I-Tel - Version 10

We are very pleased to announce the first release for Version 10 for the I-Tel dialer.

Version 10 provides a significant number of enhancements and an increase in performance handling. Four major changes have been the introduction of Multi-Tenancy Architecture, the new Scripter 2 engine, Outbound Predictive Blended Campaigns and Blended Transfers.

There are several enhancements to the I-Tel dialer so please review this documentation carefully before installing.

HARDWARE NOTE

With the expanded capabilities provided and the need for protected services, we have reconfigured the hardware set-up for the dialer. We are recommending that two servers be utilized. The main server will be the Campaign Manager Server (Dialer Server) and the second server will be the STG Server. The Campaign Manager server will run on Windows 2003 Server operating system (SP2) and will house everything **except** the Aculab Card(s) and the Recording Service. The second server, the STG server, will also run on Windows 2003 Server operating system (SP2) and will house the Aculab card(s) - two maximum, run STG services (which drives the Aculab cards) and will be a repository for the recordings. Additionally, if needed, a second or third server could be incorporated into the plan to house additional Aculab cards. This new approach greatly enhances the configuration. If one of the STG servers fails, campaigns that were running on the failed server can be moved over to one of the unaffected STG servers.

Another benefit is the increased reliability. The STG server will be a 2U/4U device meaning that each device can hold 2/4 Aculab cards respectively. As long as proper specifications for each machine are followed -- for example, mirrored disks, redundant power supply, etc. the new configuration offers much more reliability.

For current I-Tel clients on V9, please contact us before moving to V10. At a minimum, you will need to upgrade the memory to 2GB-3GB and install Windows 2003 SP2.

SOFTWARE NOTE

For new users, V10 will require Windows 2003 Server operating system (SP2). However, if you are on V9, please contact us so we can discuss your current set up and how we can move you to V10.

ENHANCEMENTS

The changes described in this document relate to the following topics.

- Multi-tenant Architecture

- Scripter 2 Engine

- Outbound Predictive Mixed Campaign

- True Blended INBOUND

- Transfer Call to IVR

- Blended Transfers

- New Softdial Recording Viewer

- Recordings and Archived Recordings – File Locations

- IP options

- Linked Campaigns

- CallGem Call Control enhancements

- CallGem Management and Monitoring features

- Telephony Gateway changes

- Campaign Manager updates

Note - Softdial **CallGem, the predictive dialing engine,** acts as the Central Control Unit enabling control of Inbound and Outbound calls and handling messaging – which has been greatly expanded.

Predominant Features:

- Configuring campaigns (standard and IVR), Hunt Groups (now queues) and their members and recordings by Tenant
- Security – partitioning resources by Tenant

- One tenant cannot access the resources (phones, lines, campaign data or account data) of another tenant
- Secondary resources can also be provisioned by Tenant and Landlord, e.g. agent extensions
- Robust dialer engine allows for multi-tenancy sustainability
- Telephony Resources may be allocated across Tenants
- Hosting is now an option especially since complete partitioning can be accomplished(multi-tenancy)
- Local dialing regulations may be configured by campaign now
- New standards to minimize threats and increase recovery time

MULTI-TENANT ARCHITECTURE (10.1)

Version 9 allowed for a **Single** 'Tenant' platform. Version 10 now allows for a **Multi** 'Tenant' platform. Before Version 10, data flowed between the Dialer Server and its Data Source, a single iSeries. Now the data can flow between multiple Data Sources (multiple iSeries machines) and a single Dialer Server. So, if you have two or more locations/facilities with separate iSeries, they can all utilize the same Dialer Server. Each location could be set up as a 'Tenant'. The Softdial Contact Center enables these Tenants to be set up and allows for each Tenant to act independently. Therefore, campaigns, inbound and outbound call flow, recordings, etc can be partitioned by Tenant. This allows for a complete separation of Tenant traffic. So, the Softdial Contact Center now operates as a Landlord and each Location/Facility would be set up as a Tenant.

SCRIPTER 2 ENGINE (10.2)

A new direction has been taken with V10 regarding scripts. The NEW Scripter 2 Engine is available with Version 10 and it allows you to design and build your own script! The process is a little different but the set-up will allow you to maintain control and create scripts on demand. The Project Designer was developed to assist you in building a script. The script can be changed at any time and redeployed when needed. This set-up provides the greatest flexibility for creating and running scripts. **In Testing.**

OUTBOUND PREDICTIVE MIXED CAMPAIGN (10.1)

A wonderful new distinctive feature is the Outbound Predictive Mixed Campaign. This is a campaign that uses VIRTUAL agents and LIVE agents. It is very beneficial to incorporate this new feature for reducing wait times without over dialing. This could have dramatic effects enabling call volumes to increase very quickly.

An IVR campaign will need to be set up. Set up the number of virtual (IVR) agents you will need for this campaign. After everything is set up you will need to recycle. THEN, after starting the IVR campaign, **have LIVE agents log into the same campaign**….it is that easy. So, if you set up 5 virtual agents for this campaign and have 5 live agents log in, you will have 10 agents working the campaign which could potentially double your call volume for this campaign and reduce the wait times for your LIVE agents.

The reverse is also true. A Standard Predictive campaign will need to be set up. Then, set up IVR agents for the Predictive campaign. You will need to set up IVR agents in the same manner as they are set up for an IVR campaign. The agents are added to the new Mixed Campaign through the Softdial Scheduler. When the Predictive Campaign is launched, the IVR agents are initiated. You will also need to define

each IVR agent in the Softdial SCR2 config.xml.

With either scenario, when the LIVE agent gets a connect, they take the call as usual. When the IVR agent gets a connect, a script is triggered, playing the wav files that were incorporated into the script. Additionally, when there is a connect, the call is routed to a live agent first. If there are no live agents available, the call is then routed to a virtual (IVR) agent, which has the added availability for the called party to speak to a LIVE agent.

Adding an IVR agent does take up a license so please make sure you revisit the number of licenses that have been installed.

TRUE BLENDED INBOUND (10.1)

We now have true call blending!

A NEW layer has been added to the Inbound Call Process. A new campaign called **INBOUND** has been created to allow callers to be routed to members of a Blended Inbound Queue (Hunt Group). This is NOT a system campaign. The agent needs to be logged into a Progressive campaign or a Predictive campaign to be recognized as a member of the Blended Inbound Queue (having already been added through the initial set-up as a member). Initial set up requires INBOUND to be added to the static configuration in the Name Space Editor. Then, when the Softdial Contact Center is started, INBOUND is started. Once set up is completed, a caller will probably be given a designated number. The caller will then be routed to one of the members in the Blended Inbound queue. The agent, if in wait mode, is considered eligible to take the call. The call will then be routed to the agents Outbound Extension! The account will automatically pop up on the agents screen (if there is an ANI match). So, prior to the call getting routed to a standard queue, the call could be routed to a group of agents in predictive or progressive mode first. Then if none of the agents are available, the call would then be routed to a standard queue.

Additionally, a message will be played for the caller when they first enter the inbound call process – this is mandatory. Messages are also allowed for a busy response, when the caller is placed on hold or if a message needs to play at a certain interval. This is set up and handled by the queue in the section called In-Queue Messaging'.

Also, each queue can be given priority. So, if an agent is logged into more than one queue, the queues can be prioritized. This is also found at the queue level and is located in the section called 'Behaviour'.

TRANSFER CALL TO IVR (10.1)

We now have the ability to transfer a caller or called party to an IVR queue/hunt group. This will allow the caller or called party to be routed to an IVR script and then they can give the system their information for payment instead of tying up an agent.

The agent would NEED to identify the correct account and then request a transfer from that account. Instead of transferring to a particular extension, the agent would enter the **IVR Queue** in the extension field. Then mark the transfer as a 'blind' transfer with a "Y" and enter. The call will be transferred to the IVR queue and the party will hear the script play. They can then respond to the script prompts for payment type and entry.
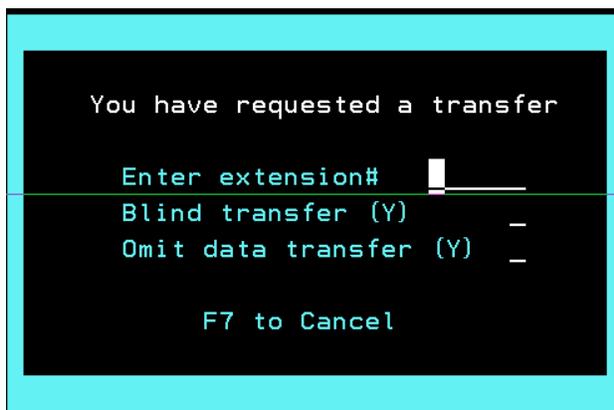
Important - The IVR queue will need to be marked with an 'I' for 'Internal IVR messaging' in intelec to allow for this type of transfer to occur.

BLENDED TRANSFERS (10.2)

Blended Transfers has arrived! This is a critical step forward enabling an agent to work completely using ONE extension. An agent is set up as a BLENDED agent. A Blended Queue (hunt group) is set up for this agent alone. The new blended queue is added to the agent's set-up in Agent Names through their Outbound Extension in Name Space Editor. On the right side under Queue Membership place the new queue in the window. Additionally, in Station Properties the parameter 'Auto-accept transfers initiated by agent' needs to be checked.

The new Queue needs to be set-up in _tenantConfig/default/Campaigns/INBOUND/Queues This queue **MUST** start with '200'. So, for extension 101, the queue 200101 would be added. (This is the NEW queue that is added to the OB extension for the agent) Now, to complete the set-up for the new queue the parameter 'Allow immediate blend or transfer for outbound agents' must be checked.

The new queue needs to be set-up in I-Tel. Create a new Queue with the Group Code 200101. Make sure the Inbound Campaign name is INBOUND (ALL CAPS). Also make sure the parameter 'Hunt group type' is marked with a 'T'. This allows for the transfer to take place.

While the agent is logged into a Predictive campaign AND in wait, they are eligible to receive an Inbound OR TRANSFERRED call through their Outbound extension.

There is an addition to this new feature if agents have a second extension. An OVERFLOW can be set-up to allow a Transferred Call/Inbound call to go to the Predictive BLENDED agent's INBOUND (second) extension while they are IN WRAP. **So, if the Predictive Blended agent is in wrap and therefore not eligible for a call through their outbound extension, the Inbound or Transferred call would be directed to their second extension for retrieval by the agent.**

NEW SOFTDIAL RECORDING VIEWER (10.2)

Softdial Recording Viewer is a new client application that is provided in V10. Recording Viewer allows for recording retrieval and play. If necessary, a search mechanism is also available. Recording Viewer is accessed through the internet on a remote desktop. Remote client installed for managers to access the dialer has been modified. It now includes Recording Viewer and a different look. So, go in to remote client via the internet. Select Softdial Recording viewer.

Accessing remote client via the internet shows the revised screen below.
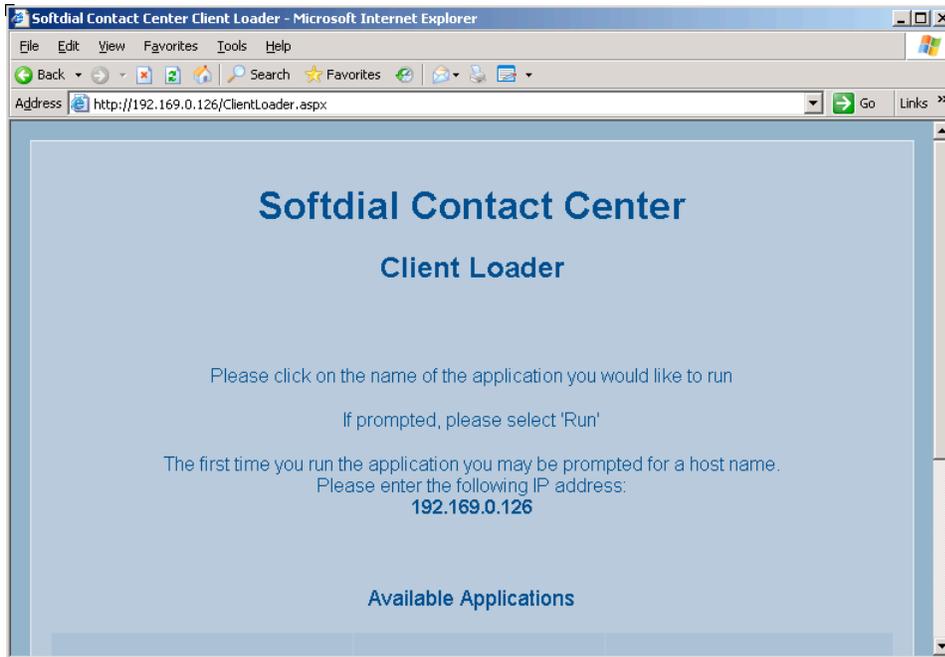
Roll down to the available options:
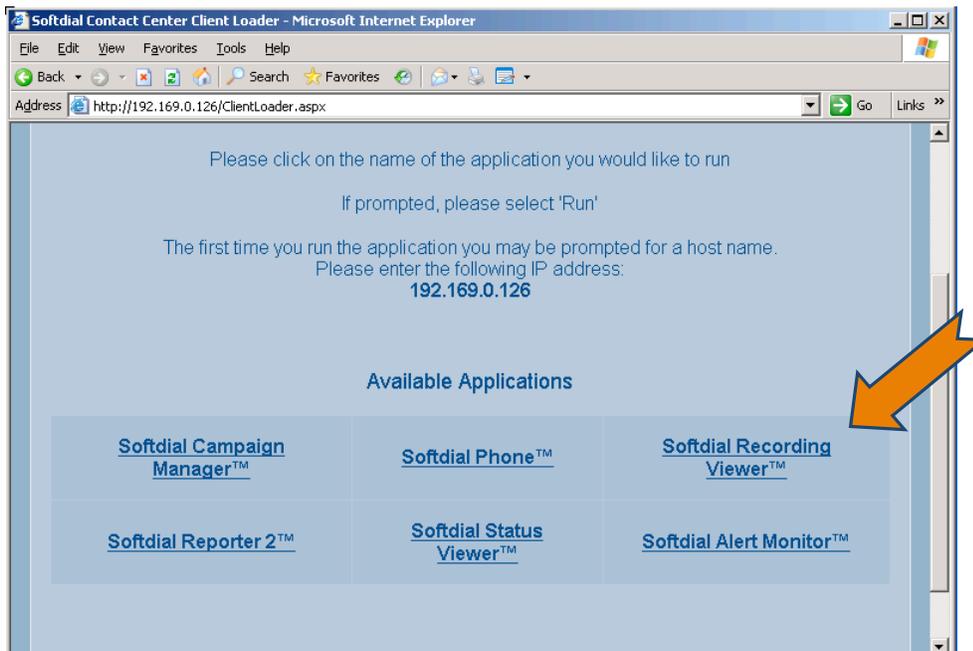
The Viewer loads the campaigns as outlined below on the left hand side. Select the campaign needed.

Move through the different campaigns needed for review. When you open the campaign, you can select a specific date.
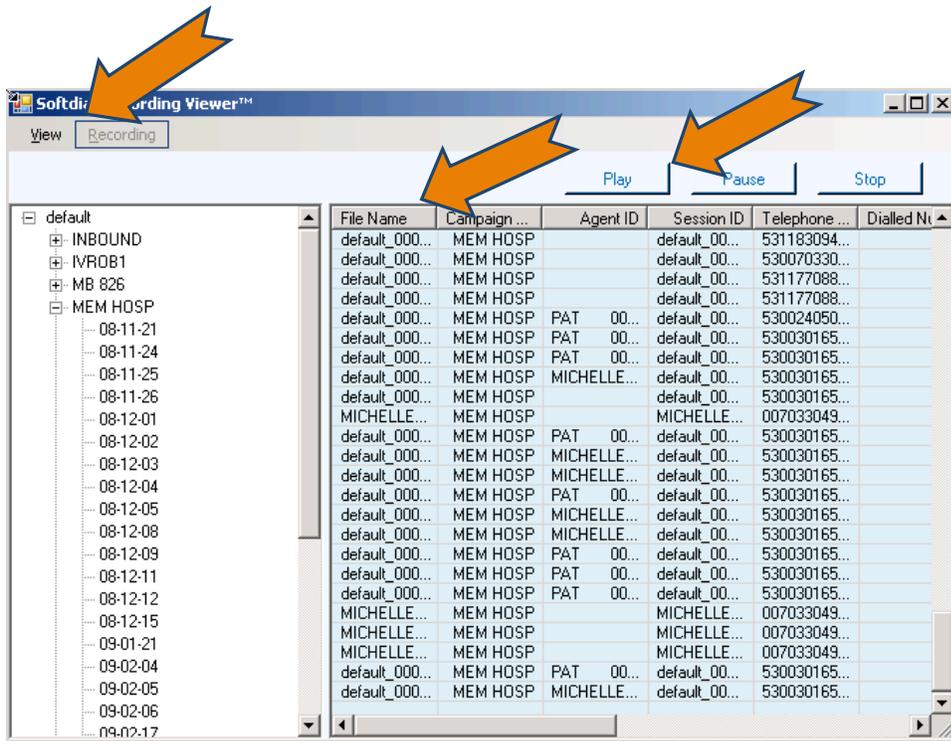
Now select the recording you need by highlighting the file name. Then press the Play button on the top.

Softdial Recording Viewer also includes functionality for searching for specific recordings. Just click on View, then Search Window from the viewer screen. (if it is not highlighted the window is already open)
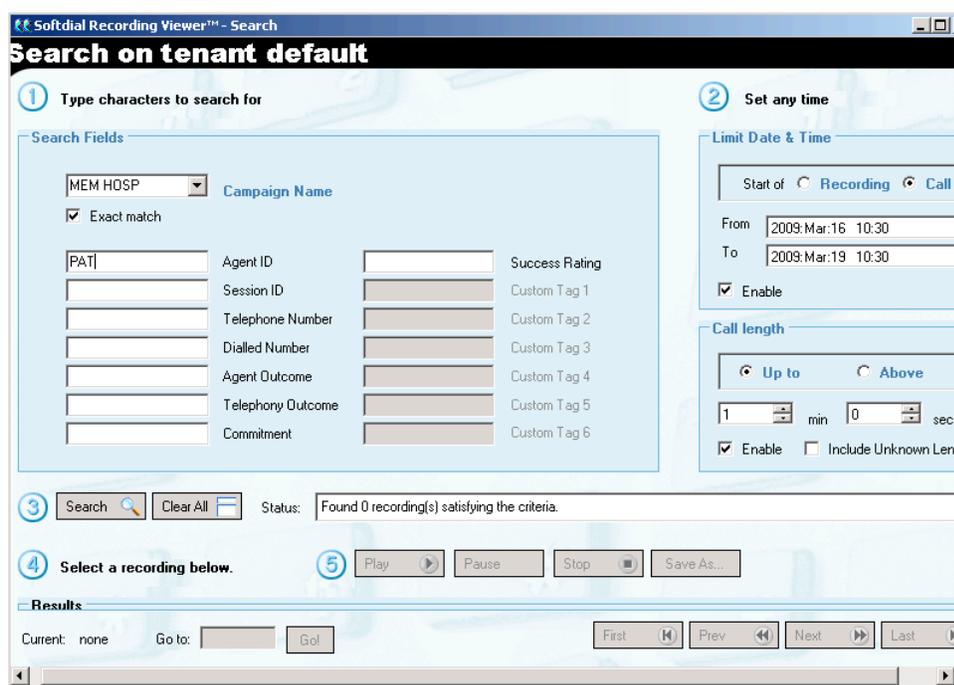
Select the campaign and then select any criteria needed for a specific recording in that campaign. Agent ID, Session ID, telephone number, etc are available. Custom Tags can be used for greater search capability. Please contact us to assist in the set-up regarding custom tags. Below we have selected the campaign 'MEM HOSP' and we want to find all the recordings for PAT from March 16th to March 19th. Click on Search and the results will appear below.
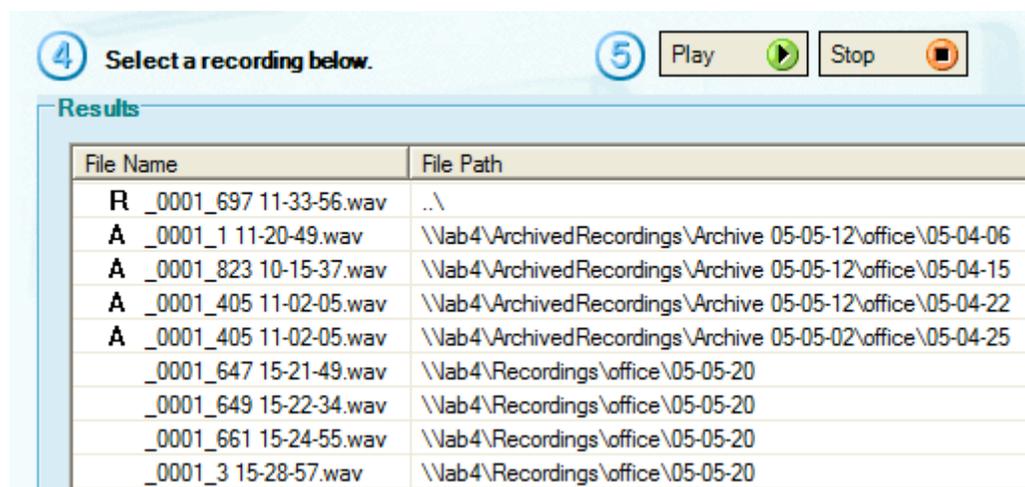
Under the column File Name an R, A, and blank appear. The files that are 'blank' are the current Call Recordings. Any files that have already been Archived show an 'A'. Files that have been removed and or stored somewhere else are designated with an 'R'. The example above shows no File Path for the REMOVED file. This is because the path is not known.

Reminders:

- You can 'Play' and 'Search' at the same time
- Recording viewer auto loads the campaigns and files for easy selection – therefore, the location of the recordings is not a necessary component for play and search
- Custom tags can be set up – please call for assistance
- Searches are case sensitive

RECORDINGS AND ARCHIVED RECORDINGS - FILE LOCATIONS (10.1)

The location of the recording files and archiving files are designated in the Telephony Gateway config.xml file. There are specific tags needed in the telephony Gateway config.xml file that dictate the path for these files. Some tags are not needed if the default setting is acceptable. Once the Telephony Gateway config.xml is updated and services are recycled, the system will write these files to their designated location. So, when the actual recording is completed, the file is written immediately to the designated location.

The path for storing recordings is generally –

Call Recordings (7) → Archived Recordings (60) → external drive (user determined)

The Call Recording files are kept for 7 days unless specified otherwise. The tag for changing this value is 'daysBeforeArchiving'. The default for the number of days a file remains in the Archived folder is 60. This value can also be extended by updating the Telephony Gateway config.xml with the tag 'daysToKeepArchive'.

So, the file is written to Call Recordings. It resides there for 7 days and then is moved to Archived Recordings where is resides for 60 days. Both of these values can be overridden using tags to set the new value. These tags are updated in the config.xml in the STG (Telephony Gateway) folder.

Please let us know how long you need to keep these files. In addition, instead of sending the files to the **C:\ArchivedRecordings** we recommend using an external drive and routing the archived files directly to the external drive. You will need to let us know so we can modify the Telephony Gateway config.xml to reflect this drive change. This will save you a step and probably enable you to keep files longer. Please remember - you will have to check the external drive and determine how often you will need to delete the oldest files.

Storage Required for Call Recordings

Sytel has provided a formula for determining how much storage space will be needed for storing Call Recordings.

<u>Daily</u> storage space required (in MB) = No. of agents * hours per shift * number of shifts *

5.76, based on 80% talk time and 2KB/s compressed data.

So, if you have 50 agents that work 2-8hr shifts, this would require approximately 4.5GB of recording storage each day. (50*8*2*5.76=4608) Or, for 20 agents that work an 8 hour shift would require approximately 1GB of recording storage each day.

Remember, if you need long term storage, you may need to store the oldest recordings on an External Storage device or a DVD. A DVD may be the preferred route since a single-sided DVD can hold up to 4.7GB of data.

IP OPTIONS (OR A MIX OF BOTH) (10.1)

Release 10 has supported the traditional PBX since its inception. V10 now supports IP phones set up through the PBX or set up directly from the dialer. If you attach your IP phones directly to the dialer, all you need to do is connect your IP phone to your Ethernet network. You do not need a phone switch at all. You will need to install and run the Proxy Server on the Campaign Manager Server. The Proxy Server is software that costs about $400. If Session Initiated Protocol (SIP) Trunking is used (instead of a voice T1), an ethernet connection to the Aculab card would be installed, in place of a voice T1 (PRI). Then, standard compression can be used to reduce the bandwidth requirements to allow 192 simultaneous calls on one port of the Aculab card. This gives you an eightfold increase in the capacity of your dialer hardware!

For example, a standard PRI with ISDN allows for 64K per channel. This means 23 simultaneous calls can occur. However, a SIP connection allows for 8K per channel. This means that the SIP connection has 8X more capacity for calls yielding 192 simultaneous calls.

If you opt to use ONLY a SIP connection, we would strongly recommend that you have another safeguard in place. An alternate method of receiving inbound calls in particular would be a good starting point. So, a standard PRI with ISDN to handle inbound calls and a SIP connection to handle all outbound calls would be ideal. If you rely solely on SIP and this connection goes down, there is no way to reroute calls or handle any calls at all. In the past, SIP connections were a little high, sometimes 7 or 8 times the cost of a PRI with ISDN. These costs have started to come down to 3 times the cost of a PRI with ISDN. This may be a viable option for some now that costs have diminished enough to substantiate an investment into SIP which yields 8X the service capability.

LINKED CAMPAIGNS (10.1)

With this new feature you can operate two or more separate iSeries systems that utilize '1' Campaign Manager Server. Version 9 and prior did not support this type of configuration. With Version 10 we can now support data exchange from multiple database sources. In fact, Campaign Manager will now allow campaigns to be 'LINKED'. One of the campaigns needs to be designated as the 'master'. The second campaign is linked to the first campaign. By using the new options available for controlling the start and stop features, these campaigns can be run independently or together. If one of the linked campaigns is started using 'Start', the linked campaign ONLY is started. If one of the linked campaigns is started using 'Start Link', ALL of the linked campaigns for its MASTER are started. While it is not possible to suspend a

linked campaign, it is possible to STOP only that linked campaign.

Also, linked campaigns may only be created for 'Predictive' mode. Once you select the 'master' campaign, you may also select how to 'apportion' or distribute the records from the linked campaigns. Presently, two options are available. The first is by remaining records in the list and the second is by assigning ratios. While ratios may be changed while the campaign is running, it does not perform based on past occurrences. Additionally, if ratios are used, all of the linked campaigns need to be set up 'based on ratio'.

CALLGEM CALL CONTROL ENHANCEMENTS

Inbound Call handling captures the CLI (Caller Line Identity) and the DNIS (Dialed Number Identification Service). CallGem reads the CLI from right to left and the DNIS from left to right. For routing the call, the system then sends the call to the Hunt Group (new terminology for V10 is Queue). For distribution, the call can be sent to an agent based on Sequence in a Hunt Group or through the Round Robin feature. Two new methods are available - Circular and Longest Wait. **In Testing.**

Monitoring and Coaching functions for Call Participation have been improved. A second person can be on the same call with another agent and the called party. Usually this is a supervisor/manager overseeing the progress of a call. The supervisor can dial into the call. The supervisor can 'coach' the agent by speaking directly to the agent and the called party cannot hear the supervisor. Or, the supervisor can intercede and take over the call talking directly to the called party. **In Testing.**

CALLGEM MANAGEMENT AND MONITORING FEATURES (10.1)

Critical Event Messaging - Monitoring critical events. Real-time system messages can be delivered to the iSeries machine. For example, if a trunk goes out of service, a message (flag) can be sent to an ID like QSYSOPR warning the operator of the event.

Real time trunk monitoring – a new utility has been created to allow for hands on monitoring and/or troubleshooting. This new feature allows operators to quickly identify trunk and channel problems.

You can access the trunk monitor by going to the TRM folder in Softdial and double clicking the .exe. The screen shot below is an example of a facility with 4 T1's in service. Each row is matched to the PSTN/PBX set up in the STG config.xml. Move your cursor to rest on the description or the individual channel and a window will appear showing information regarding the PBX connection, PRI or Channel.
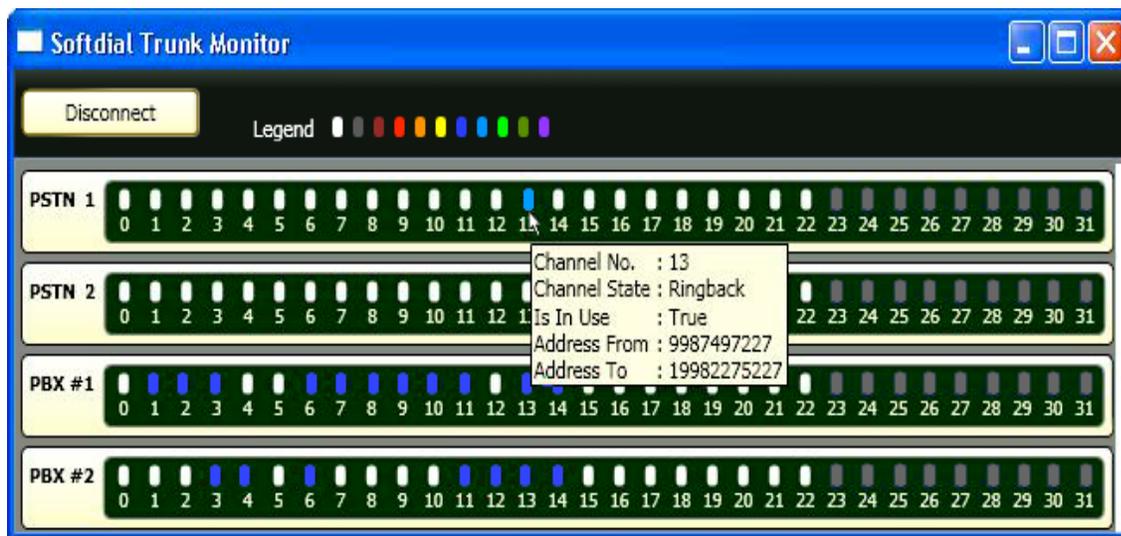
TELEPHONY GATEWAY CHANGES (10.1)

Answer Machine Detection has been greatly enhanced. The system now waits for the answering machine to complete the machine recorded message and then allows the calling message to play. This reduces greatly the chances for a calling message to play over the machine recorded message. This feature is known as 'beep detection'. Although AMD is not 100% accurate this has greatly enhanced our accuracy.

Aculab Prosody X boards - These new cards have twice the capacity with a nominal cost increase. In fact, it comes out to less than a third of the original price. These boards can hold up to eight ports for telephony connections (up from four on the older versions) and supports IP telephony technology, allowing you to run dialer campaigns completely separate from your phone switch. This new card also allows you to use SIP Trunking which may greatly reduce the cost of the connection to the PSTN.

CAMPAIGN MANAGER UPDATES

Database Support – When there is an issue with Campaign Manager, a notification can be sent to one or more Campaign Manager Servers and one or more STG Servers.

We have had the ability to control the 'outbound CLI' by campaign. It is now available by 'call'. **In Testing.**

Interactive features **now** available for ACTIVE campaigns –

- The ability to change the Call Progress analysis WHILE the campaign is running. See the Telephony Setup tab through Campaign Manager.

- The ability to add add/remove the Abandon Message and Machine Message wavs WHILE the campaign is running. See the Telephony Setup tab through Campaign Manager.
- The ability to adjust the CACHE size WHILE the campaign is running.
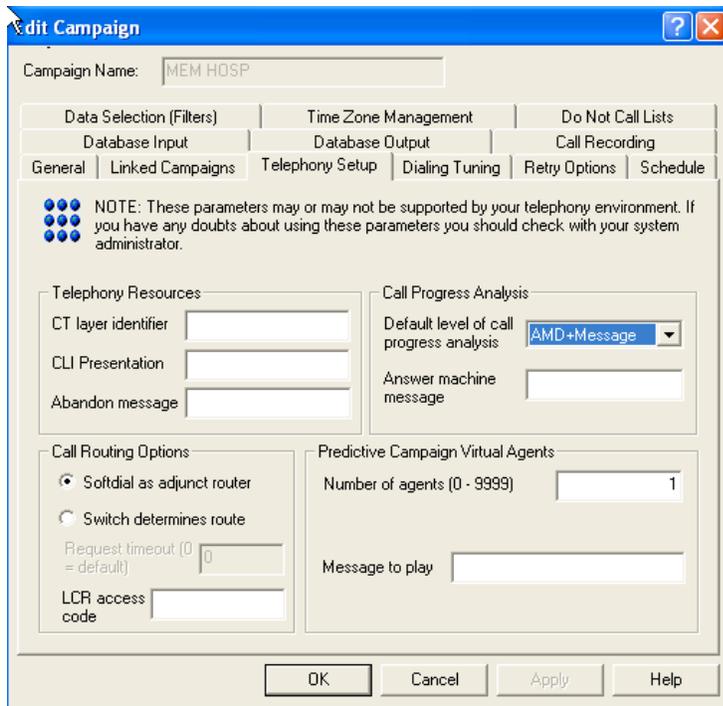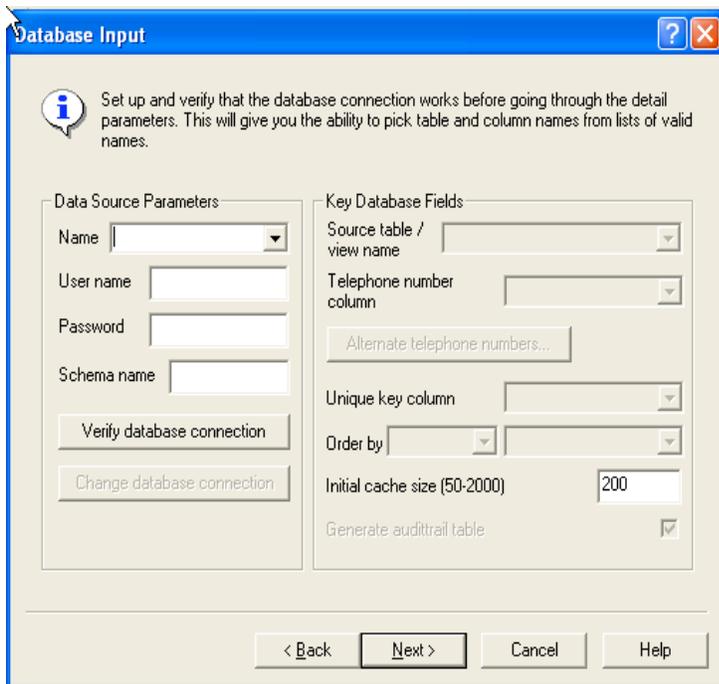
HELP NOTE -

The **Knowledge Base** on our website is continually updated. There is a lot of information pertaining to the I-Tel dialer. So, please remember to check this resource as well.

- In the bottom right hand corner, there is an icon that signifies the Softdial Contact Center. Right click on this icon and then select 'Help'. This will give additional information for select areas regarding the Softdial Contact Center sections.