



MERLIN LEGEND®

Communications System

Calling Group Supervisor and Service Observer User Guide

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Current Settings	Inside back cover
Use this page to keep track of the current settings for your calling group.	



Security Alert

Your Responsibility for Your System's Security

Toll fraud, the unauthorized use of your telecommunications system by an unauthorized party (for example, persons other than your company's employees, agents, subcontractors, or persons working on your company's behalf) can result in substantial additional charges for your telecommunications services. You are responsible for the security of your system. There may be a risk of toll fraud associated with your telecommunications system. Your system administrator should read all installation, instruction, and system administration documents provided with this product to fully understand the features that can introduce the risk of toll fraud and the steps that can be taken to reduce that risk. Lucent Technologies does not warrant that this product is immune from or will prevent unauthorized use of common-carrier telecommunication services or facilities accessed through or connected to it. Lucent Technologies will not be responsible for any charges that result from such unauthorized use.

About This Guide

This guide helps you achieve the most from your system by presenting the following:

- Those feature and settings for calling groups. Use this book in conjunction with your Direct-Line Console (DLC) operator's guide. Agents have a guide for their telephones. To help with their activities, see Agent-Related Activities, pp 18–19.
- For Release 6.1 and later systems, how to use the Service Observing feature. Use this book in conjunction with your MLX display or non-display user's guide or MLX Direct-Line Console operator's guide. Service Observing is frequently used by calling group supervisors to observe agent calls, however, extensions included in a service group are not required to be members of a calling group.

Understanding Calling Groups

A calling group is a team of people who handle the same kind of calls, such as a telephone sales team or customer service department; they are assigned a single extension number.

Calling Group Calls

Calling group calls arrive on **SA** or **ICOM** buttons on members' telephones. They may be outside calls, inside calls, or transferred calls. Inside callers reach the calling group by dialing an extension number for the whole group. Outside callers dial a published telephone number that bypasses the system operator and connects directly to an available *agent* (calling group member).

Call Queues

Incoming calls wait in line (a *queue*) where the system tracks the number of calls, the order in which they arrive, and the time callers have waited. The system manager can limit the number of calls allowed in the queue so that subsequent callers hear a busy signal.

When calls come in on a DID, dial-in TIE, or PRI dial plan routing trunk, a determination is made as to whether the call is being routed to a Direct Group Calling (DGC) group. If so, the system checks to see whether the number of calls in queue for that DGC group is less than the limit that has been set for that queue. If the number of calls meets or exceeds the limit, a busy tone is given.

Callers waiting in the queue hear either Music On Hold or ringing. Some systems also play a recording for waiting callers. Your system manager can set up the recording so that callers can respond to it by dialing #, which directs the call to the calling group *overflow receiver* (for example, an operator or voice messaging system). Your system manager can set up as many as ten primary delay announcement devices per group. After a programmed interval, callers can also hear a secondary delay announcement, which can repeat.

Calling Group Supervisors & Agents

Generally, a calling group supervisor is responsible for one or more teams of agents who handle specific types of calls. Responsibilities include: monitoring agent call handling, making sure the number of agents is sufficient to handle the volume of calls, and assuring that any calls the group cannot handle (called *overflow calls*) are properly re-directed.

Understanding Calling Groups

Settings

Through system programming, your system manager programs system settings to best meet the needs of your calling group. This book explains these settings (see **Calling Group Settings**, pp. 10–12) to help you troubleshoot problems and to assist you with suggestions for improving group performance. Settings determine:

- How calls are distributed to agents
- The telephone that will receive messages for the group
- As many as ten extensions per group where devices play a recorded message (primary announcement) for callers who are waiting in a call queue
- One extension per calling group for a device that will play a second recorded message (secondary announcement) for callers who are still waiting in a call queue
- The time that elapses between the primary and secondary recordings and repetitions of the secondary announcement
- The telephone that will receive messages for the group
- The calling group or QCC queue to receive overflow calls and whether callers can dial # to direct their calls to this receiver
- The maximum number of calls that can be waiting in the queue before being sent to the overflow receiver and/or before subsequent callers hear the busy signal
- The amount of time a call can remain in the queue before being sent to the overflow receiver
- Whether extensions will be automatically signed in after a power failure
- The number of calls that can be waiting in the queue before one to three levels of alarms are activated

Features & Buttons

Line buttons programmed with calling group features (see p. 14) can make both your and your agents' work easier, although agents may have single-line phones, which do not have programmable buttons. Features can also be used by entering feature codes (on any telephone) or by selecting them from the display (MLX display telephones only).

Monitoring agent status requires either DSS buttons or programmed inside **Auto Dial** buttons called **Agent** buttons.

Rings

Rings

-  1 long ring
-  2 rings
-  3 rings

Meaning

- Inside call or inside transferred call
- Outside call
- Outside transferred call

Understanding Calling Groups

Calling Group Button Lights

Light	Button/Meaning
Calls-in-Queue Alarm Button (DSS)*	
<input type="checkbox"/> Off	Calls waiting are fewer than programmed Threshold 1 maximum.
<input checked="" type="checkbox"/> Flash	Calls waiting are at or above programmed Threshold 1 maximum.
<input checked="" type="checkbox"/> Steady	Calls waiting are at or above programmed Threshold 3 maximum.
Calls-in-Queue Alarm Button (programmed on telephone)*	
<input type="checkbox"/> Off	Calls waiting are fewer than programmed Threshold 1 maximum.
<input checked="" type="checkbox"/> Flash	Calls waiting are at or above programmed Threshold 1 maximum.
<input checked="" type="checkbox"/> Wink	Calls waiting are at or above programmed Threshold 2 maximum.
<input checked="" type="checkbox"/> Steady	Calls waiting are at or above programmed Threshold 3 maximum.

* A DSS button used as a Calls-in-Queue Alarm button only indicates two alarm threshold levels instead of the three that a programmed Calls-In-Queue Alarm button on a telephone can display.

† In supervisor mode, the alarm status light is red. In normal mode, it is green.

Agent Auto Dial Buttons (no DSS Supervisor Mode)

<input checked="" type="checkbox"/> Green steady on	Agent is available.
<input type="checkbox"/> Green off	Agent is unavailable.
<input checked="" type="checkbox"/> Red steady on	Agent is busy on a call.
<input type="checkbox"/> Red off	Agent is not busy on a call.

DSS Buttons Supervisor Mode

<input checked="" type="checkbox"/> Steady on	Agent is available.
<input type="checkbox"/> Off	Agent is unavailable.

Normal Calling Mode

<input checked="" type="checkbox"/> Steady on	Agent is busy on a call.
<input type="checkbox"/> Off	Agent is not busy on a call.

Telephones

	Line Buttons
Supervisor	MLX display telephones:
	MLX-20L® telephone (1–2 DSSs optional) 20
	MLX-28D® telephone (1–2 DSSs optional) 28
	Analog multiline telephones:
	MERLIN II System Display Console with built-in DSS 34
	BIS-34D 34
	BIS-22 or BIS-22D 22
Agents	Any system phone: MLX, analog multiline, or single-line

Calling Group Maximums

Calling groups	32
Telephones	20 per group
Total agents & supervisors	200 in system
Total supervisors	8
Number of groups a line rings directly into	1
Groups per agent	1
Groups per supervisor	1 or more
Message-waiting receivers	1 per group*
Primary delay announcement devices	10 per group*
Secondary delay announcement devices	1 per group*
Calls waiting before alarm	1–99
Calls in queue alert	1 per group
Maximum calls in queue	108
Maximum calls in queue before subsequent callers receive busy signal	0–99
Calls waiting before overflow	1–99
Call overflow receivers	1 per group*
Overflow time	0–900 seconds

*Can be shared by groups.

Understanding Service Observing

In Release 6.1 and later systems, Service Observing provides you with the capability of ensuring that your clients are receiving quality service. Service Observing allows a specified MLX telephone user (for example, a customer service supervisor or calling group supervisor) to observe another user's calls. In Release 6.1 and later systems, Service Observing allows an observer with an MLX telephone (display or non-display) to observe calls at extensions within a Service Observing group. Observing means that you, the service observer, can listen only and cannot be heard by either party on the call.

Service Observing Groups

The system manager assigns the Service Observing capability by creating service observing groups through system programming. A service observing group consists of the "service observer" (an MLX telephone user who is allowed to observe other extension) and any number (up to 200) of service observing group members that the service observer is allowed to observe. Extensions included in a service group are not required to be members of a calling group.

Note: Service Observing may be subject to federal, state, or local laws, rules, or regulations or require the consent of one or both of the call parties. You must check in your jurisdiction and comply with all applicable laws, rules, and regulations before using this feature. Failure to comply may result in severe penalties.

To aid in compliance with applicable laws, rules, and regulations, the system manager can activate a warning tone for each Service Observing group. The warning tone is heard four seconds after the service observer successfully begins observing an active call at a group member's extension and each time the call is taken off hold or another party is added to a conference call. The warning tone is heard by both parties on an observed call.

Calls Eligible for Service Observing

You can observe any active call within the Service Observing group if it meets the following guidelines:

- An internal or external call must arrive on an ICOM button, SA button, Personal Line button, Pool button, or Cover button.
- A call can be observed by only one Service Observer at a time.
- No more than two internal parties can be observed on the call.
- Data calls, video calls, Reminder Service calls, page calls, calls received at a voice messaging system port, and fax calls cannot be observed.

Understanding Service Observing

Features & Buttons

The system manager programs a Service Observing button on your telephone using centralized telephone programming. Press this button and dial a service observing group member extension to begin an observing session. When you successfully begin a service observing session, the green light next to the Service Observing button is steady green.

Monitoring service observing group member status requires either DSS button or programmed inside Auto Dial buttons on your MLX telephone. You can also use these buttons to dial a group member's extension when you begin a service observing session.

If you are a calling group supervisor, the calling group's button light operates as shown on page 3 of this guide.

Service Observing Error Tones, Button Lights, and Display

You (Observer) enter	You hear	Service Observing Active?	Green Light Next to Service Observing button	Display
Invalid extension	Reorder	No	Off	None
Own extension	Reorder	No	Off	None
Valid extension already being observed by another observer	Busy	No	Off	None
Valid extension - 3 internal parties already on the call	Confirmation (3 short tones)	Yes	Green steady	None
Valid extension, no active call at observed extension	Confirmation (3 short tones)	Yes	Green steady	None
Valid extension with an active call	Warning tone (if activated) then conversation	Yes	Green steady	Observing xxxx: (the extension number you are observing)

Telephones

Service Observer:

MLX display telephones:	Line buttons
MLX-20L telephone (1-2 DSSs optional)	20
MLX-28D telephone (1-2 DSSs optional)	28
MLX-10®/MLX-10D®	10
MLX-5/MLX-5D	5

Observed Extensions:

Any system phone: MLX, analog multiline or single-line except QCC system operator position

Observing Group Maximums:

Service observing groups	16
Service Observer per group	1
Observed extensions	Up to all extensions (up to 200) in the system

Feature Finder

This table shows where to look for information about performing specific telephone activities. There are many features available besides those described here. See your operator's guide for more information.

If you want to ...	Then
Change the method the system uses to distribute calls to agents.	After reading Hunt Type , p. 11, speak to your system manager.
Provide recorded announcements to callers waiting in a queue for an available agent.	See Delay Announcements , p. 11. Announcement machines can be shared by more than one group.
Change the number of calls or the length of time that calls can wait in the queue before the overflow calls are handled elsewhere.	See Overflow Threshold , p. 12, then speak to your system manager.
Set a maximum number of calls that can be in the calling group queue before subsequent callers hear a busy signal.	See Queue Control , p. 12.
Allow callers who hear a delay announcement to respond by pressing #; they are then sent to the overflow OCC queue or calling group.	See Overflow: Prompted , p. 12, then speak to your system manager.
Be notified by a programmed button that shows increasing severity levels (up to 3, programmed by the system manager) in the number of callers waiting in the queue.	See Calls-in-Queue Alarm Thresholds , p. 10, and Monitoring the Number of Calls in Queue , p. 15.
Be notified when the number of callers waiting in the queue exceeds programmed amounts.	See Monitoring the Number of Calls in Queue , p. 15.
Be notified by a strobe light when the number of callers waiting in the queue exceeds a programmed amount.	See Calls-in-Queue Alert , p. 10, and then speak to your system manager.
Send calls to another group or OCC operator when the limit of waiting calls is reached.	See Overflow Receivers , p. 12.
Allow inside callers to send messages to a group.	See Message-Waiting Receiver , p. 12.
<p>Automatically change an agent's status from Available to Unavailable when he or she doesn't answer in 5 rings.</p> <p>Allow unanswered calls to ring at an agent phone until the caller hangs up.</p> <p>After a power failure, automatically log in equipment such as data workstations or fax machines.</p>	See Auto Login & Auto Logout , p. 10.
See a record of information about group calling totals, types, and more.	Check with your system manager about getting an SMDR Direct Group Calling Information report.
Using call reports, monitor general calling group effectiveness.	See SMDR Reports , p. 17.
Monitor the availability status of an agent.	See Agent-Related Activities , pp. 18–19.
Observe calls	See Observing an Extension , p. 16.

Troubleshooting

Problem	Suggestion
You are using a linear hunt pattern, and the agent who should take most calls is not in.	See your system manager about changing the extension designated to receive calls first. (This is the first extension that was designated as a calling group member.)
Callers are not hearing the delay announcement while waiting in line for an available agent.	To check the device, see Delay Announcements , p. 11. If it is not functioning, see your system manager. If it is working, your system manager may need to check the programming.
Callers are not hearing the secondary announcement or are hearing it after too long a delay.	Ask your system manager to review both the length of the secondary announcement and the time interval before the secondary announcement or between repetitions of it.
You have had a power failure, and agents and/or overflow receivers are not receiving calls.	See Auto Login & Auto Logout , p. 10, and then notify your system manager.
An agent complains that a call in progress has been disconnected.	If the agent has a programmed Available/Unavailable button, he or she may have pressed it during the call. For details about this feature, see Signing In & Out , p. 19.
A telephone rings constantly when the number of calls waiting in the queue is equal to or greater than the number allowed.	A telephone may have been incorrectly programmed as an external alert intended to warn you when too many calls are waiting in the queue. See your system manager to correct this.

Troubleshooting

Callers Waiting Too Long	
Problem	Suggestion
<p>Callers are complaining. You inspect Calls-in Queue Alarm button (MLX display phones only) and decide that there are too many calls waiting in line for an available agent.</p>	<p>If possible, use Available/Unavailable (see Changing Agent Status, p. 19) to make another agent available. Or ask the system manager to activate prompted overflow or to decrease either the overflow threshold number or time so calls can be handled by the overflow receiver</p>
<p>Callers are complaining, and your Calls-in-Queue Alarm button or alert is not informing you.</p>	<p>The system manager needs to decrease the Calls-In-Queue Alarm threshold.</p>
<p><i>You have a QCC overflow receiver, and:</i> Overflow calls do not seem to be going to the QCC overflow receiver, even though the QCC operator is not busy.</p>	<p>An operator may have activated the Position Busy button, which cancels overflow coverage by any QCC.</p>
<p><i>You have a calling group overflow receiver, and:</i> Overflow calls are not being answered by the overflow calling group, even though at least one member is available.</p>	<p>Your overflow receivers may be logged out. If a call rings to an overflow calling group member and goes unanswered for 30 seconds, and if the system is set to Auto Logout, then the calling group member has to log back in before taking calls. See Auto Login & Auto Logout, p. 10, and then notify your system manager.</p>
<p>Too many callers are waiting, and you've tried all the ways to fix the problem.</p>	<p>You need either more agents or more lines into the group. If callers are getting a busy signal, you may need more lines into the group or set the queue control limit higher.</p>
<p>You have prompted overflow active but callers are not hearing the announcement that asks for pound sign (#) entry.</p>	<p>There is probably a shortage of TTRs in the system. Ask your system manager to check that enough TTRs are available to handle your call traffic.</p>

Call Handling

Answering Calls

To take calling group calls, agents must be logged into the calling group (see **Agent-Related Activities**, pp. 18–19).

Calling group calls come in on either **SA** or **ICOM** buttons. They can come in from the outside or be transferred to the group. One long ring indicates a call transferred from inside; two or three rings indicate an outside or outside transferred call (see p. 2).

Agents can answer calls in three ways: by lifting the handset, pressing the **Speaker** button (on phones equipped with such buttons), or using a headset (headset instructions for each type of phone are included in the user and operator guides).

Calling an Agent

From inside the system, people can call agents in two ways:

- By dialing the calling group extension or by pressing a programmed **Group Call** or DSS button to reach the next available agent
- By dialing the individual extension number for a specific agent or pressing an **Agent** or DSS button for the extension

Outside callers dial a published number. Your system manager programs one or more lines to ring directly into the calling group. A line can ring into only one calling group.

To transfer or direct a call to a calling group or specific agent, a person in your company should consult the operator or user guide for his or her console or telephone.

Covering Calls & Having Calls Covered

The *overflow threshold* (see p. 12) determines when too many calls are waiting for a calling group's attention. The *overflow threshold time* determines when a call has been waiting too long for a calling group's attention. When one of the overflow thresholds is reached, calls are sent to an *overflow receiver* (see p. 12), assigned during system programming. This is generally the way overflow calls are covered for calling groups.

Calls can also be covered by a voice mail system if your company has one installed.

However, the system provides several other features for covering calls. For complete information about these features, see your operator's guide. This section simply summarizes a few of them.

Calling groups can also cover calls for *coverage groups* in the company. Such calls wait in the calling group queue and cannot be distinguished from other calls that come in. A calling group can handle calls for up to 30 coverage groups but not for individual co-workers.

The Pickup feature also allows people to answer co-workers' calls. With or without a programmed **Pickup** button, agents can pick up a call ringing at another's extension or ringing on a specific line. If they are assigned to a Pickup group (which is different from a calling group), they can answer any call ringing at another extension in the group, just by using the Group Pickup feature or pressing a programmed **Group Pickup** button. They can also use Pickup to answer the next call waiting in the calling group queue on a specific line by activating the Pickup feature and entering the line number.

Calling Group Settings

Your system manager can program the system to adjust calling group settings. In this section we describe these settings so that you can troubleshoot problems and ask your system manager to make changes when they are necessary.

Auto Login & Auto Logout

Your calling group (and any overflow calling group, if overflow calls are handled by such a group) is programmed for one of the following settings:

- **Auto Logout.** Automatically changes an agent's status from Available to Unavailable when an agent does not answer in five rings. The agent's status is retained after a power failure.
- **Auto Login.** Allows unanswered calls to ring at agent phones until the caller hangs up. This setting is often used for calling groups where agents are fax machines or data stations. Agents are logged in automatically after a power failure.
- **Voice Messaging Systems.** If a voice messaging system is assigned to one of your calling groups, a separate setting is used. If you have a voice messaging system for directing calls or taking messages, all agents (and the voice messaging system) are automatically logged in after a power failure.

Note: The Auto Login and Auto Logout calling group types, used in conjunction with programming of the SMDR feature by your system manager, provide the most detailed information about call-center performance. See **SMDR Reports** on p. 17.

Calls-in-Queue Alert

There are four ways that you can monitor the calls waiting in the queue for the calling group. This section describes an optional method that your system manager must set up. (You can set up some other features yourself; see **Monitoring the Number of Calls in Queue**, p. 15, for additional information.)

This method signals only when the number of calls in the queue has reached or exceeded Threshold 3. An analog multiline telephone equipped with a Supplemental Alert Adapter can be connected to a strobe (called an *external alert*) that goes on when the number of waiting calls reaches or exceeds Calls-in-Queue Alarm Threshold 3.

Only one such external alert can be assigned to a calling group, and it can serve only that group.

Calls-in-Queue Alarm Thresholds

The system manager can set levels, called *Calls-in-Queue Alarm Thresholds*, to indicate increasing severity in callers' wait for calling group agents. A programmed **Calls-in-Queue Alarm** button lets you check whether there are too many callers waiting and determine the degree of the delay. See **Monitoring the Number of Calls in Queue**, p. 15, for more details about checking calls in the queue.

The system manager sets as many as three levels (thresholds) for a number of waiting callers (1–99). When using all 3 levels, Threshold 3 is set for the largest number, Threshold 2 for a middle value, and Threshold 1 for a minimal number. An alarm indicating Threshold 3 is the most serious, while a Threshold 1 alarm is the least serious. **Calling Group Button Lights**, p. 3, shows how a programmed **Calls-in-Queue Alarm** button or calling group extension DSS button lights in response to each level.

Calling Group Settings

Delay Announcements

Each calling group may have up ten delay announcement machines (similar to answering machines) to play recorded *primary delay announcements* for callers who are waiting in the queue for an agent to answer. After an interval, waiting callers may hear another machine play a *secondary delay announcement*, which your system manager can set to repeat. (The primary message does not repeat.)

People hear the announcement(s) one caller at a time, beginning with the person who has waited the longest. If an agent becomes available while an announcement is playing, the recording stops playing so that the caller can reach an agent immediately.

Calling groups can share announcements and devices. Each machine has its own extension number, allowing you to check the announcement. Before re-recording a delay announcement, contact your system manager. He or she may have to adjust programmed settings when the message is changed. Your system manager can also answer any questions about the operation of delay announcement devices.

Hunt Type

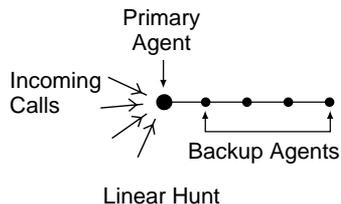
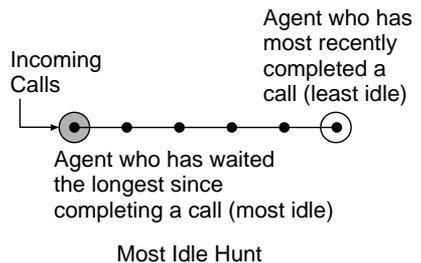
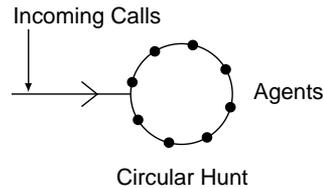
The hunt type programmed for the calling group determines the method used by the system to distribute calls to agents. Note that a calling group providing overflow coverage (see **Overflow Receivers** on p.12) is also assigned a hunt type.

If all group members are equally responsible for call handling, your group may use **Circular Hunt** type. As calls arrive, the system searches for an available calling group member, starting with the extension after the last one that received a call. This method distributes calls evenly over the available agents in the group.

The **Most Idle Hunt** type provides another way of distributing calls when all group members are equally responsible for handling them. Members are eligible to take a new call based on when they last completed or transferred a calling group call rather than when they last received one (Circular Hunt type). This method accounts for the varying lengths of calls that agents may handle.

If it is important to distribute calls to one agent first, your group uses a **Linear Hunt** type. In a linear hunt, a call goes to the first extension assigned to the group through programming (the *primary agent*). When this agent is unavailable, the call is routed to a backup agent. A second incoming call is also routed to the primary agent, and so on.

A voice messaging system may be assigned to the calling group and act as the primary agent or as a backup.



Calling Group Settings

Message-Waiting Receiver

The message-waiting receiver is the extension designated to receive message-waiting indications for the calling group. This includes message-waiting indications sent from the system operator, from a display telephone using the Leave Message feature, or from a fax machine. Any type of telephone with a Message light can be assigned as a message-waiting receiver.

The extension selected as the message-waiting receiver does not have to be a member of the calling group. Each calling group can have only one extension assigned as its message-waiting receiver, but the same extension can be assigned as the message-waiting receiver for more than one calling group.

Message-waiting indications cannot be sent to the extension number assigned to the group unless this option is programmed. The message-waiting receiver cannot distinguish between messages left for the calling group and his or her own messages from other co-workers.

Overflow: Prompted

If your system manager programs prompt-based overflow, callers waiting in queue and listening to a delay announcement can dial # in response to a delay announcement (for example, "Press the pound key to leave a message"). The call then goes to the overflow receiver for the group, which may be the QCC queue or a calling group (including a calling group assigned to a voice mail system).

All three overflow distribution options—based on the number of calls, the time a caller has waited, and according to the caller's prompt—may be used at one time. In this case, time-based and number-of-calls based options (see **Overflow Threshold** on this page) take precedence over overflow distribution based on the caller's prompt. Callers who have waited the longest or whose calls have exceeded the maximum allowed are handled before callers who have responded to the delay announcement.

A caller may be anywhere in the calling group queue when he or she dials # for overflow treatment.

Overflow Receivers

When the number of calls waiting in the calling group queue reaches the *overflow threshold*, or the time that a call is held in queue exceeds the *overflow threshold time* or prompted overflow is active and the caller enters the # sign while listening to the delay announcement, calls are sent to an *overflow receiver*. An overflow receiver can be either another calling group or a Queued Call Console (QCC) queue. A calling group can be assigned to only one overflow receiver. An overflow receiver can provide overflow coverage for more than one calling group. If no overflow receiver is available, the call continues to ring in the queue until it is answered or until the caller hangs up.

Overflow Threshold

The *overflow threshold* is the programmed number of calls (1–99) allowed in the queue before calls are sent to the overflow receiver. The *overflow threshold time* is the maximum amount of time (0–900 sec) that a call can be in the queue before it is sent to the overflow receiver. Setting the time to 0 turns off overflow based on time.

Queue Control

The system manager can control the maximum number of calls allowed in the calling group queue (not the overflow queue). When the number of the calls in queue reaches the programmed maximum, subsequent callers receive a busy signal. Queue control applies only to calls that arrive on certain outside lines (see your system manager for details), to internal calls to the DGC group, to internal calls to a QCC that is covered by the calling group, and to calls that are transferred to the calling group by a voice mail or auto attendant application.

If the queue is at its maximum number and a caller uses the Remote Access feature to reach the calling group, the call is not blocked by queue control. Similarly, queue control does not block a call sent to the group via Coverage (see **Covering Calls & Having Calls Covered**, p. 9) or an outside call to a QCC operator for whom the group is providing backup. Calls that are transferred to the calling group from another extension will return to that extension as an incomplete transfer.

Using Features

Your system includes many features that are detailed in your operator's guide and in the user's guides provided to your agents. This section discusses features specific to calling group agents and supervisors and should be used in conjunction with your operator's guide.

You can either enter a feature by pressing a **Feature** button and then following the steps displayed on your console, or you can program a button with an often-used feature. Details about programming buttons are included on p. 14.

Analog Multiline Consoles

To use features without programmed buttons, you must program a **Feature** button, following the instructions in your operator's guide. When you have programmed a **Feature** button, follow the steps below.

1. Press the programmed **Feature** button.
2. Select the feature code from the list on this page or the one in your operator's guide; then dial it.

MLX Display Consoles

Some features must be entered by using a code, and some features are available from your display. See your operator's guide for details and then follow the steps below.

1. Press the **Feature** button.
2. Select the feature code from the list on this page or the one in your operator's guide; then dial it,
OR
Select the feature from the display. Press the **Home** button at any time to exit.

Feature Codes

Supervisor features

Enter supervisor mode ■	32 + Hold
Exit supervisor mode ■	32 + Drop
Change agent status to Available	762 + extension*
Change agent status to Unavailable	760 + extension*

Agent features

Multiple telephones:

Sign in/Log in (Available)	44
Sign out/Log out (Unavailable)	* 44

Single-line telephones:

Sign in/Log in (Available)	# 44
Sign out/Log out (Unavailable)	#* 44

Call-covering features

Pickup

group	88
extension (inside)	9 + extension number
line (outside)	9 + line number

■ Available only by using feature code.

* Press the DSS button or the **Auto Dial** button for the extension. You cannot dial the extension's digits.

Programming Buttons

Many features of your system can be programmed on unused line buttons for rapid access. Full details are included in your operator's guide. This book covers calling group features that can be or must be programmed on buttons for easy access.

Note: The Service Observing button must be programmed by your system manager using centralized telephone programming.

Analog Multiline Consoles

To program a feature on an unused line button:

1. Label a button for the feature.
2. Slide the T/P switch to **P**.
3. Press the button you labeled.
4. Select the programming code from the list on this page or the one in your operator's guide; then dial it.
5. Repeat Steps 1, 3, and 4 to program other buttons.
6. Slide the T/P switch to center.

MLX Display Consoles

You can program buttons from the display, or you can use programming codes.

To program a feature on an unused line button:

1. Label a button for the feature.
2. Press the **Menu** button and select *Ext Program [Prog]*; then select *Start*, **OR** Press the **Feature** button and dial **00**.
3. Press the button you labeled.
4. Select *ListFeature [Lisf]* and search for the feature name using *FindFeature [Find]*. Then select the feature, and select *Enter* to finish programming this feature, **OR** Select the programming code from the list on this page or the one in your operator's guide; then dial it.
5. Repeat Steps 1, 3, and 4 to program other buttons. When you are finished, do one of the following:
 - Press the **Home** button to exit.
 - Press the **Feature** button and dial ***00**.

Programming Codes

Supervisor console buttons

Agent buttons ♦	* 22 + agent's extension number
Change agent status to Available	* 762
Change agent status to Unavailable	* 760

Agent telephone buttons

Sign in/Log in and Sign out/Log out	* 44
-------------------------------------	------

Supervisor or agent buttons

Calls-In-Queue Alarm button ♦	* 22 + calling group extension number
Pickup	
general	* 9
group	* 88
extension (inside)	* 9 + extension number
line (outside)	* 9 + line number
Coverage Inside On	* 48
Coverage Inside Off	* * 48
Coverage off ♦	* 49
Coverage VMS (voice mail) off ♦	* 46

♦ Must be programmed onto a line button.

General Activities

Supervisor Mode

Your console can operate in supervisor mode or in the normal call-handling mode described in your operator's guide.

In supervisor mode, you can see agent status (Available or Unavailable) by checking the lights next to programmed **Agent** or DSS buttons (see p. 18).

You can use programmed **Available** and **Unavailable** buttons to change the status of agent phones (see p. 19).

In normal mode, the lights next to an **Agent** button indicate whether the phone is being used. You cannot change agent status.

Should your system lose power, the system automatically returns your telephone to the mode setting at the time of the failure.

MLX Display Consoles

To enter or exit supervisor mode:

1. Press the **Feature** button and dial **32**.
2. Press the **Hold** button to enter supervisor mode,
OR
Press the **Drop** button to exit supervisor mode.

The display shows *Entered GrpCI/CMS Supvr* or *Exited GrpCI/CMS Supvr*.

Analog Multiline Consoles

1. Press the programmed **Feature** button and dial **32**.
2. Press the **Hold** button to enter supervisor mode,
OR
Press the **Drop** button to exit supervisor mode.

Monitoring the Number of Calls in Queue

To assure that calls are being handled efficiently and determine whether additional agents or lines are needed, you can monitor the calls waiting in queue.

To find out how many calls are waiting, inspect the number of calls in the queue (MLX display telephones only). Press the **Inspect** button, then the programmed **Calls-in-Queue Alarm** button labeled with the name of the calling group. The Inspect screen on your display shows the number of calls currently in the queue.

If your calling group is Auto Login or Auto Logout type, you can assess call-center performance using **SMDR reports** (see p. 17). When your system manager programs the SMDR feature for Talk time operation, you can find out how much time agents spend talking to callers, how long callers wait, and which callers have abandoned their calls while waiting.

If your system manager programs one or more alarm thresholds, you can also use a telephone button light, DSS light, or external strobe to signal levels of severity in the number of callers waiting in queue. (See **Calling Group Button Lights** on p. 3 to see how button lights signal and **Calls-in-Queue Alarm Thresholds** on p. 10 to understand the levels of severity.) The three methods vary and are listed from most to least precise.

- **Calls-in-Queue Alarm Button on Telephone.** Use this method when the system manager has programmed three alarm thresholds. Monitor the green light next to a programmed **Calls-in-Queue Alarm** button (an inside Auto Dial button programmed with the extension for the calling group and labeled with the group name). The light flashes, winks, or lights steadily according to alarm Thresholds 1, 2, and 3.
- **Calls-in-Queue Alarm Button on DSS.** Use this method when the system manager has programmed only two alarm thresholds. Monitor the red light next to a DSS button for the calling group. The lower and higher light flashes or lights steadily according to alarm thresholds.
- **Calls-in-Queue Alert.** External alerts for DGC groups are supplied by external alert devices connected to either a Supplemental Alert Adapter (SAA) for analog telephones or a Multi-Function Module (MFM) in External Alert mode for MLX telephones. These devices are activated when alarm Threshold 3 has been reached or exceeded. Since the tone is continuous, only lamp type external alert devices are recommended.

General Activities

Observing an Extension

Your system manager assigns a Service Observing button to your MLX telephone using centralized telephone programming. If you want to remove or reprogram this button, speak with your system manager.

To begin a service observing session:

1. Press the Service Observing button on your MLX telephone.

The green light next to the Service Observing button begins to flash and if you have a display telephone, the display prompts you to enter an extension number.

2. Dial the extension number for the group member you want to observe by using the dial pad, Inside Auto Dial button or DSS button. If you dialed an invalid extension, you hear a reorder tone; if the extension is already being observed by another Service Observer, you hear a busy tone.

When you successfully begin an observing session, the green light next to the Service Observing button is steady green and you hear one of the following:

- If the observed extension has no active call, you hear a confirmation tone (3 short beeps). As soon as the observed extension makes or receives a call, your Speakerphone automatically goes on and you hear the warning tone (if programmed) and then the conversation.
- If the observed extension has an active call that includes 3 internal parties, you hear a confirmation tone (3 short beeps). As soon as the observed extension puts the call on hold then picks it up, or makes or receives another call, your Speakerphone automatically goes on and you hear the warning tone (if programmed) and then the conversation.
- If the observed extension has an active call, you hear the warning tone (if programmed) and then the conversation.

You are removed from the call, but the observing session is still active if the call is disconnected, the call is transferred to another extension, the number of extensions included in the call (excluding yourself) is more than two, you hang up, you make or receive a call. As soon as the observed extension puts the call on hold then picks it up, or makes or receives another call, your Speakerphone automatically goes on and you hear the warning tone (if programmed) and then the conversation.

To end an observing session:

1. Hang up (put your receiver on hook or turn off your Speakerphone).
2. Press the programmed Service Observing button.

The green light next to the Service Observing button goes off.

General Activities

SMDR Reports

In Release 4.2 and later systems, your system manager can program the SMDR (Station Messaging Detail Recording) feature and set up a printer to provide useful reports about calls made to Auto Login and Auto Logout calling groups, helping you assess call-center performance. This topic provides only a summary of the most helpful SMDR report features. If you need more details, contact your system manager.

The following fields are especially revealing as you read SMDR reports about incoming calls:

- **CALLED NUMBER (Column 4).** If your system and calling group lines provide the telephone numbers of callers, this field reports them for each applicable incoming call. Refer to this field if you need to return calls from people who hung up while waiting for calling group attention.
- **STN. (Column 8).** If the STN. field is blank, the caller disconnected while the call waited in the calling group queue. If the call was handled by an agent, this column shows the extension number of the group member who answered the call. If the calling party disconnected (see **CALL TAG** below) before an agent answered, the column shows either the extension number of the last delay announcement unit that handled the call or the calling group member extension number where the call was alerting when the caller hung up. If the call was transferred to the calling group and not handled by a group member or announcement device, Column 8 includes the extension number of the person who transferred the call.
- **DUR. (Column 6) and TALK (Column 10).** These fields show how long the call was in the system (DUR.) and how long an agent or overflow Auto Login or Auto Logout calling group member spent talking with the caller, including any time that elapsed while an agent transferred or parked the call (TALK). To find out how long the caller waited, subtract the TALK time from the DUR. time. If the caller disconnected before a calling group agent answered, an elapsed TALK time of zero (00:00) is reported, even if the call was answered elsewhere in the system.

When a call was not handled normally by a calling group agent or the caller's number was very long, the **CALL TAG** field provides the following information through the use of symbols:

- An **asterisk (*)** means that the caller hung up before talking to a group member. For example, an asterisk (*) appears in the field when the caller hung up while waiting in the calling group or overflow queue.
- A **question mark (?)** appears when the reported telephone number for an incoming call was more than 15 digits in length.
- An **ampersand (&)** appears if the call was answered by an overflow Auto Login or Auto Logout calling group (overflow call). An elapsed time greater than zero (00:00) appears in the TALK field.
- An **exclamation point (!)** and a TALK field time greater than zero (00:00) are recorded in either of these two cases:
 - The call was answered by the QCC overflow receiver.
 - The call was initially answered by someone not in the calling group and then transferred to a group member who took the call.

An **exclamation point (!)** and a TALK duration of zero (00:00) are recorded when the call was picked up by someone other than a group member or overflow receiver.

Agent-Related Activities

To monitor agent status, use your DSS (Direct Station Selector) buttons if they are available at your console. If you do not have a DSS, use programmed **Auto Dial** buttons called **Agent** buttons. To monitor agent status, you must be in supervisor mode (see p. 15). Auto Logout, if programmed, changes agents' status to Unavailable after five rings (see p. 10 for more information) and logs them out automatically after a power failure. To take calls again, agents must sign in.

A calling group agent using a headset must press the **Headset Hang Up** button to complete a call in order to update the supervisor's **Agent** button.

Monitoring Agent Status with Agent Auto Dial Buttons

You can monitor agents' ability to take calls by looking at programmed **Agent** buttons, which are inside **Auto Dial** buttons. Agents sign in or out by using programmed **Available/Unavailable** buttons (see p. 14).

*To program an **Agent** button on an analog multiline console:*

1. Label a button with the agent's name.
2. Slide the T/P switch to **P**.
3. Press the button you labeled.
4. Dial ***22** and the agent's extension number.
5. Repeat Steps 1, 3, and 4 to program other buttons.
6. Slide the T/P switch to center.

*To program an **Agent** button on an MLX display console:*

1. Label a button with the agent's name.
2. Press the **Menu** button.
3. Select *Ext Program [Prog]* and *Start*.
4. Select *ListFeature* and *Auto Dial [AutoD]*.
5. Select *Inside [In]*.
6. Dial the agent's extension and select *Enter*.
7. Repeat Steps 1, 4–6 to program additional numbers.
8. Press the **Home** button to exit at any time.

The table below shows the meanings of the lights at programmed **Agent** buttons when you are in supervisor mode (see p. 15).

Light		Meaning
■	Green steady on	Agent is available.
□	Green off	Agent is unavailable.
■	Red steady on	Agent is busy on a call.
□	Red off	Agent is not busy on a call.

Monitoring Agent Status with a DSS

You can monitor agents' ability to take calls by looking at DSS buttons for the agents' extensions when you are in supervisor mode (see p. 15).

The table below shows the meanings of the DSS button lights.

Light		Meaning
Supervisor Mode		
■	Steady on	Agent is available.
□	Off	Agent is unavailable.
Normal Calling Mode		
■	Steady on	Agent is busy on a call.
□	Off	Agent is not busy on a call.

Agent-Related Activities

Changing Agent Status

To program **Available** or **Unavailable** buttons:

See **Programming Buttons**, p. 14.

To change agent status, enter supervisor mode (see p. 15). If the call volume requires more agents, you can then sign additional agents into your group.

MLX Display Consoles

To sign an agent in or out:

1. Press the programmed **Available** or **Unavailable** button,
OR

Press the **Feature** button and select *ES2 On* [*ES2On*] for Available or *ES Off* [*ESOff*] for Unavailable.

2. Press the programmed **Agent** button labeled with the agent's name,
OR
Press the DSS button labeled with the agent's name.

Analog Multiline Consoles

To sign an agent in or out:

1. Press the programmed **Feature** button and dial **762** for Available or **760** for Unavailable.
2. Press the programmed **Agent** button labeled with the agent's name,
OR
Press the DSS button labeled with the agent's name.

Signing In & Out

To program an **Available/Unavailable** button:

See **Programming Buttons**, p. 14.

An agent signs (or logs) in and out in one of two ways:

- By using a feature code.
- By pressing a programmed **Available/Unavailable** button that changes the current status. Agents must not use this button during a call or the call may be disconnected.

The use of the feature code varies according to the type of agent telephone.

To sign in or out:

- On multiline phones, the agent presses the **Feature** button and dials **44** to sign in and ***44** to sign out.
- On single-line phones, the agent dials **#44** to sign in and ***#44** to sign out.

Current Settings

Use this page to record the current settings used in your calling group or groups. If you need a setting changed, refer to this page. Write in pencil so that you can keep your records up to date.

Group Name _____ Extension _____

Setting Name	Currently
Hunt Type	<input type="checkbox"/> Circular <input type="checkbox"/> Most Idle <input type="checkbox"/> Linear
Auto Login/Logout	<input type="checkbox"/> Logout <input type="checkbox"/> Login
Queue Control	_____ (0–99)
Overflow Threshold	_____ (1–99)
Overflow Threshold Time	_____ (0–900 sec)
Prompt-Based Overflow	<input type="checkbox"/> Yes <input type="checkbox"/> No
Overflow Receiver	<input type="checkbox"/> Group _____ <input type="checkbox"/> QCC
Message-Waiting Receiver	_____ (Name and Ext. No.)
Primary Delay Announcement 1	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 2	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 3	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 4	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 5	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 6	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 7	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 8	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 9	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Primary Delay Announcement 10	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No
Secondary Delay Announcement Does it repeat?	<input type="checkbox"/> Yes _____ (Ext. No.) <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No
Time between Announcements	_____ (0–900 sec)
External Alert for Calls Waiting in Queue	<input type="checkbox"/> Yes <input type="checkbox"/> No
External Alert Extension	_____ (Name and Ext. No.)
Calls-in-Queue Alarm Threshold 1	_____ (1–99)
Calls-in-Queue Alarm Threshold 2	_____ (1–99)
Calls-in-Queue Alarm Threshold 3	_____ (1–99)

Feature Codes

Supervisor features

Enter supervisor mode ■	32 + Hold
Exit supervisor mode ■	32 + Drop
Change agent status to Available	762 + extension*
Change agent status to Unavailable	760 + extension*

Agent features

Multiple telephones:

Sign in/Log in (Available)	44
Sign out/Log out (Unavailable)	* 44

Single-line telephones;

Sign in/Log in (Available)	# 44
Sign out/Log out (Unavailable)	#* 44

Call-covering features

Pickup

group	88
extension (inside)	9 + extension number
line (outside)	9 + line number

■ Available only by using feature code.

* Press the DSS button or the **Auto Dial** button for the extension. You cannot dial the extension's digits.

Special Characters

Features that dial numbers automatically may need special characters to allow for correct dialing or system response.

Press...	See...	Means...
Drop	s	Stop. Halts dialing sequence to allow for system response.
Hold	p	Pause. Inserts 1.5-sec. pause in dial sequence. Multiple consecutive Pauses allowed.
Conference	f	Flash. Sends switchhook flash. Must be first entry in sequence.
##	#	For Extension Programming only (<i>Ext Program [Prog]</i>): End of Dialing. Use to signal end of dialing sequence or to separate grouped digits.
#	#	For dialing and Directory listings: End of Dialing. Use to signal end of dialing sequence or to separate grouped digits.