
MULTI_UNIT_ACCESS:YES
NAMESERVICEHOST:devconhd501
OPERATORS:5
OPLIMIT:I=5,O=5,B=5,P=5,M=5
PORTS:15
PRIMARY:YES
SWITCHNAME:switch1
SWITCHTESTMODE:NO
SWITCHTYPE:DIGITAL
VISUAL_CPA:YES
WEBLMURL:http,//10.10.16.95,8080/WebLM/LicenseServer:
```

**Note**: MULTI_UNIT_ACCESS was configured as required according to the test case executed.

## 5.3. Configure number format

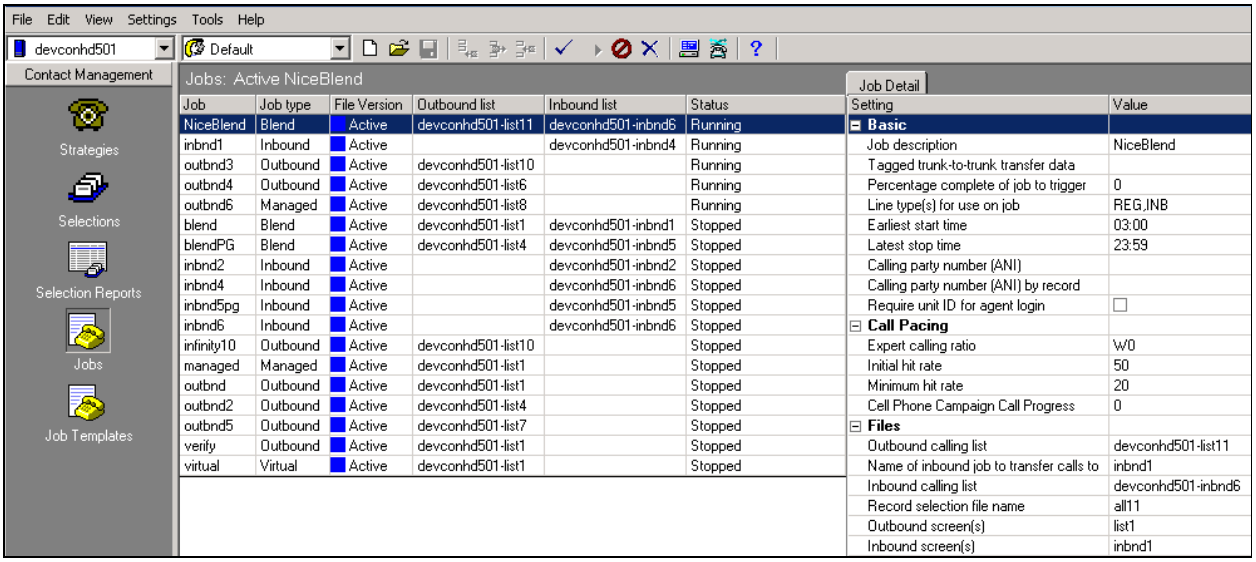
The **/opt/avaya/pds/config/phonefmt.cfg** file contains details of how Proactive Contact needs to manipulate numbers in the calling list in order to successfully place them. The final line in the file is configured as follows:

```
STD_TO_DIALFMT:(country code):(line type):(strip):(prefix):(suffix): \
#               (description)
#   where:
#       country code -  "Calling to" country code digits.
#       line type -     Line type (line assignment label), or ALLTYPES
#                       for all line types.
#       strip -         Number of digits to strip from the start of the
#                       standard phone number (before prefix applied).
#       prefix -        Characters to prefix to stripped phone number.
#                       (Max 12 chars.)
#       suffix -        Characters to suffix to phone number. (Max 12 chars.)
#       description -   Optional description.
STD_TO_DIALFMT:*:ALLTYPES:10:902075554022::
```

In this instance of the digits dialed, **10** are deleted and replaced with **902075554022** and the call is routed over the outbound trunk. It is assumed Communication Manager has the necessary configuration required to route the call accordingly, in this case, over the Simulated PSTN.

# 6. Perform Avaya Proactive Contact Job Configuration

It is assumed that the necessary pre-configuration of relevant job components such as tenants, calling lists, strategies, record selections and jobs have already been configured as required.. For the purpose of the compliance testing various job types were configured named **outbnd3, outbnd4, outbnd6, inbnd1** and **NiceBlend** as shown below in the Proactive Contact Editor application.



Jobs: Active NiceBlend

| Job | Job type | File Version | Outbound list | Inbound list | Status |
|---|---|---|---|---|---|
| NiceBlend | Blend | 🟦 Active | devconhd501-list11 | devconhd501-inbnd6 | Running |
| inbnd1 | Inbound | 🟦 Active | | devconhd501-inbnd4 | Running |
| outbnd3 | Outbound | 🟦 Active | devconhd501-list10 | | Running |
| outbnd4 | Outbound | 🟦 Active | devconhd501-list6 | | Running |
| outbnd6 | Managed | 🟦 Active | devconhd501-list8 | | Running |
| blend | Blend | 🟦 Active | devconhd501-list1 | devconhd501-inbnd1 | Stopped |
| blendPG | Blend | 🟦 Active | devconhd501-list4 | devconhd501-inbnd5 | Stopped |
| inbnd2 | Inbound | 🟦 Active | | devconhd501-inbnd2 | Stopped |
| inbnd4 | Inbound | 🟦 Active | | devconhd501-inbnd6 | Stopped |
| inbnd5pg | Inbound | 🟦 Active | | devconhd501-inbnd5 | Stopped |
| inbnd6 | Inbound | 🟦 Active | | devconhd501-inbnd6 | Stopped |
| infinity10 | Outbound | 🟦 Active | devconhd501-list10 | | Stopped |
| managed | Managed | 🟦 Active | devconhd501-list1 | | Stopped |
| outbnd | Outbound | 🟦 Active | devconhd501-list1 | | Stopped |
| outbnd2 | Outbound | 🟦 Active | devconhd501-list4 | | Stopped |
| outbnd5 | Outbound | 🟦 Active | devconhd501-list7 | | Stopped |
| verify | Outbound | 🟦 Active | devconhd501-list1 | | Stopped |
| virtual | Virtual | 🟦 Active | devconhd501-list1 | | Stopped |

| Setting | Value |
|---|---|
| ⊟ **Basic** | |
| Job description | NiceBlend |
| Tagged trunk-to-trunk transfer data | |
| Percentage complete of job to trigger | 0 |
| Line type(s) for use on job | REG,INB |
| Earliest start time | 03:00 |
| Latest stop time | 23:59 |
| Calling party number (ANI) | |
| Calling party number (ANI) by record | |
| Require unit ID for agent login | □ |
| ⊟ **Call Pacing** | |
| Expert calling ratio | W0 |
| Initial hit rate | 50 |
| Minimum hit rate | 20 |
| Cell Phone Campaign Call Progress | 0 |
| ⊟ **Files** | |
| Outbound calling list | devconhd501-list11 |
| Name of inbound job to transfer calls to | inbnd1 |
| Inbound calling list | devconhd501-inbnd6 |
| Record selection file name | all11 |
| Outbound screen(s) | list1 |
| Inbound screen(s) | inbnd1 |

# 7. Configure CallScripter

The CallScripter application is deployed and configured according to customer requirements, through engagement directly with the CallScripter Project Team. The configuration steps required for integration to Proactive Contact can be summarized as follows:

- Configure windows service connection to Avaya Proactive Contact
- Link Job to Script
- Link Job Data to CallScripter Script Fields
- Create CallScripter User
- Configure agent toolbar connection to Avaya Proactive Contact

## 7.1. Configure Connection to Avaya Proactive Contact

The CallScripter application contains a Windows Service that polls the Avaya environment(s) to retrieve a list of tenants, active jobs, data fields and outcomes (completion codes). This information is stored locally within the CallScripter SQL database and used to connect the CallScripter scripts to the relevant Jobs/Fields. All communication between CallScripter and the Avaya Proactive Contact dialler is through the Avaya Agent API (moagent32.dll).

The windows service is part of the CallScripter installation process and is configurable via configuration keys within the CallScripter system.

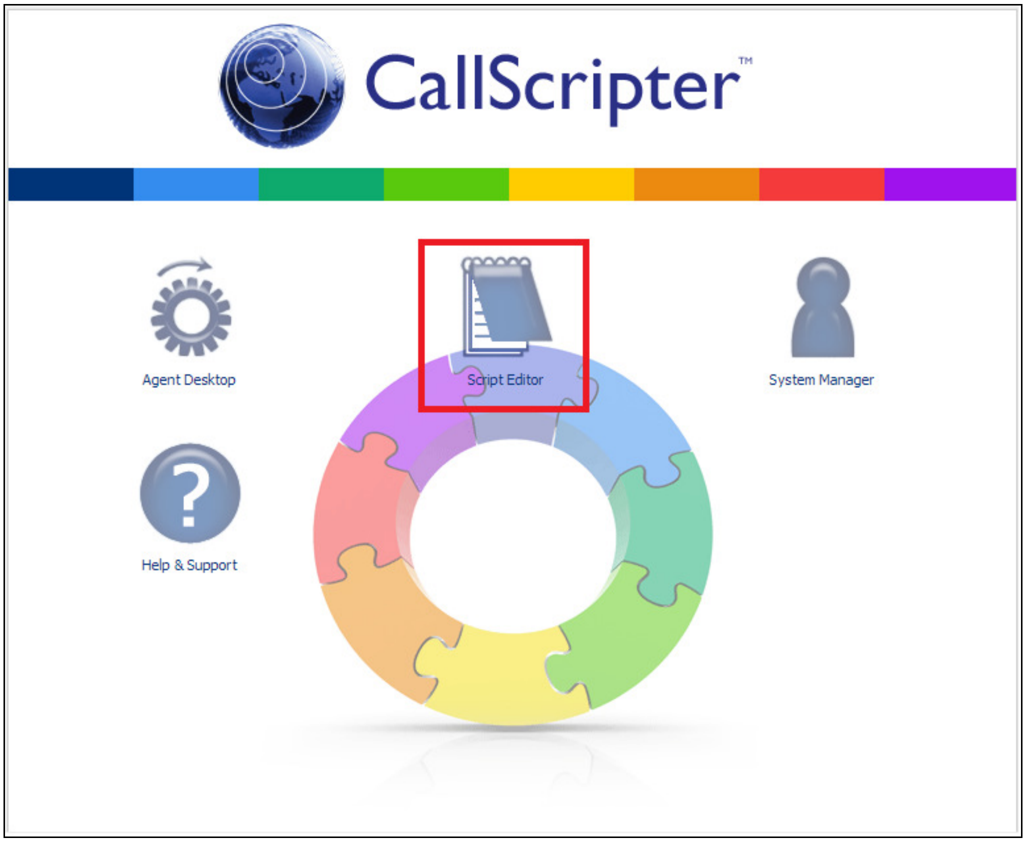
Navigate to the CallScripter installation directory and using an appropriate text editor open **CSEFProativeContactDataLoader.dll.config** and edit the configuration keys as follows:

- **MosaixPort** – enter **22700** which is the default port used by the Proactive Contact Agent API
- **MosaixUserName** – enter an appropriate Proactive Contact username in this case **agent5**
- **MosaixPassword** – enter a corresponding password
- **MosaixRetryTime** – enter an appropriate polling interval, in this case **1800000**

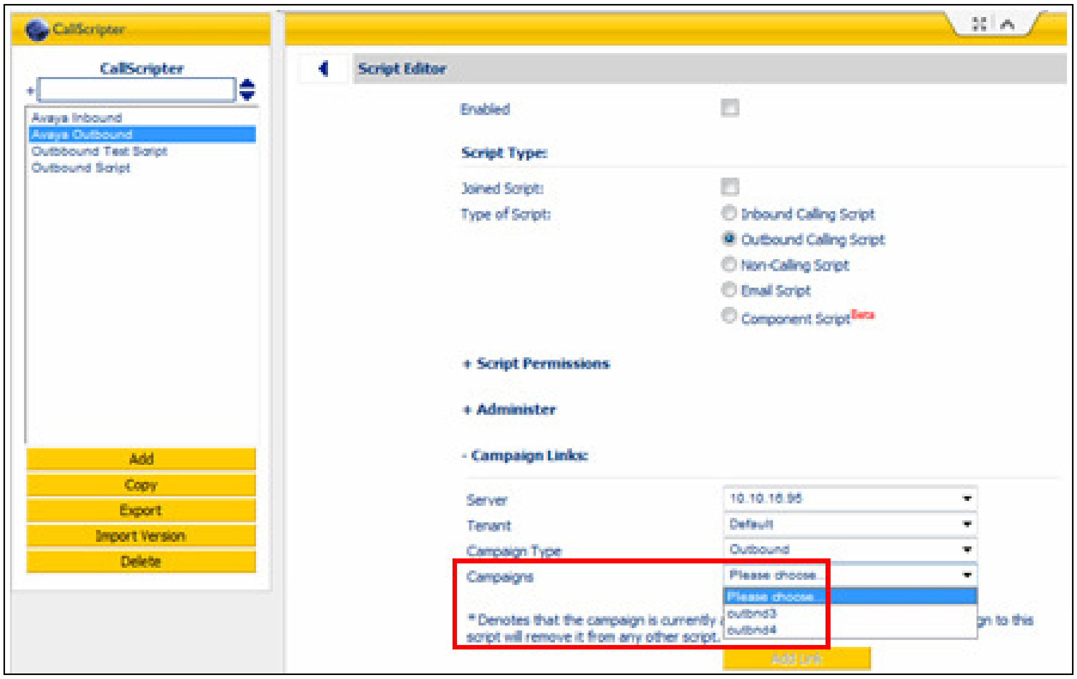
```
    <!--
        Setting:      MosaixPort
        Valid values: positive whole number
        Description:  Port number to connect to proactive contact
            -->
    <add key="MosaixPort" value="22700"/>

    <!--
        Setting:      MosaixUserName
        Valid values: text
        Description:  valid user to connect to proactive contact with 
permissions to read and connect to all jobs
            -->
    <add key="MosaixUserName" value="agent5"/>

    <!--
        Setting:      MosaixPassword
        Valid values: text
        Description:  password for above username
            -->
    <add key="MosaixPassword" value="05"/>

    <!--
        Setting:      MosaixLogPath
        Valid values: text
        Description:  log for framework to write text logs
            -->
    <add key="MosaixLogPath" value="C:\Program 
Files\CallScripter\Utilities\EnterpriseFramework\logs"/>

    <!--
        Setting:      MosaixRetryTime
        Valid values: positive whole number
        Description:  Thread sleep time in ms between sourcing data.
Typically 30 minutes : 1800000
            -->
    <add key="MosaixRetryTime" value="1800000"/>
```

## 7.2. Link Job to Script

After logging into the CallScripter application, users with the relevant licences applied to their profiles will be able to gain access to the CallScripter script editor section of the main menu.



Within the Script Editor admin screens, the user will choose a customer and a script to administer (or create a new customer/script). In order for a Script to pop when a call is delivered to an agent for a specific job, the Script and job must be linked within the CallScripter application. Using the CallScripter Script Editor, select the appropriate job to link to in the **Campaign** drop-down box (these drop downs will be populated by the windows service). The user will need to drill down through dialer, tenant, job type and select the job they wish to link to the script from the **Campaigns** drop down box. By clicking on the **Add Link** button and clicking **Save** (not shown) the link will be established.



Enabled □

Script Type:

Joined Script: □

Type of Script:
○ Inbound Calling Script
● Outbound Calling Script
○ Non-Calling Script
○ Email Script
○ Component Script Beta

+ Script Permissions

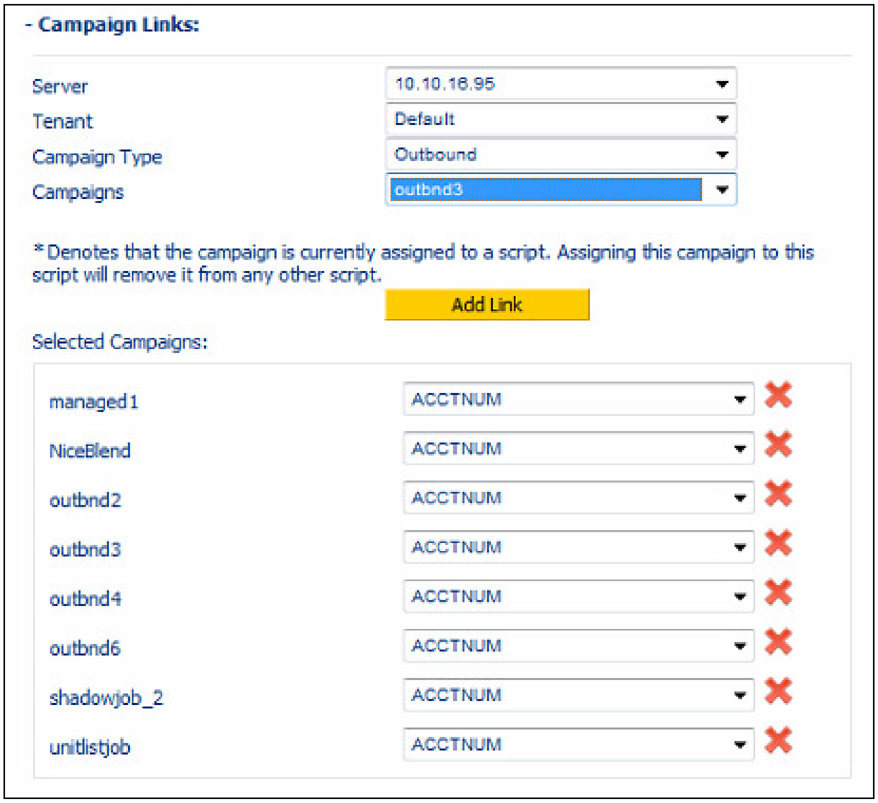
+ Administer

- Campaign Links:

Server: 10.10.16.95
Tenant: Default
Campaign Type: Outbound
Campaigns: Please choose
Please choose
outbnd3
outbnd4

* Denotes that the campaign is currently … gn to this script will remove it from any other script.

Once the link has been created between the job name and the script the field which should be used as the reference for the script pop must be configured This is usually set to **ACCTNUM** but any field in the job can be used as a reference field providing it is unique for each record in the calling list.



- Campaign Links:

| | |
|---|---|
| Server | 10.10.18.95 |
| Tenant | Default |
| Campaign Type | Outbound |
| Campaigns | outbnd3 |

*Denotes that the campaign is currently assigned to a script. Assigning this campaign to this script will remove it from any other script.

Selected Campaigns:

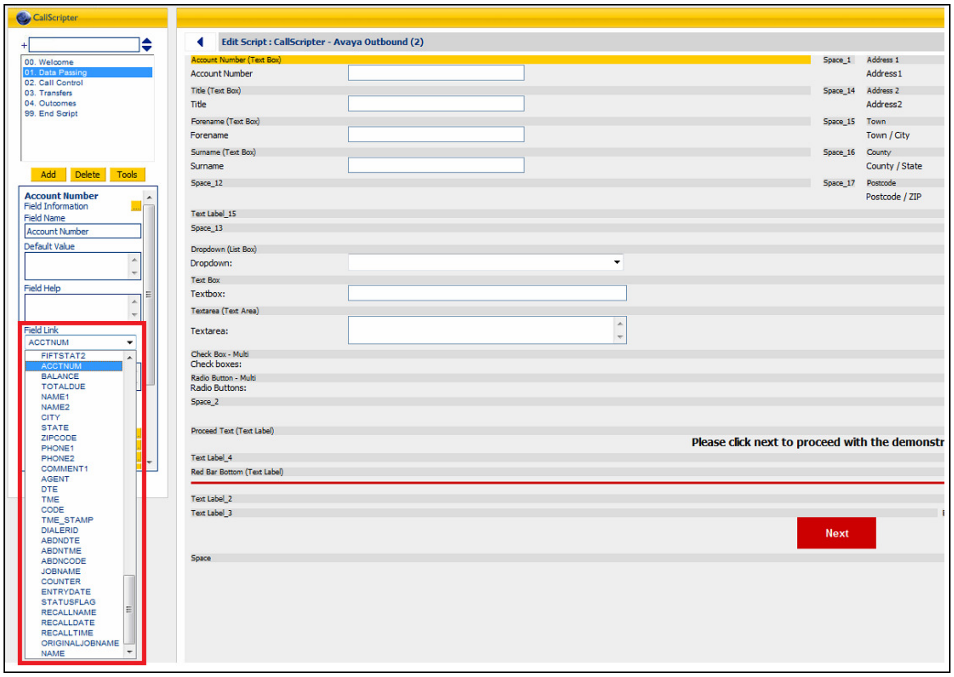
| | |
|---|---|
| managed1 | ACCTNUM |
| NiceBlend | ACCTNUM |
| outbnd2 | ACCTNUM |
| outbnd3 | ACCTNUM |
| outbnd4 | ACCTNUM |
| outbnd6 | ACCTNUM |
| shadowjob_2 | ACCTNUM |
| unitlistjob | ACCTNUM |

**Note**: The reference field chosen must be unique for each record in the call list.

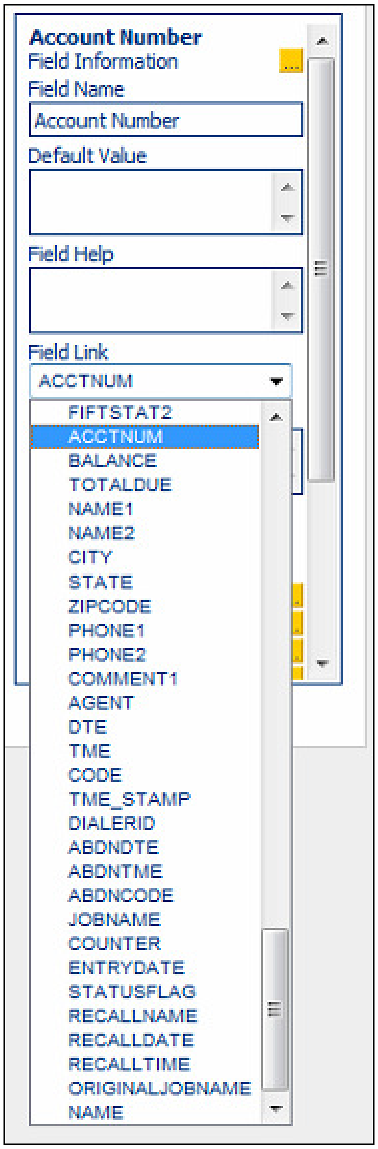
## 7.3. Link Job Data to CallScripter Script Fields

Once a Proactive Contact job has been linked to a CallScripter Script, a list of Calling List data fields associated to the Proactive Contact job will be presented in the Script Editor, as an attribute for each field in the script. The Proactive Contact Calling List data fields are linked to fields within the Script so that on delivery of a call to the agent the appropriate script will pop based on the link to the job, and the calling list detail will be displayed to the agent by the Script in the relevant fields on the page. This link will act as a two-way communication between the script field and the Proactive Contact Calling List data fields. If the agent updates information in the script and transitions off the Script page (or closes the Script) the data for each field that is linked will be automatically written back to the Proactive Contact Calling List data fields. Multiple Script fields can be linked to the same Proactive Contact Calling List data field. If this is the case, the last field to be rendered on the page will be the one that applies its data to the call list on page transition.

The screenshot below displays the Script **Avaya Outbound (2)** in the Script Editor with the Calling List data fields presented on the left hand side in the control attributes.



Select the appropriate **Field Name** in this case **Account Number** and from the **Field Link** drop down box select the field in the Calling List to link to, in this case **ACCTNUM**.



Account Number

Field Information

Field Name

Account Number

Default Value

Field Help

Field Link

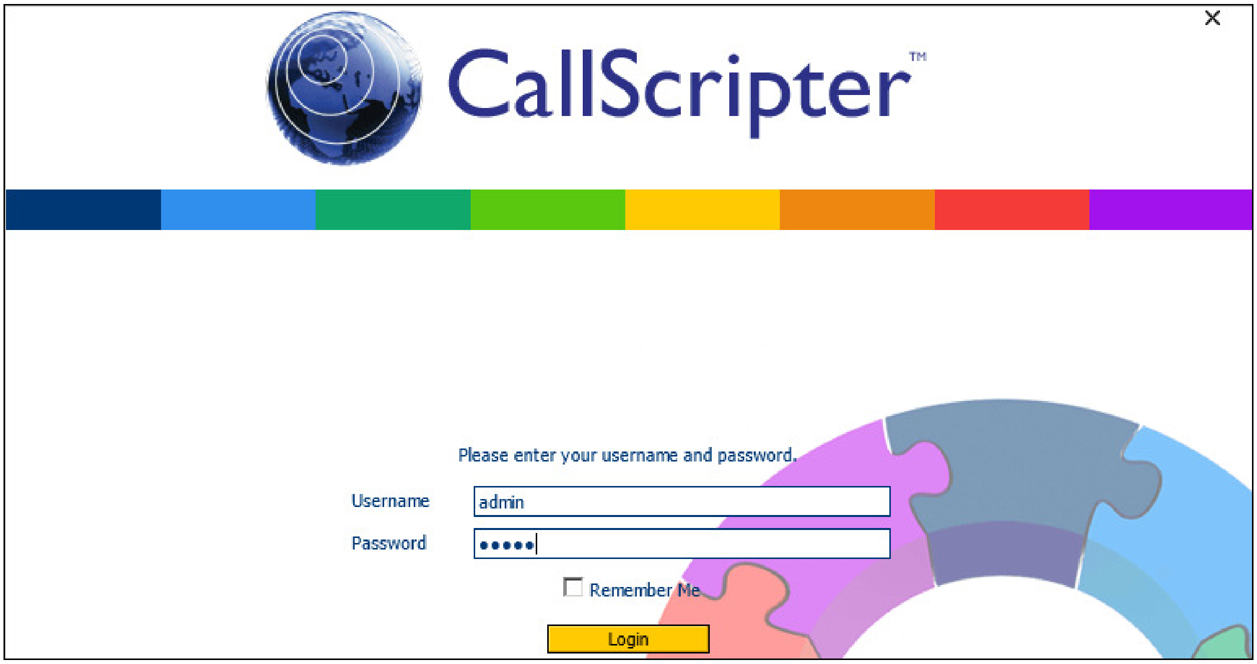
ACCTNUM

## 7.4. Create CallScripter User

A user must be configured within the CallScripter application to allow an agent to log into CallScripter and start taking/making calls using the Avaya Proactive Contact integration. The username created in CallScripter doesn't have to match the usernames in Proactive contact.

The user will access the CallScripter application via Internet explorer by navigating to the CallScripter Main page in this case http://callscripwin7/?ra=true and login using the user credentials (username and password). In order to add users to the application the user must login using a profile that has the admin licence applied to it.

**Note**: If CallScripter is setup to run in windows authentication mode, the username within CallScripter must match the windows username that the agents are logging onto the PC with.

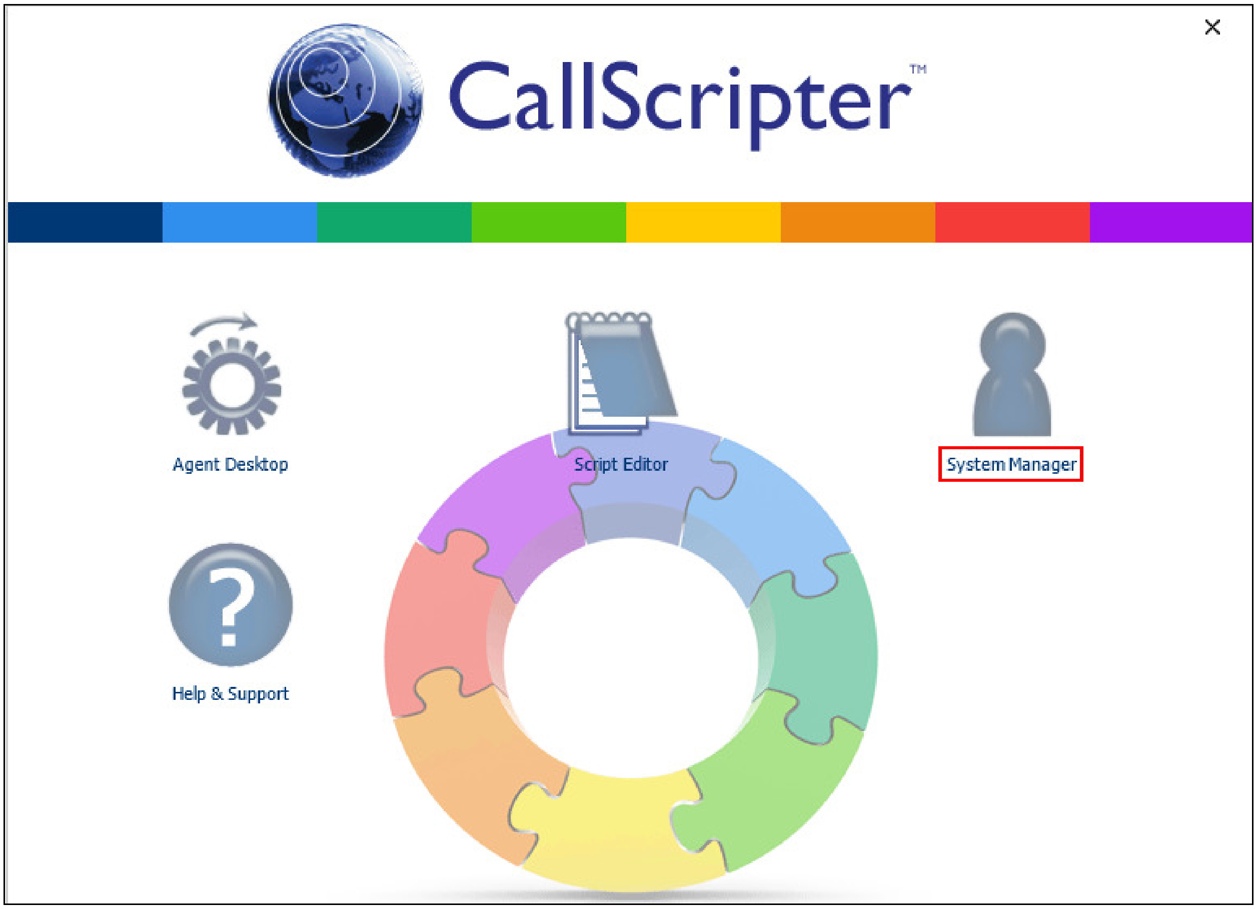


Please enter your username and password.

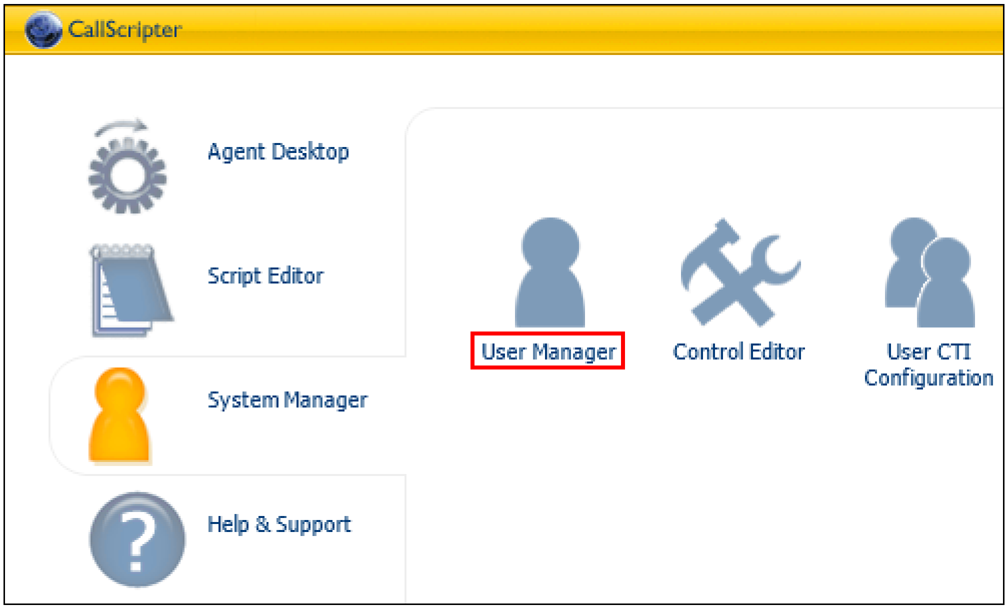
Username: admin

Password: •••••

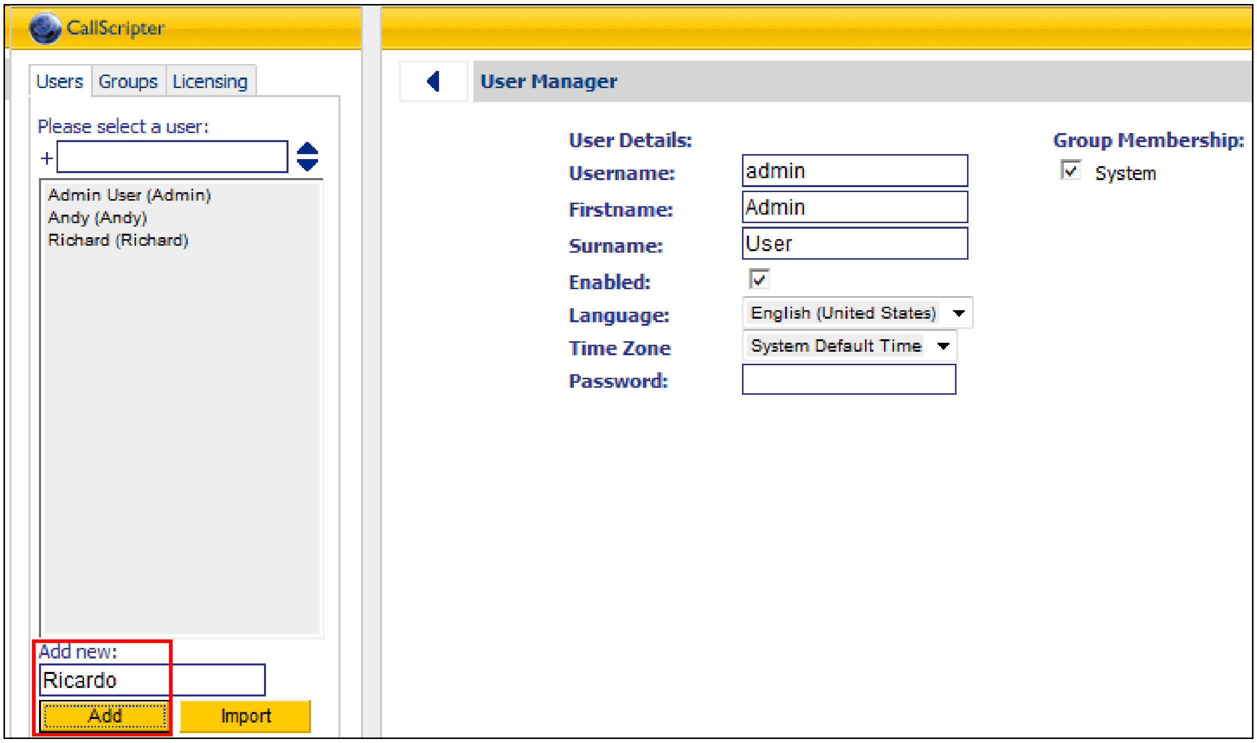
The following screen will appear, click **System Manager** as shown below.



Click **User Manager**.



In the **Add new:** field, enter a new username and click **Add**.



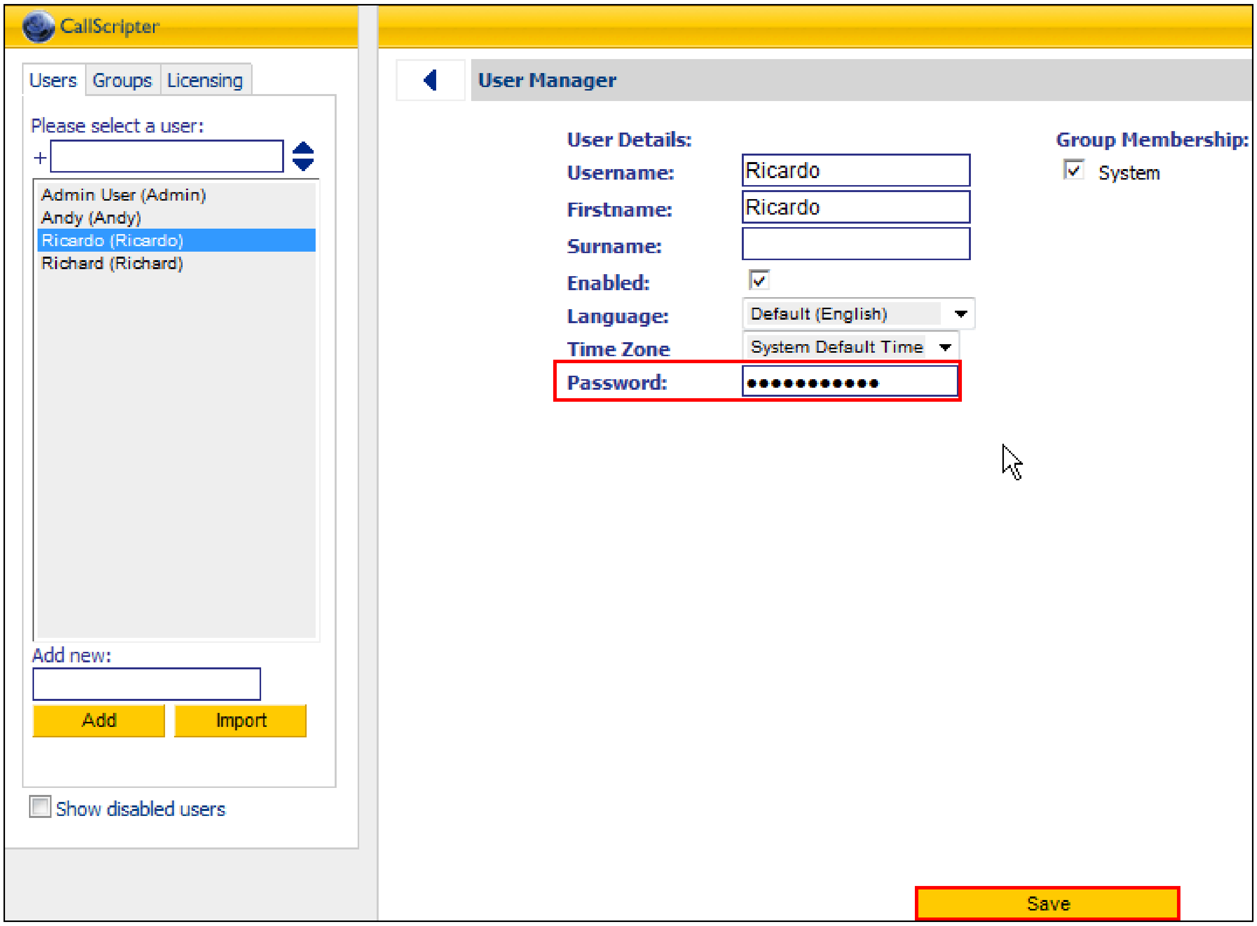
Admin User (Admin)
Andy (Andy)
Richard (Richard)

Add new: Ricardo
Add

User Details:
Username: admin
Firstname: Admin
Surname: User
Enabled: ☑
Language: English (United States)
Time Zone System Default Time
Password:

Group Membership:
☑ System

Enter a **Password** and click **Save**.



User Details:

| | |
|---|---|
| Username: | Ricardo |
| Firstname: | Ricardo |
| Surname: | |
| Enabled: | ☑ |
| Language: | Default (English) |
| Time Zone | System Default Time |
| Password: | ●●●●●●●●●●● |

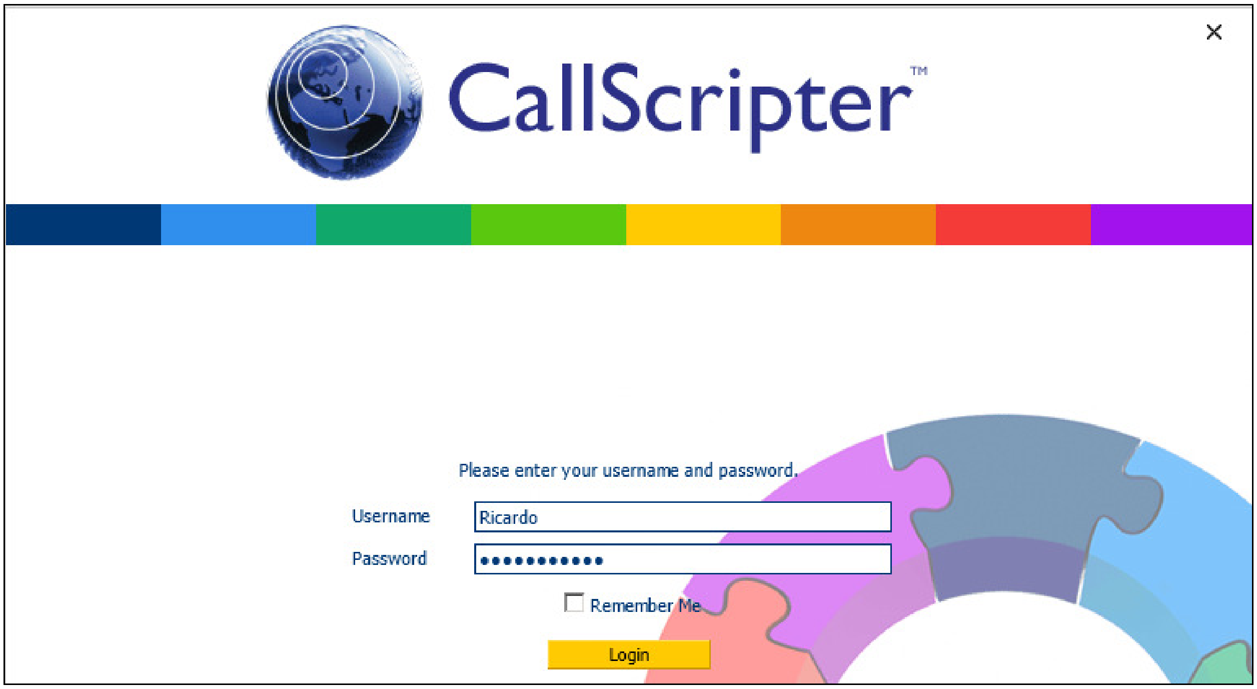
Group Membership:
☑ System

Once a user has been added to CallScripter they will automatically be given the licence to access the **Agent Desktop** within CallScripter. Should additional licences be needed to allow the user to access other parts of the application, they can be applied using the licensing tab in the top left corner of the screen.

**Note**: If the user needs the ability to link Scripts to Proactive Contact jobs or amend Scripts they will need to be assigned the **Script Editor** licence to see this part of the application.

## 7.5. Login New CallScripter User

From the main login page login using the newly created CallScripter User.



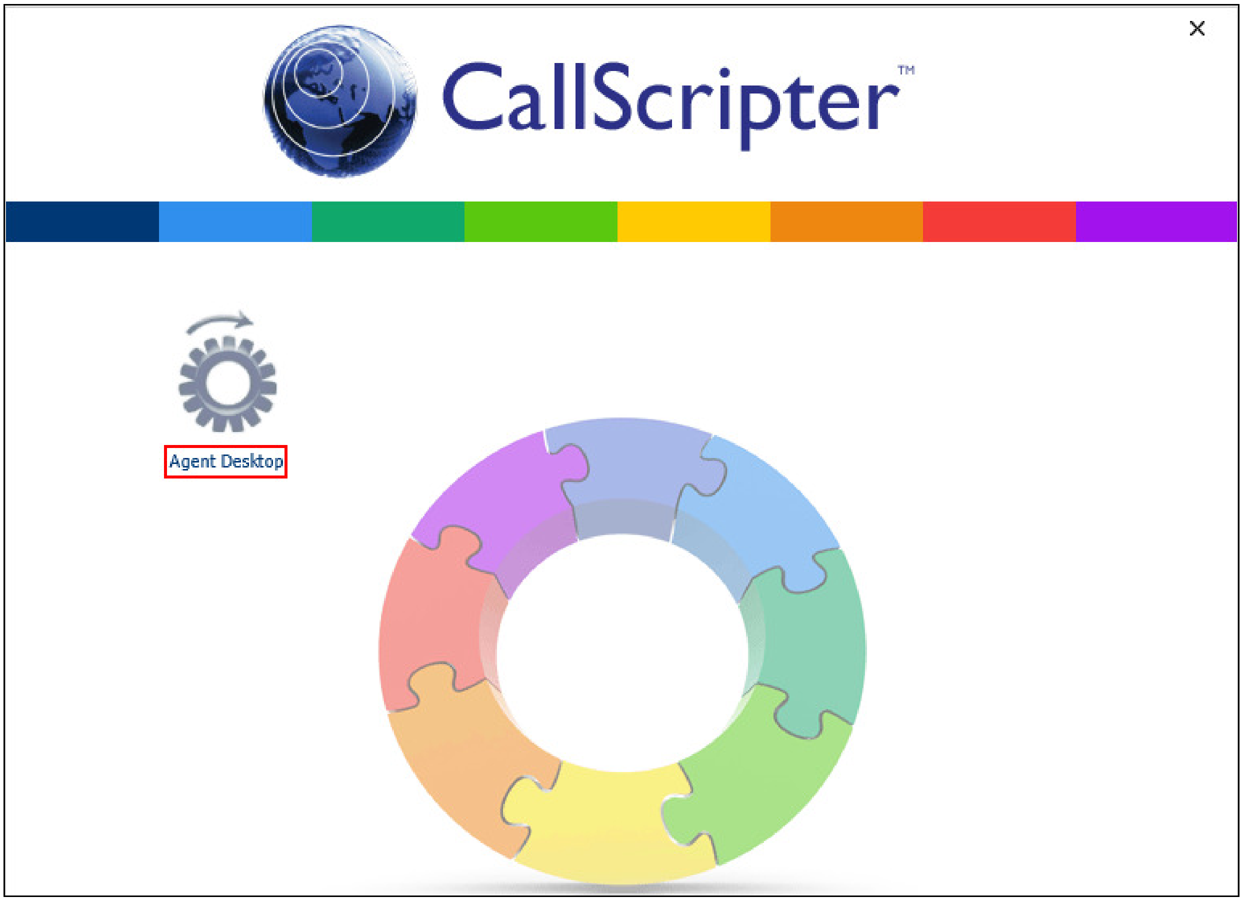
Please enter your username and password.

Username: Ricardo

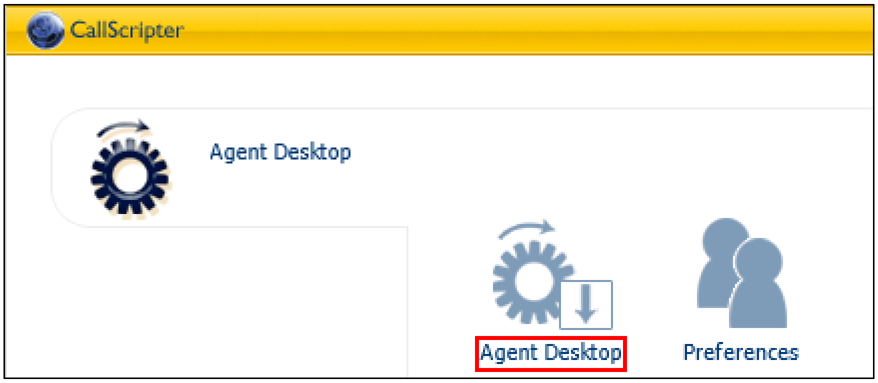
Password: ●●●●●●●●●●●

□ Remember Me

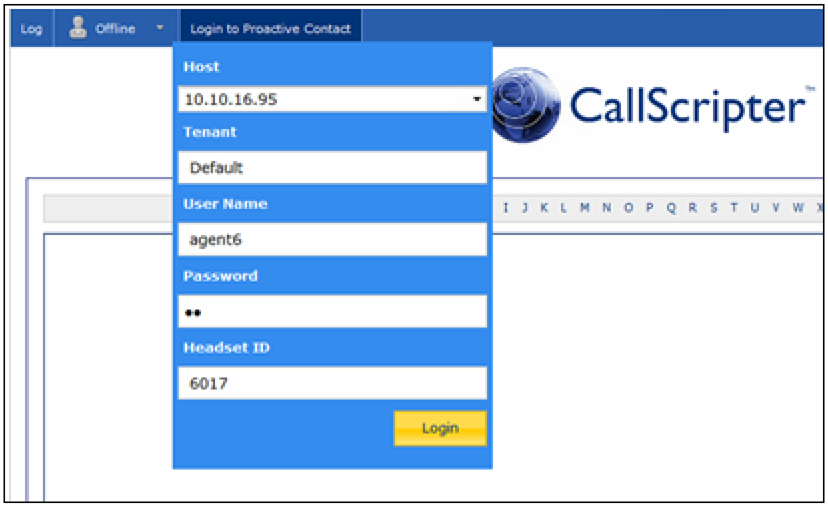
Click **Agent Desktop**.



And click **Agent Desktop** again.



The following page will appear in the Toolbar, select the appropriate **Host** address, enter the correct **Tenant**, Proactive Contact agent **User Name** and corresponding **Password** and the **Headset ID** of the agent (in this case the agents desk phone) and click **Login**.



Host: 10.10.16.95

Tenant: Default

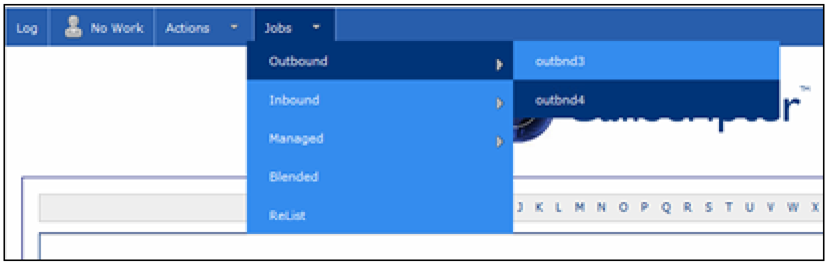
User Name: agent6

Password: ••

Headset ID: 6017

Proactive Contact will place a call on the Headset Trunk to Communication Manage to extension 6017, upon answering the call the user will head the familiar "Welcome to Avaya Proactive Contact" message and the line will remain connected for the duration of the agent login session.

Once logged in successfully the user will be prompted to select a job type and job name from the Toolbar.



If the job is configured to require unit ID for agent login, then the user will also be prompted to select a unit name on the toolbar, else the user will be attached to the job without this step.

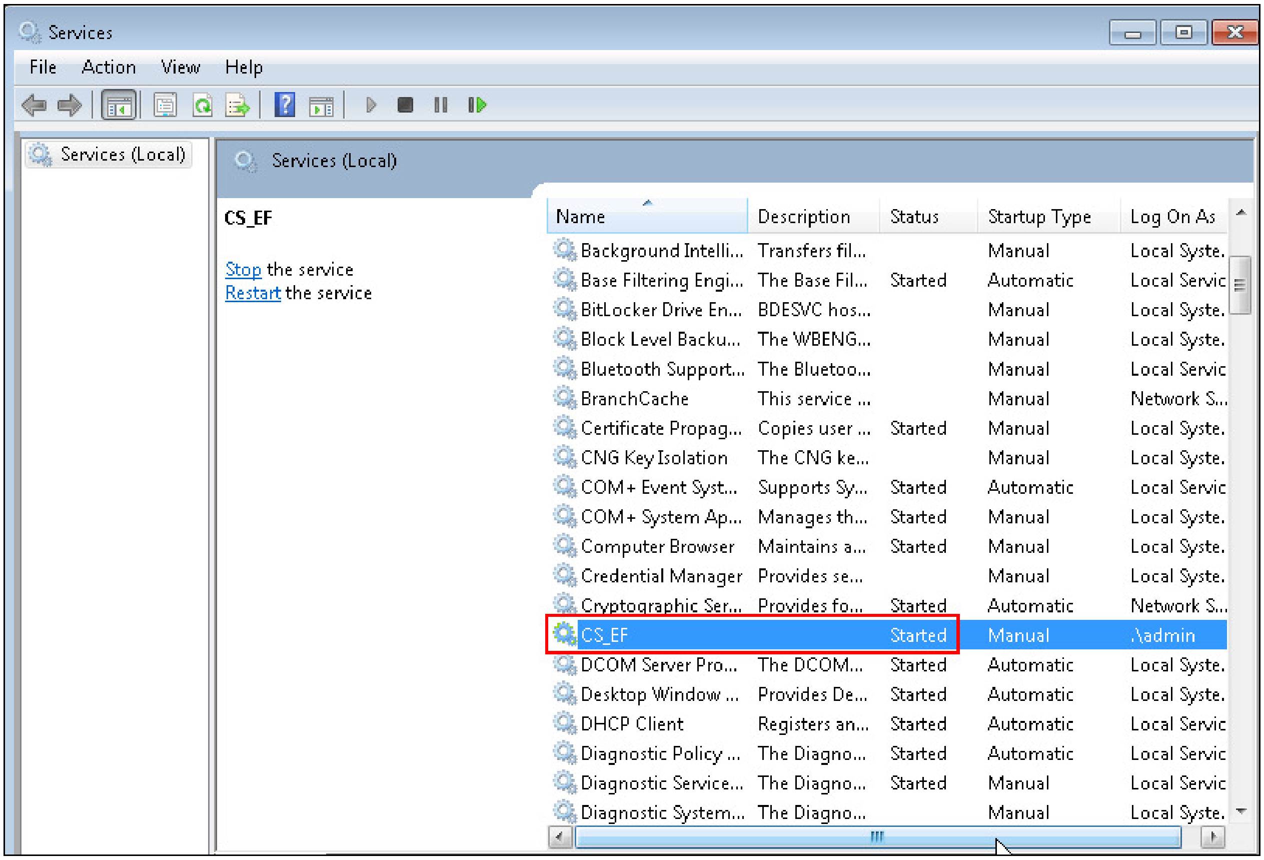
At this stage the agent can use the intuitive Toolbar to perform agent duties and call control as usual.

# 8. Verification Steps

This section provides the tests that can be performed to verify the proper configuration of CallScripter with Proactive Contact. Prior to verification, start an appropriate job on Proactive Contact.

## 8.1. Verify Jobs and Call List Data are polled by CallScripter

Verify the CallScripter Proactive Contact windows service has started; load the Windows Services snap-in and ensure **CS_EF** has a status of **Started**.

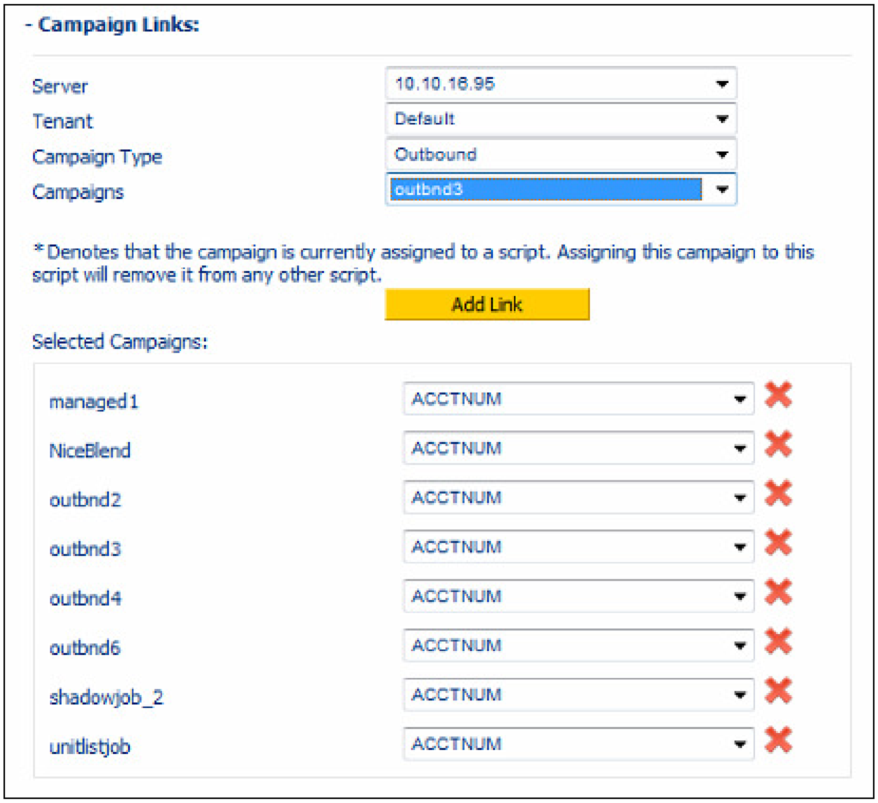


| Name | Description | Status | Startup Type | Log On As |
|---|---|---|---|---|
| Background Intelli... | Transfers fil... | | Manual | Local Syste. |
| Base Filtering Engi... | The Base Fil... | Started | Automatic | Local Servic |
| BitLocker Drive En... | BDESVC hos... | | Manual | Local Syste. |
| Block Level Backu... | The WBENG... | | Manual | Local Syste. |
| Bluetooth Support... | The Bluetoo... | | Manual | Local Servic |
| BranchCache | This service ... | | Manual | Network S... |
| Certificate Propag... | Copies user ... | Started | Manual | Local Syste. |
| CNG Key Isolation | The CNG ke... | | Manual | Local Syste. |
| COM+ Event Syst... | Supports Sy... | Started | Automatic | Local Servic |
| COM+ System Ap... | Manages th... | Started | Manual | Local Syste. |
| Computer Browser | Maintains a... | Started | Manual | Local Syste. |
| Credential Manager | Provides se... | | Manual | Local Syste. |
| Cryptographic Ser... | Provides fo... | Started | Automatic | Network S... |
| CS_EF | | Started | Manual | .\admin |
| DCOM Server Pro... | The DCOM... | Started | Automatic | Local Syste. |
| Desktop Window ... | Provides De... | Started | Automatic | Local Syste. |
| DHCP Client | Registers an... | Started | Automatic | Local Servic |
| Diagnostic Policy ... | The Diagno... | Started | Automatic | Local Servic |
| Diagnostic Service... | The Diagno... | Started | Manual | Local Servic |
| Diagnostic System... | The Diagno... | | Manual | Local Syste. |

The Service will begin to poll the Avaya servers for active jobs, fields and outcomes. To verify that this service is working correctly the windows service log file can be analyzed for activity. Navigate to the pre-configured logs directory and open the latest .log file, in this case **C:\Program Files\CallScripter\Utilities\EnterpriseFramework\logs\2013\07\03.log**. Verify that the log file displays events pertaining to the successful login to the relevant Proactive Contact **Server**, the **Tenant** selection, the **Active Job** listing and **Datafields** and **outcome codes** for that job.

```
05:00:02.878 - Sourcing campaign data
05:00:05.163 - Initialising Object
05:00:05.403 - Current Server: 10.10.16.95
05:00:05.405 - Current Tenant: Default
05:00:05.407 - LOGGING ON
05:00:06.975 - Active job: outbnd3
05:00:07.280 - 107 Datafields found for: outbnd3
05:00:07.866 - 13 outcome codes found for: outbnd3
05:00:18.165 - Detached from job
05:00:18.168 - Active job: outbnd4
05:00:18.474 - 107 Datafields found for: outbnd4
05:00:19.165 - 13 outcome codes found for: outbnd4
05:00:29.465 - Detached from job
05:00:29.466 - Active job: outbnd6
05:00:29.769 - 107 Datafields found for: outbnd6
05:00:30.065 - 13 outcome codes found for: outbnd6
05:00:40.401 - Detached from job
05:00:40.406 - LOGGING OFF
05:00:40.414 - Logged off Event:
05:00:40.417 - releasing MosServer....
05:00:40.423 - releasing DllConfig....
05:00:40.425 - releasing SerStart....
05:00:40.430 - Initialising Object
05:00:40.722 - LOGGING ON NEW TENANT - Ten01
05:00:42.065 - LOGGING OFF
05:00:42.070 - Logged off Event:
05:00:42.071 - releasing MosServer....
05:00:42.108 - releasing DllConfig....
05:00:42.144 - releasing SerStart....
```

Once the service has successfully sourced the jobs, the relevant fields will begin to populate these options within CallScripter Editor as demonstrated in **Section 7.2**.



- Campaign Links:

| | |
|---|---|
| Server | 10.10.16.95 |
| Tenant | Default |
| Campaign Type | Outbound |
| Campaigns | outbnd3 |

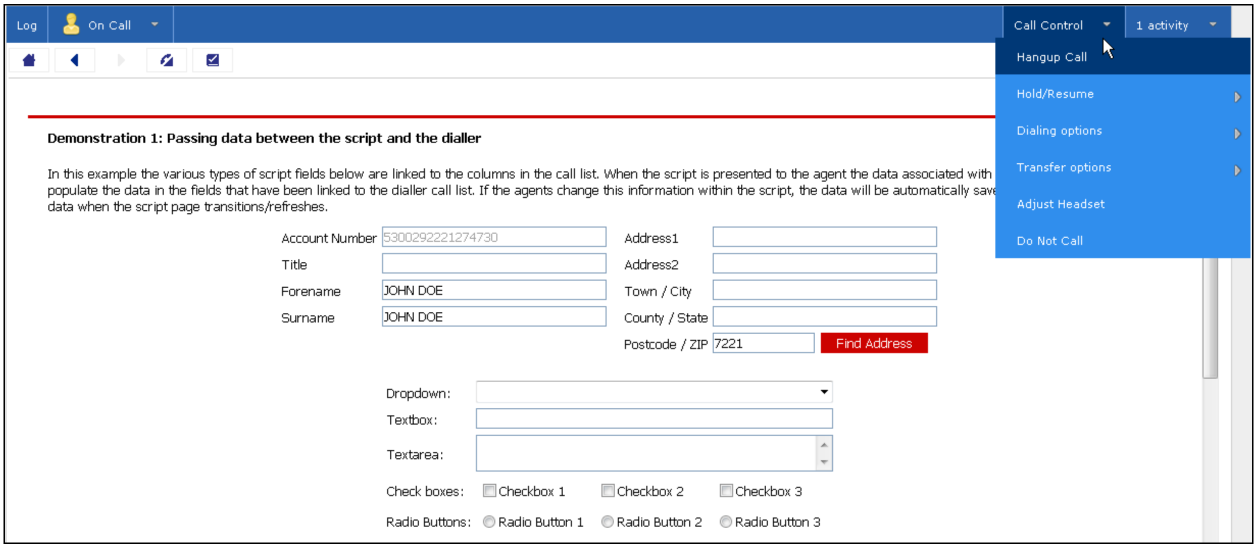
*Denotes that the campaign is currently assigned to a script. Assigning this campaign to this script will remove it from any other script.

Selected Campaigns:

| | |
|---|---|
| managed1 | ACCTNUM |
| NiceBlend | ACCTNUM |
| outbnd2 | ACCTNUM |
| outbnd3 | ACCTNUM |
| outbnd4 | ACCTNUM |
| outbnd6 | ACCTNUM |
| shadowjob_2 | ACCTNUM |
| unitlistjob | ACCTNUM |

## 8.2. Verify Successful CallScripter Agent Operation

Login a Proactive Contact Agent using CallScripter. Verify a list of jobs is presented, join a job and begin servicing calls. Confirm that the correct Script is presented to the agent and is pre-filled with the correct Calling List data. Using the Toolbar verify that the full variety of call control and agent state options are available and operate as expected.



**Demonstration 1: Passing data between the script and the dialler**

In this example the various types of script fields below are linked to the columns in the call list. When the script is presented to the agent the data associated with populate the data in the fields that have been linked to the dialler call list. If the agents change this information within the script, the data will be automatically save data when the script page transitions/refreshes.

|  |  |  |  |
|---|---|---|---|
| Account Number | 5300292221274730 | Address1 |  |
| Title |  | Address2 |  |
| Forename | JOHN DOE | Town / City |  |
| Surname | JOHN DOE | County / State |  |
|  |  | Postcode / ZIP | 7221 |

Dropdown:
Textbox:
Textarea:
Check boxes: □ Checkbox 1 □ Checkbox 2 □ Checkbox 3
Radio Buttons: ○ Radio Button 1 ○ Radio Button 2 ○ Radio Button 3

## 8.3. Verify Avaya Aura® Communication Manager Trunk Status

The following steps can ensure that signaling group and trunk groups configured between Communication Manager and PG230 Digital Switch are in-service. From the Communication Manager SAT enter the command **status signaling-group 7** to verify that the signaling group for the 001v8 DS1 board is **in-service**.

```
status signaling-group 7
                         STATUS SIGNALING GROUP

        Group ID: 7                                  Active NCA-TSC Count: 0
      Group Type: isdn-pri                            Active CA-TSC Count: 0
  Signaling Type: facility associated signaling
     Group State: in-service


                           Primary D-Channel


            Port: 001V816        Level 3 State: in-service


                          Secondary D-Channel


            Port:                Level 3 State: no-link
```

Enter the command **status trunk 7** to verify that the headset trunk group 7 is **in-service** and that the number of **active** channels corresponds to the number of agents logged in.

```
status trunk 7

                             TRUNK GROUP STATUS

Member   Port     Service State      Mtce Connected Ports
                                     Busy

0021/001 001v801  in-service/idle    no
0007/002 001V802  in-service/active  no   S00006
0021/003 001v803  in-service/idle    no
0021/004 001v804  in-service/idle    no
0021/005 001v805  in-service/idle    no
```

## 8.4. Verify Avaya Proactive Contact Job Status

From Proactive Contact shell, type the command **jobmon** to verify agent is logged into the job outbnd4 and handling a call.

```
[STANDARD]                        Job Activity
[ALLID]
                               Summary Statistics
                 Job: [outbnd4][1769]
                 Start time: 12.38.03  Current time: 15.45.26
  Agent Activity                       Line Usage
  -----------------------------------  ---------------------------------------
-
             All Outb    ACD      PTP  Outbound Lines          Cur  Avg  Peak
  Logged in:   1    1      0        0   Demand       :           1    0     1
  Assigned :   1    1                   Available    :           9
  On Phone :   1    1                   Total Lines  :          10

  Calling Activities
  ----------------------------------------------------------------------------
  Outbound Phone Calls
    Records Selected:        386
    Phone Calls made:          4
    Cur/Run Hit Rate:         65/1  %
    Agent Connects  :          0
    Queue           :          0
    Recalls         :          2
    Phone Calls Left:        378
[ Job outbnd4 ready for calling                                             ]
```

# 9. Conclusion

These Application Notes describe the configuration steps required for CallScripter to successfully interoperate with Avaya Proactive Contact and Avaya PG230 Digital Switch. All feature test cases were completed successfully with observations noted in **Section 2.2**.

# 10. Additional References

This section references the product documentation relevant to these Application Notes.

1. *Administering Avaya Proactive Contact*, Release 5.1, April 2013, available at http://support.avaya.com.

Please e-mail any questions or comments pertaining to these Application Notes along with the full title name and filename, located in the lower right corner, directly to the Avaya DevConnect Program at devconnect@avaya.com.