Device Reports

CAR Device Reports

CAR provides reporting capabilities for three levels of users: administrators, managers, and individual users. Only administrators generate device reports.

Device reports track the load and performance of Unified Communications Manager related devices, such as conference bridges, voice-messaging servers, gateways, and trunks.

Device Reports Summary Descriptions

Device reports help CAR administrators track the load and performance of Unified Communications Manager-related devices, such as conference bridges, voice-messaging server, gateways, and trunks. This section describes the device reports:

- Gateway

  - Detail - Available for CAR administrators. Use the Gateway Detail report to track issues with specific gateways. The report provides a list of calls that used the specified gateways. Use this report to review detailed information about chosen gateways. You can specify gateways by type, such as all or some of the VG200 gateways in your system, or by only those gateways that use a particular route pattern. You can also specify search criteria based on call types and QoS values.

  - Summary - Available for CAR administrators. The Gateway Summary report provides a summary of all the calls that went through the gateways. It also provides the total number of calls and duration for each of the categories, namely Incoming, Tandem, and Outgoing (Long Distance, Local, International, Others, OnNet), and, also, the total calls for each QoS value for each gateway in the system. Use this report to track the functionality of the system on a daily basis. If you discover issues that need to be studied further, use the gateway detail report.

- Utilization - Available for CAR administrators. The Gateway Utilization report provides an estimate of the utilization percentage of the gateway(s). You can examine the usage on the basis of each hour of a day or by a specified number of days of the week or month. Reports generate for each gateway that is chosen. Use this report for load balancing or capacity planning (to evaluate the need for adding or removing gateways, depending on their utilization). You can specify gateways by type, such as all or some of the VG200 gateways in your system, or by only those gateways that use a particular route pattern.

- Route Patterns/Hunt Pilots

    - Route and Line Group Utilization - Only CAR administrators can generate the Route and Line Group Utilization report. This report provides an estimated utilization percentage of the chosen route and line group(s). You can examine the usage on the basis of each hour of a day or by a specified number of days of the week or month. Reports generate for each chosen route and line group. Use the report to analyze whether the route and line group capacity is sufficient to meet the usage requirements. Based on the results, you can decide whether additions are required. If you are load balancing gateways by using different route and line groups or route patterns and hunt lists that are assigned to the gateways, you can use this report to see the load for the whole grouping. This report also provides a convenient way of generating utilization information for a grouping of gateways by a particular route and line group; the group will also include any H.323 fallback gateways that are using the specified route and line group.

    - Route/Hunt List Utilization - Available for CAR administrators. The Route/Hunt List Utilization report provides an estimated utilization percentage of the chosen route/hunt list(s). You can examine the usage on the basis of each hour of a day or by a specified number of days of the week or month. Reports generate for each chosen route/hunt list. Use the report to analyze whether the route and line group capacity is sufficient to meet the usage requirements. Based on the results, you can decide whether additions are required. If you are load balancing gateways by using different route/hunt lists that are assigned to the gateways, you can use this report to see the load for the whole grouping. This report also provides a convenient way of generating utilization information for a grouping of gateways by a particular route/hunt list; the group will also include any H.323 fallback gateways that are using the chosen route/hunt list.

    - Route Pattern/Hunt Pilot Utilization - Available for CAR administrators. The Route Pattern/Hunt Pilot Utilization report provides an estimated utilization percentage of the chosen route pattern(s)/hunt pilot(s). You can examine the usage on the basis of each hour of a day or by a specified number of days of the week or month. Reports generate for each chosen route pattern/hunt pilot. Use the report to analyze system usage on the chosen route pattern/hunt pilot.

    - Hunt Pilot Summary - Only CAR administrators generate the Hunt Pilot Summary Report.The CDR Hunt Pilot Call Summary report displays the call details for the specified hunt pilot. This report displays an only an overview of the calls for the hunt pilots and hunt member information is not included. The CAR administrator can generate report for a maximum of five hunt pilot DNs.

    - Hunt Pilot Detail - Only CAR administrators generate the Hunt Pilot Detailed Call Report. This report displays call details for a hunt pilot number or a hunt member dn.

- Conference Call Details - Available for CAR administrators. The Conference Call Details report allows you to generate and view details about conference calls and conference bridges. The Summary Report displays the summary information of conference calls within a chosen date/time range but does not contain information about each individual conference participant call leg. The Detailed Report displays the detailed information about the conference calls within a chosen date/time range and includes information about each individual conference participant call leg.

- Conference Bridge Utilization - Available for CAR administrators. The Conference Bridge Utilization report provides an estimate of the utilization percentage of the conference bridge(s). You can examine the usage on the basis of each hour of a day or by a specified number of days of the week or month. Generate reports for all the conference bridges in the system. Use this report to determine the activity on the conference bridge(s) and whether you need to add additional resources. This report helps you identify usage patterns, so you can plan capacity when you discover recurring peaks in the usage pattern.

- Voice Messaging Utilization - Available for CAR administrators. The Voice Messaging Utilization report provides an estimate of the utilization percentage of the voice-messaging device(s). You can examine the usage on the basis of each hour of a day or by a specified number of days of the week or month. Reports generate for each voice-messaging device. Use this report to determine the activity on the voice messaging device(s) and whether you need to add additional resources. This report helps you to identify usage patterns, so you can plan capacity when you discover recurring peaks in the usage pattern.

- Trunk Utilization - Available for CAR administrators. Only CAR administrators generate the Trunk Utilization report. This report calculates the utilization reports for devices based on the duration of calls that passed through the devices. You can generate this report on an hourly, daily, or monthly basis. Reports generate for each trunk that is chosen. You can use this report for capacity assessment. You can also generate utilization reports for route groups, route lists and route patterns that are connected through trunks.

Gateway Device Reports

CAR provides reporting capabilities for three levels of users: administrators, managers, and individual users. Only administrators generate device reports.

Device reports track the load and performance of Unified Communications Manager related devices, such as conference bridges, voice-messaging servers, and gateways.

Only CAR administrators generate the gateway reports. The following sections describe how to configure Gateway Detail, Gateway Summary, and Gateway Utilization reports.

Generate Gateway Detail Reports

Only CAR administrators generate the Gateway Detail report. Use the Gateway Detail report to track issues with specific gateways.

This section describes how to generate, view, or mail detailed information about selected gateways.

Procedure

Step 1	Choose **Device Reports** > **Gateway** > **Detail**.
	The Gateway Detail window appears.
Step 2	To display the list of gateways that you can include in the report, in the List of Gateways box perform one of the following tasks:
	a) To display all gateways in the List of Gateways box, click **Gateway Types** in the column on the left side of the window.

b) To display gateways for a particular gateway type in the List of Gateways box, click the icon next to **Gateway Types** in the column on the left side of the window. The tree structure expands, and a list of gateway types displays. Choose a gateway type from the list, and the gateway name displays in the List of Gateways box.

> **Note**   The List of Gateways box lists up to 200 gateways that are configured for the chosen gateway type.

c) To display all gateways that are associated with configured route patterns/hunt pilots, click the **Route/Patterns/Hunt Pilots** in the column on the left side of the window.

d) To display gateways that use a particular route pattern, rather than a gateway type, click the icon next to **Route Patterns/Hunt Pilots** in the column on the left side of the window. The tree structure expands and displays a list of route patterns/hunt lists. Choose a route pattern/hunt pilot from the list, and the gateway name displays in the List of Gateways box.

> **Note**   You can also search for specific route patterns/hunt lists by entering part of the name of the route pattern(s)/hunt list(s) in the Route Patterns/Hunt Pilots box in the column on the left side of the window. CAR searches for the route pattern(s)/hunt list(s) that matches the search string.

Step 3   In the List of Gateways box, choose the gateways that you want to include in the report.

> **Note**   You can generate a report for up to five gateways at a time.

Step 4   To move the chosen gateway to the list of Selected Gateways box, click the down arrow.

The gateway or gateways that you chose appear in the Selected Gateways box.

Step 5   In the **Select Call Types** area, check the check boxes for the types of calls that you want to include in the report. The following table describes the call types.

Table 1: Gateway Details by Call Types

Call Type	Description
On Net	Outgoing calls that originate on one Unified Communications Manager network, go out through a trunk and terminate on a different Unified Communications Manager network. For CAR purposes, be aware that any outgoing call can be classified as an OnNet call if it is configured as such in the CAR dial plan configuration window. See Set Up Dial Plan.
Local	Local calls that are routed through the public switched telephone network (PSTN) to numbers without an area code or that include one of the local area codes.
Long Distance	Long-distance calls that originate in the Unified Communications Manager network and go out through the PSTN.

Call Type	Description
International	International calls that originate in the Unified Communications Manager network and go out through the PSTN.
Incoming	Inbound calls that originate outside the Unified Communications Manager network, enter through a gateway and go into the Unified Communications Manager network.
Tandem	Inbound calls that originate outside the Unified Communications Manager network, enter the Unified Communications Manager network through a gateway and transfer outbound from the Unified Communications Manager network through a gateway.
Others	All other outgoing calls, such as toll-free numbers or emergency calls such as 911.

Step 6 In the **Select QoS** area, check the check boxes for the voice-quality categories that you want to include in the report. The parameters that are set in the following table provide the basis for all voice-quality categories.

Table 2: Gateway Detail Voice Quality

Voice Quality	Description
Good	QoS for these calls represents the highest possible quality.
Acceptable	QoS for these calls, although slightly degraded, still falls within an acceptable range.
Fair	QoS for these calls represents degraded quality but still within a usable range.
Poor	QoS for these calls represents unsatisfactory quality.
NA	These calls do not match any criteria for the established QoS categories.

Step 7 Choose the date range for the period for which you want to see call information.

Note Ensure the date and time range does not exceed one month.

Step 8 Choose **CSV** in the Report Format area, if you want the report in CSV format. Choose **PDF** in the Report Format area, if you want the report in PDF format.

Step 9 Click **View Report**.

Step 10 Click **Send Report**, if you want to mail the report. To send the report, follow the procedure that is described in the Mail Reports.

Generate Gateway Summary Reports

Only CAR administrators generate the Gateway Summary report. This report provides a summary of all the calls that went through the gateways. You can use this information for monitoring the traffic and QoS for calls through the gateways.

You can either view reports that the system automatically generates or generate new reports. Only CAR administrators can schedule reports for automatic generation. For more information, see CAR System Parameters.

This section describes how to generate, view, or mail summary information about gateways.

Procedure

Step 1   Choose **Device Reports** > **Gateway** > **Summary**.

The Gateway Summary window displays.

Step 2   In the **Available Reports** field, choose an automatically generated report (if available) and go to Step 6, on page 7 or use the default setting, **Generate New Report** and go to Step 3, on page 6.

Step 3   In the **Select Call Types** area, check the check boxes for the types of calls that you want to include in the report. The following table describes the call types.

Tip   To check all check boxes, click **Select All**; to uncheck the check boxes, click **Clear All**.

Table 3: Gateway Summary by Call Types

Call Type	Description
On Net	Outgoing calls that originate on one Unified Communications Manager network, go out through a trunk and terminate on a different Unified Communications Manager network. For CAR purposes, be aware that any outgoing call can be classified as an OnNet call if it is configured as such in the CAR dial plan configuration window. See Set Up Dial Plan.
Internal	Calls, including intracluster calls, that originate in the Unified Communications Manager network and end in the same Unified Communications Manager network (no gateways or trunks are used).
Local	Local calls that are routed through the public switched telephone network (PSTN) to numbers without an area code or that include one of the local area codes.
Long Distance	Long-distance calls that originate in the Unified Communications Manager network and go out through the PSTN.

Call Type	Description
International	International calls that originate in the Unified Communications Manager network and go out through the PSTN.
Incoming	Inbound calls that originate outside the Unified Communications Manager network, enter through a gateway and go into the Unified Communications Manager network.
Tandem	Inbound calls that originate outside the Unified Communications Manager network, enter the Unified Communications Manager network through a gateway and transfer outbound from the Unified Communications Manager network through a gateway.
Others	All other outgoing calls, such as toll-free numbers or emergency calls such as 911.

Step 4   If you chose Generate New Report, choose the date range of the period for which you want to generate the report.

Step 5   Choose **CSV** in the Report Format area, if you want the report in CSV format. Choose **PDF** in the Report Format area, if you want the report in PDF format.

Step 6   Click **View Report**.

Step 7   Click **Send Report**, if you want to mail the report. To send the report, perform the procedure that is described in the Mail Reports.

Generate Gateway Utilization Reports

Only CAR administrators generate the Gateway Utilization report. The report provides an estimate of the utilization percentage of the gateway for the period and not the exact utilization. For example, the system calculates the utilization of a gateway between 11hrs-12hrs, as the (sum of the duration of the calls that used the gateway in that hour / (maximum duration seconds in an hour * maximum number of ports in a gateway * number of days between the fromDate and toDate selected) * 100). Similarly, to get a utilization for the whole day, the system calculates the utilization as mentioned for each hour. You can examine the usage based on each hour of a day or on a specified number of days for each week or month.

In the case of weekly utilization reports, the system calculates the utilization as ((sum of the duration of the calls that used the gateway in a day) / (maximum duration seconds in each day * number of each day between the fromDate and toDate selected * maximum number of ports in a gateway) * 100).

In the case of monthly utilization reports, the system calculates the utilization as ((sum of the duration of the calls that used the gateway in a day) / (maximum duration seconds in each day * number of each day between the fromDate and toDate selected * maximum number of ports in a gateway) * 100).

Reports generate for each gateway that is chosen.

For calculation of the utilization of H.323 gateways, the system uses the port numbers from the CAR Gateway Configuration window. To find this window, choose **System** > **System Parameters** > **Gateway Configuration**. You cannot take port details for H.323 gateways from the Unified Communications Manager database because

the H.323 port number always equals zero in the database. The user must update H.323 gateway ports information in the CAR Gateway Configuration window.

Be aware that the only port detail information that is taken from the CAR Gateway Configuration window is only for those gateways that do not have port details that are available or that show zero in the Unified Communications Manager database.

You can either view reports that the system automatically generates or generate new reports. Only CAR administrators can schedule reports for automatic generation. For more information, see CAR System Parameters.

This section describes how to generate, view, or mail Gateway Utilization reports.

Procedure

Step 1   Choose **Device Reports** > **Gateway** > **Utilization**.

The Gateway Utilization window displays.

Step 2   In the Generate Reports field, choose a time as described in the following table.

Table 4: Generate Report Fields

Parameter	Description
Hour of Day	Displays the cumulative utilization for each hour in a 24-hour period for the period that you specify in Step 8, on page 9.
Day of Week	Displays the cumulative utilization for the days of the week that occur within the period that you specify in Step 8, on page 9.
Day of Month	Displays the cumulative utilization for the days of the month that occur within the period that you specify in Step 8, on page 9.

Step 3   In the **Available Reports** field, choose an automatically generated report (if available) and go to Step 10, on page 9 or use the default Generate New Report and go to Step 4, on page 8.

Step 4   To display the list of gateways that you can include in the report in the List of Gateways box, perform one of the following tasks:

a) To display all gateways in the List of Gateways box, click **Gateway Types** in the column on the left side of the window.

b) To display gateways for a particular gateway type in the List of Gateways box, click the icon next to **Gateway Types** in the column on the left side of the window. The tree structure expands, and a list of gateway types displays. Choose a gateway type from the list, and the gateway name displays in the List of Gateways box.

Note   The List of Gateways box will list up to 200 gateways that are configured for the chosen gateway type.

c) To display all gateways that are associated with configured route patterns/hunt pilots, click **Route Patterns/Hunt Pilots** in the column on the left side of the window.

d) To display gateways that use a particular route pattern, rather than a gateway type, click the icon next to **Route Patterns/Hunt Pilots** in the column on the left side of the window. The tree structure expands and displays a list of route patterns/hunt lists. Choose a route pattern/hunt pilot from the list, and the gateway name displays in the List of Gateways box.

> **Note**   You can also search for specific route patterns/hunt lists by entering part of the name of the route pattern(s)/hunt list(s) in the Route Patterns/Hunt Pilots box in the column on the left side of the window. CAR searches for the route pattern(s)/hunt list(s) that matches the search string.

Step 5   Choose a gateway type from the list.

The gateway name displays in the List of Gateways box.

> **Note**   The List of Gateways box will display up to 200 gateways that are configured for the chosen gateway type.

Step 6   In the **List of Gateways** box, choose the gateways that you want to include in the report.

> **Note**   You can generate a report for up to five gateways at a time.

Step 7   To move the chosen gateway to the list of Selected Gateways box, click the down arrow.

The gateway(s) that you chose displays in the Selected Gateways box.

Step 8   If you chose **Generate New Report**, enter the date range of the period for which you want to see call information.

> **Note**   Ensure the date and time range does not exceed one month.

Step 9   If you want the report in CSV format, choose **CSV** in the Report Format area. If you want the report in PDF format, choose **PDF** in the Report Format area.

Step 10   Click **View Report**.

Step 11   Click **Send Report**, if you want to mail the report. To send the report, perform the procedure that is described in the Mail Reports.

Route Pattern and Hunt Pilot Device Reports

CAR provides reporting capabilities for three levels of users: administrators, managers, and individual users. Only administrators generate the Route Pattern and Hunt Pilot device reports.

Device reports track the load and performance of Unified Communications Manager related devices, such as conference bridges, voice-messaging servers, and gateways.

Generate Route and Line Group Utilization Reports

Only CAR administrators generate the Route and Line Group Utilization report. This report provides an estimate of the maximum utilization percentage of the route and line group (cumulative utilization of all the gateways under the route and line group) for the period and not the exact utilization. The system calculates the utilization in the same manner as is done for Gateway Utilization, but this calculation gives cumulative

utilization of all the gateways under the route groups and all the lines under the line groups. You can examine the usage based on each hour of a day or on a specified number of days for each week or month. Reports generate for each of the selected route and line groups.

You can either view reports that the system automatically generates or generate new reports. Only CAR administrators can schedule reports for automatic generation. For more information, see CAR System Parameters.

This section describes how to generate, view, or mail Route and Line Group Utilization reports.

Procedure

Step 1   Choose **Device Reports** > **Route Patterns/Hunt Pilots** > **Route and Line Group Utilization**.

The Route and Line Group Utilization window displays.

Step 2   In the **Generate Reports** field, choose a time as described in the following table.

Table 5: Generate Report Fields

Parameter	Description
Hour of Day	Displays the cumulative utilization for each hour in a 24-hour period for the period that you specify in Step 8, on page 11.
Day of Week	Displays the cumulative utilization for the days of the week that occur within the period that you specify in Step 8, on page 11.
Day of Month	Displays the cumulative utilization for the days of the month that occur within the period that you specify in Step 8, on page 11.

Step 3   In the **Available Reports** field, choose an automatically generated report (if available) and go to Step 10, on page 11, or use the default setting, Generate New Report, and go to Step 4, on page 10.

Step 4   To choose only those route and line groups that use a particular route pattern, click **Route Patterns/Hunt Pilots** in the column on the left side of the window.

The tree structure expands and displays the route patterns/hunt lists that you chose.

Note   You can also search for specific route patterns/hunt lists by entering part of the name of the route pattern(s)/hunt list(s) in the Route Patterns/Hunt Pilots box in the column on the left side of the window. CAR searches for the route pattern(s)/hunt list(s) that matches the search string.

Step 5   Choose a route pattern/hunt list from the list.

The route and line groups for this route pattern/hunt list display in the List of Route/Line Groups box.

Note   The List of Route/Line Groups box will display up to 200 route groups.

Step 6   In the List of Route/Line Groups box, choose the route/line groups that you want to include in the report.

Note   You can generate a report for up to five route/line groups at a time.

Step 7   To move the chosen gateway to the list of Selected Route/Line Groups box, click the down arrow.

The route/line groups that you chose to display in the Selected Route Groups box.

Step 8   If you chose Generate New Report, enter the date range of the period for which you want to see call information.

Note   Ensure the date and time range does not exceed one month.

Step 9   If you want the report in CSV format, choose **CSV** in the Report Format area. If you want the report in PDF format, choose **PDF** in the Report Format area.

Step 10   Click **View Report**.

Step 11   Click **Send Report**, if you want to mail the report. To send the report, follow the procedure that is described in the Mail Reports.

Generate Route and Hunt List Utilization Reports

Only CAR administrators generate the Route/Hunt List Utilization report. The Route/Hunt List Utilization report provides an estimate of the maximum utilization percentage of the route/hunt list (cumulative utilization of all the gateways under the route/hunt list) for the period and not the exact utilization. The system calculates the cumulative utilization of all the gateways under the route lists and all the lines under the hunt lists.

You can examine the usage based on each hour of a day or on a specified number of days for each week or month. Reports generate for each of the selected route/hunt lists.

You can either view reports that the system automatically generates or generate new reports. Only CAR administrators can schedule reports for automatic generation. For more information, see Set Up CDR Load Schedule.

This section describes how to generate, view, or mail the Route/Hunt List Utilization reports.

Procedure

Step 1   Choose **Device Reports** > **Route Patterns/Hunt Pilots** > **Route/Hunt List Utilization**.

The Route/Hunt List Utilization window displays.

Step 2   In the **Generate Report** field, choose a time as described in the following table.

Table 6: Generate Report Fields

Parameter	Description
Hour of Day	Displays the cumulative utilization for each hour in a 24-hour period for the period that you specify in Step 8, on page 12.
Day of Week	Displays the cumulative utilization for the days of the week that occur within the period that you specify in Step 8, on page 12.

Parameter	Description
Day of Month	Displays the cumulative utilization for the days of the month that occur within the period that you specify in Step 8, on page 12.

Step 3 In the **Available Reports** field, choose an automatically generated report (if available) and go to Step 10, on page 12 or use the default setting, Generate New Report, and go to Step 4, on page 12.

Step 4 To choose the route/hunt lists that you want to include in the report, click **Route Patterns/Hunt Pilots** in the column on the left side of the window. The tree structure expands and displays the route patterns/hunt pilots that you chose.

> **Note** You can also search for specific route patterns/hunt lists by entering part of the name of the route pattern(s)/hunt lists in the Route Patterns/Hunt Pilots box in the column on the left side of the window. CAR searches for the route pattern(s)/hunt list(s) that matches the search string.

Step 5 Choose a route/hunt list from the list.

The route/hunt list name displays in the List of Route/Hunt Lists box.

> **Note** The List of Route/Hunt Lists box will display up to 200 route/hunt lists.

Step 6 In the List of Route/Hunt Lists box, choose the route/hunt lists that you want to include in the report.

> **Note** You can generate a report for up to five route/hunt lists at a time.

Step 7 To move the chosen route/hunt lists to the list of Selected Route/Hunt Lists box, click down arrow.

The route/hunt lists that you chose to display in the Selected Route/Hunt Lists box.

Step 8 If you chose Generate New Report, enter the date range of the period for which you want to see call information.

> **Note** Ensure the date and time range does not exceed one month.

Step 9 If you want the report in CSV format, choose **CSV** in the Report Format area. If you want the report in PDF format, choose **PDF** in the Report Format area.

Step 10 Click **View Report**.

Step 11 Click **Send Report**, if you want to mail the report. To send the report, perform the procedure that is described in the Mail Reports.

Generate Route Pattern and Hunt Pilot Utilization Reports

Only CAR administrators generate the Route Pattern/Hunt Pilot Utilization report. The report provides an estimate of the maximum utilization percentage of the route pattern/hunt pilot (cumulative utilization of all the gateways under the route pattern/hunt pilot) for the period and not the exact utilization. The system calculates the utilization of all the gateways under the route patterns and all the lines under the hunt pilots. You can examine the usage based on each hour of a day or on a specified number of days for each week or month. Reports generate for each of the selected route patterns/hunt pilots.

You can either view reports that the system automatically generates or generate new reports. Only CAR administrators can schedule reports for automatic generation. For more information, see Set Up CDR Load Schedule.

This section describes how to generate, view, or mail Route Pattern/Hunt Pilot Utilization reports.

Procedure

Step 1 Choose **Device Reports** > **Route Pattern/Hunt Pilots** > **Route Pattern/Hunt Pilot Utilization**.

The Route Pattern/Hunt Pilot Utilization window displays.

Step 2 In the **Generate Report** field, choose a time as described in the following table.

Table 7: Generate Report Fields

Parameter	Description
Hour of Day	Displays the cumulative utilization for each hour in a 24-hour period for the period that you specify in Step 8, on page 14.
Day of Week	Displays the cumulative utilization for the days of the week that occur within the period that you specify in Step 8, on page 14.
Day of Month	Displays the cumulative utilization for the days of the month that occur within the period that you specify in Step 8, on page 14.

Step 3 In the **Available Reports** field, choose an automatically generated report (if available) and go to Step 10, on page 14 or use the default Generate New Report and go to Step 4, on page 13.

Step 4 To choose the route pattern(s)/hunt list(s) that you want to include in the report, click **Route Patterns/Hunt Pilots** in the column on the left side of the window.

The tree structure expands and displays the route pattern(s)/hunt list(s) that you chose.

Note You can also search for specific route patterns/hunt lists by entering part of the name of the route pattern(s)/hunt list(s) in the Route Patterns box in the column on the left side of the window. CAR searches for the route pattern(s)/hunt list(s) that matches the search string.

Step 5 Choose a route pattern/hunt pilot from the list.

The route pattern/hunt pilot name displays in the List of Route Patterns/Hunt Pilots box.

Note The List of Route Patterns/Hunt Pilots box will display up to 200 route patterns/hunt lists.

Step 6 In the List of Route Patterns/Hunt Pilots box, choose the route patterns/hunt lists that you want to include in the report.

Note You can generate a report for up to five route patterns/hunt pilots at a time.

Step 7 Click the down arrow to move the chosen route pattern/hunt pilot to the list of Selected Route Patterns/Hunt Pilots box.

The route pattern/hunt pilot that you chose displays in the Selected Route Patterns/Hunt Pilots box.

Step 8 If you chose Generate New Report, enter the date range of the period for which you want to see call information.

Note Ensure the date and time range does not exceed one month.

Step 9 If you want the report in CSV format, choose **CSV** in the Report Format area. If you want the report in PDF format, choose **PDF** in the Report Format area.

Step 10 Click **View Report**.

Step 11 Click **Send Report**, if you want to mail the report. To send the report, perform the procedure that is described in the Mail Reports.

Generate Hunt Pilot Summary Report

Only CAR administrators generate the Hunt Pilot Summary Report. The CDR Hunt Pilot Call Summary report displays the call details for the specified hunt pilot. This report displays only an overview of the calls for the hunt pilots and hunt member information is not included. The CAR administrator can a generate report for a maximum of five hunt pilot DNs.

This section describes how to generate, view, or mail Hunt Pilot Summary reports.

Procedure

Step 1 Choose **Device Reports** > **Route Pattern/Hunt Pilots** > **Hunt Pilot Summary**.

The Hunt Pilot Detail Summary displays.

Step 2 Enter the hunt pilot number in the **Hunt Pilots** text box and press the Enter key.

The hunt pilot number is displayed below the text box. Alternately, you can click the icon to display all the available hunt pilot numbers.

Step 3 Click on the required hunt pilot number, so that it is listed in the List of Hunt Pilots.

Step 4 From the Generate Reports drop-down list, choose:

a) Hour of the day - Displays the call details for each hour in a 24-hour period for the period that you specify in Step 7, on page 14.

b) Day of the Week - Displays the call details for the days of the week that occur within the period that you specify in Step 7, on page 14.

c) Day of the Month - Displays the call details for the days of the month that occur within the period that you specify in Step 7, on page 14.

Step 5 Choose any of the available reports or the Generate New Report option from the **Available Reports** drop-down list.

Step 6 From the list of hunt pilots available, choose the required ones and click the down arrow.

The hunt pilots chosen are displayed in the **Selected Hunt Pilots** list.

Step 7 Choose the **From Date** and the **To Date** from the drop-down lists available.

Step 8	Choose the required report format.
	It can either be **CSV** or **PDF**. PDF is the default report option.
Step 9	Click **View Report** to view the report.
	To view the report results, see Generate Hunt Pilot Summary Report, on page 14.
Step 10	Click **Send Report**, if you want to mail the report.
	To send the report, perform the procedure that is described in the Mail Reports.

Generate Hunt Pilot Detail Report

Only CAR administrators generate the Hunt Pilot Detailed Call Report. This report displays call details for a hunt pilot number or a hunt member dn.

This section describes how to generate, view, or mail Hunt Pilot Detail reports.

Procedure

Step 1	Choose **Device Reports** > **Route Pattern/Hunt Pilots** > **Hunt Pilot Detail**.
	The Hunt Pilot Detail window displays.
Step 2	Select the **HuntPilot** or the **MemberDn** for generating the report.
Step 3	Enter the hunt pilot number in the **Hunt Pilots** text box and press the Enter key.
	The hunt pilot number is displayed below the text box. Alternately, you can click the icon to display the hunt pilot numbers.
Step 4	If you had selected the hunt pilot option, click on the required hunt pilot number, so that it is listed in the **SelectedHuntPilot/MemberDn** list box. Proceed to Step 7, on page 15.
Step 5	If you had selected the member dn option, click on the required hunt pilot number to list the member dn numbers in it.
Step 6	From the list of member dns, click on the required ones so that they get listed in the **SelectedHuntPilot/MemberDn** list box.
Step 7	Choose any of the available reports or the Generate New Report option from the **Available Reports** drop-down list.
Step 8	Choose the **From Date** and the **To Date** from the drop-down lists available.
Step 9	Choose the required report format.
	It can either be CSV or PDF. PDF is the default report option.
Step 10	Click **View Report** to view the report.
	To view the report results, see Hunt Pilot Detail Report Results, on page 31.
Step 11	Click **Send Report**, if you want to mail the report.

To send the report, perform the procedure that is described in the Mail Reports.

Conference Bridge Device Reports

CAR provides reporting capabilities for three levels of users: administrators, managers, and individual users. Only CAR administrators generate the conference bridge device reports.

Device reports track the load and performance of Unified Communications Manager related devices, such as conference bridges, voice-messaging servers, and gateways.

Generate Conference Call Details

Only CAR administrators generate the Conference Call Details report. The Conference Call Details report allows you to generate and view details about conference calls.

This section describes how to generate, view, or mail a Conference Call Details report.

Procedure

Step 1   Choose **Device Reports > Conference Bridge > Call Details**.

The Conference Call Details window displays.

Step 2   In the Report Type drop-down menu, choose either **Summary** or **Detail**.

Step 3   In the Available Reports field, choose an automatically generated report (if available) and go to Step 7, on page 16 or use the default setting, Generate New Report, and go to Step 4, on page 16.

Step 4   In Select Conference Types, check the check box of the conference type that you want to include in the report as described in the following table.

Table 8: Conference Calls Detail Fields

Parameter	Description
Ad-Hoc	Ad hoc conferences allow the conference controller to let only certain participants into the conference.
Meet-Me	Meet-me conferences allow users to dial in to a conference.

Step 5   If you chose Generate New Report, enter the date range of the period for which you want to see conference call details.

Note   Ensure that the date and time range does not exceed one month.

Step 6   Choose CSV in the Report Format area, if you want the report in CSV format. Choose PDF in the Report Format area, if you want the report in PDF format.

Step 7   Click **View Report**.

Step 8   Click **Send Report**, if you want to mail the report. To send the report, perform the procedure that is described in the Mail Reports.

Generate Conference Bridge Utilization Reports

Only CAR administrators generate the Conference Bridge Utilization report. The report provides an estimate of the utilization percentage of the conference bridges (cumulative utilization of all the conference bridges that are selected for OnDemand reports) for the period and not the exact utilization. For example, the system calculates the utilization of a conference bridge between 11hrs and 12hrs as the ((Sum of duration of the calls that used the conference bridge in that hour) / (Number of days between the fromDate and toDate selected * Maximum number of streams in the conference bridge * Maximum number of duration in seconds in an hour) * 100)). The value that is calculated will display in the report as the utilization for the time between 11hrs and 12hrs. You can examine the usage based on each hour of a day or on a specified number of days for each week or month.

You can either view reports that the system automatically generates or generate new reports. Only CAR administrators can schedule reports for automatic generation. For more information, see Set Up CDR Load Schedule.

This section describes how to generate, view, or mail Conference Bridge Utilization reports for each conference bridge type.

Procedure

Step 1   Choose **Device Reports > Conference Bridge > Utilization**.

The Conference Bridge Utilization window displays.

Step 2   In the Generate Report field, choose a time as described in the following table.

Table 9: Generate Report Fields

Parameter	Description
Hour of Day	Displays the cumulative utilization for each hour in a 24-hour period for the period that you specify in Step 6, on page 18.
Day of Week	Displays the cumulative utilization for the days of the week that occur within the period that you specify in Step 6, on page 18.
Day of Month	Displays the cumulative utilization for the days of the month that occur within the period that you specify in Step 6, on page 18.

Step 3   In the Available Reports field, choose an automatically generated report (if available) and go to Step 8, on page 18 or use the default, Generate New Report, and go to Step 4, on page 17.

Step 4   From the Conference Bridge Types column in the left pane, choose the conference bridge type(s) that you want to include in the utilization report.

The conference bridges of the particular conference bridge type that you chose to display in the List of Devices box.

> **Note**   For this report, choose a maximum of five conference bridges.

Step 5   When you have chosen all the conference bridges that you want to include in the report, click the down arrow to add them to the Selected Devices box.

Step 6   If you chose Generate New Report, enter the date range of the period for which you want to see call information.

> **Note**   Ensure the date and time range does not exceed one month.

Step 7   If you want the report in CSV format, choose **CSV** in the Report Format area. If you want the report in PDF format, choose **PDF** in the Report Format area.

Step 8   Click **View Report**.

Step 9   Click **Send Report**, if you want to mail the report. To send the report, perform the procedure described in the Mail Reports.

Voice Messaging Utilization Device Reports

CAR provides reporting capabilities for three levels of users: administrators, managers, and individual users. Only administrators generate device reports.

Device reports track the load and performance of Unified Communications Manager related devices, such as conference bridges, voice-messaging servers, and gateways.

Generate Voice Messaging Utilization Reports

Only CAR administrators generate the Voice Messaging Utilization report. The report provides an estimate of the maximum utilization percentage of the voice-messaging devices for the period and not the exact utilization. For example, the system calculates the utilization of a voice-messaging port/voice-messaging DNs between 11hrs and 12hrs by using the duration of the calls that used the voice-messaging port/voice messaging DNs. The system calculates utilization for the voice-messaging port as the (sum of duration of calls that used the voice-messaging port in that hour*100) / (maximum duration seconds in an hour * number of days between the fromDate and toDate selected). The utilization calculation for voice-messaging DNs represents the (sum of duration of calls that used the voice-messaging DNs in that hour * 100) / (maximum duration seconds in an hour * number of days between the fromDate and toDate selected * maximum number of ports in a gateway that is connected to the voice-messaging DN). The same value will display in the report as the utilization for the time between 11hrs and 12hrs.

You can review the Voice Messaging Utilization report for Voice Messaging Ports only as a newly generated report and not as a report that the system automatically generates.

You can automatically generate the Voice Messaging Utilization report for Voice Messaging DNs, or you can generate it as a new report. Only CAR administrators can schedule reports for automatic generation. For more information, see Set Up CDR Load Schedule.

✎

Note   The CAR Voice Messaging Utilization report supports the Cisco Unity and Cisco Unity Connection voice-messaging systems.

This section describes how to generate, mail, or view Voice Messaging Utilization reports.

Procedure

Step 1   Choose **Device Reports > Voice Messaging > Utilization**.

The Voice Messaging Utilization window displays.

Step 2   In the Generate Report field, choose a time as described in the following table.

Table 10: Generate Report Fields

Parameter	Description
Hour of Day	Displays the utilization results for each hour in a 24-hour period for the period that you specify in Step 10, on page 20.
Day of Week	Displays the utilization for the days of the week that occur within the period that you specify in Step 10, on page 20.
Day of Month	Displays the utilization for the days of the month that occur within the period that you specify in Step 10, on page 20.

Step 3   In the Available Reports field, choose an automatically generated report (if available) and go to Step 12, on page 20 or use the default setting, Generate New Report, and go to Step 4, on page 19.

Step 4   To choose a voice-messaging DN, click **Voice Messaging DNs** in the Voice Utilization pane.

The previously configured voice-messaging DN displays.

Note   The Voice Messaging DN that displays in this window represents the Voice Messaging DN that you configure in the VoiceMailDn service parameter, which supports the Cisco Messaging Interface service. Set the parameter name VoiceMailDn to the routing pattern that you have created on the machine. Configure this by opening Cisco Unified CM Administrationand clicking **System.** Click **Service Parameters**; then, select the service **Cisco Messaging Interface**.

Step 5   Choose the voice-messaging DN.

The DN that you chose displays in the List of DNs/Ports list box.

Step 6   To choose a voice-messaging port, click **Voice Messaging Ports** in the Voice Utilization pane.

A list of configured voice-messaging ports displays.

Step 7   From the list of ports, choose a voice-messaging port.

The port that you chose displays in the List of DNs/Ports list box.

Step 8   In Select Voice Messaging DNs/Ports, click the down arrow.

The port that you chose displays in the Selected DNs/Ports list box.

Step 9   Repeat Step 7, on page 19 and Step 8, on page 20 until you have chosen the ports that you want to include in the report.

Note   For this report, you can choose a maximum of five Voice Messaging Ports/Voice Messaging DNs. You can choose the default Voice Messaging DN and four Voice Messaging Ports, or you can choose five Voice Messaging Ports.

Step 10   If you chose **Generate New Report**, enter the date range of the period for which you want to see call information.

Note   Ensure the date and time range does not exceed one month.

Step 11   Choose **CSV** in the Report Format area, if you want the report in CSV format. If you want the report in PDF format, choose **PDF** in the Report Format area.

Step 12   Click **View Report**.

Step 13   Click **Send Report**, if you want to mail the report. To send the report, perform the procedure described in the Mail Reports.

Trunk Device Reports

CAR provides reporting capabilities for three levels of users: administrators, managers, and individual users. Only administrators generate device reports.

Device reports track the load and performance of Unified Communications Manager related devices, such as conference bridges, voice-messaging servers, gateways, and trunks.

Only CAR administrators generate the trunk reports. The following section describes how to configure Trunk Utilization reports.

Generate Trunk Utilization Reports

Only CAR administrators generate the Trunk Utilization report. This report calculates the utilization reports for devices based on the duration of calls that passed through the devices.

You can generate this report on an hourly, daily, or monthly basis. The system calculates the utilization of a trunk for each hour in the selected date range. For example, the system calculates the utilization of a trunk between 11hrs-12hrs, using the formula, (Sum of the duration of calls that used the trunk in that hour / (total seconds in an hour * maximum number of ports in a trunk * number of days between the fromDate and toDate selected) * 100).

Similarly, to get the utilization for each day in a week, the system calculates the utilization using the formula, ((sum of the duration of calls that used the trunk in a day) / (total seconds in each day * number of each day between the fromDate and toDate selected * maximum number of ports in a trunk) * 100).

In the case of monthly utilization reports, the system calculates the utilization for each day in a month, using the formula, ((sum of the duration of calls that used the trunk in a day) / (total seconds in each day * number of each day between the fromDate and toDate selected * maximum number of ports in a trunk) * 100).

Reports generate for each trunk that is chosen.

For calculation of the trunk utilization, the system uses the port numbers from the CAR Trunk Configuration window. To find this window, choose **System** > **System Parameters** > **Trunk Configuration**. You cannot take port details for H.323 trunks from the Unified Communications Manager database because the H.323 port number always equals zero in the database. The user must update H.323 trunk ports information in the CAR Trunk Configuration window.

Be aware that the only port detail information that is taken from the CAR Trunk Configuration window is only for those trunks that do not have port details that are available or that show zero in the Unified Communications Manager database.

This section describes how to generate, view, or mail Trunk Utilization reports.

Procedure

Step 1   Choose **Device Reports** > **Trunk** > **Utilization**.

The Trunk Utilization window displays.

Step 2   In the Generate Reports field, choose a time as described in the following table.

Table 11: Generate Report Fields

Parameter	Description
Hour of Day	Displays the cumulative utilization for each hour in a 24-hour period for the period that you specify in Step 7, on page 22.
Day of Week	Displays the cumulative utilization for the days of the week that occur within the period that you specify in Step 7, on page 22.
Day of Month	Displays the cumulative utilization for the days of the month that occur within the period that you specify in Step 7, on page 22.

Note   The Trunk Utilization report is not generated automatically.

Step 3   To display the list of trunks that you can include in the report in the List of Trunks box, perform one of the following tasks:

a)   To display all trunks in the List of Trunks box, click **Trunk Types** in the column on the left side of the window.

b)   To display trunks for a particular trunk type in the List of Trunks box, click the icon next to **Trunk Types** in the column on the left side of the window. The tree structure expands, and a list of trunk types displays. Choose a trunk type from the list, and the trunk name displays in the List of Trunks box.

Note   The List of Trunks box will list up to 200 trunks that are configured for the chosen trunk type.

Note   You can generate the trunk utilization reports for route groups, route lists, and route patterns that are connected through trunks.

Step 4   Choose a trunk type from the list.

The trunk name displays in the List of Trunks box.

Note   The List of Trunks box displays up to 200 trunks that are configured for the chosen trunk type.

Step 5   In the List of Trunks box, choose the trunks that you want to include in the report.

Note   You can generate a report for up to five trunks at a time.

Step 6   To move the chosen trunk to the list of Selected Trunks box, click the down arrow.

The trunk(s) that you chose displays in the Selected Trunks box.

Step 7   If you chose Generate New Report, enter the date range of the period for which you want to see call information.

Note   Ensure the date and time range does not exceed one month.

Step 8   If you want the report in CSV format, choose **CSV** in the Report Format area. If you want the report in PDF format, choose **PDF** in the Report Format area.

Step 9   Click **View Report**.

Step 10   Click **Send Report**, if you want to mail the report. To send the report, perform the procedure that is described in the Mail Reports.

CAR Device Reports Results

This chapter describes report output information for each device report.

Gateway Detail Report Results

The Gateway Detail report includes the following fields. See the table.

Table 12: Gateway Detail Report Fields

Field	Description
Date	The date when the call went through the gateway.
Orig. Time	The time when the call went through the gateway.
Term. Time	The time that the call terminated.
Duration(s)	The duration, in seconds, that the call was connected. The duration specifies the difference between the Dest Connect and the Dest Disconnect times.
Orig	The directory number from which the call was placed.

Field	Description
Dest	The directory number to which the call was originally placed. If the call was not forwarded, this directory number should match the Final Destination number. If the call was forwarded, this field contains the original destination number of the call before it was forwarded.
Orig. Codec	The codec code (compression or payload code) that the call originator used on its sending side during this call. This code may differ from the codec code that was used on its receiving side.
Dest. Codec	The codec code (compression or payload code) that the destination used on its sending side during this call. This code may differ from the codec code that was used on its receiving side.
Orig. Device	The device name of the device that placed the call. For incoming and tandem calls, this field specifies the device name of the gateway.
Dest Device	The device name of the device that received the call. For outgoing and tandem calls, this field specifies the device name of a gateway. For conference calls, this field specifies the device name of the conference bridge.
Orig QoS	QoS depicts the voice-quality grade that was achieved for the calls.
Dest QoS	The QoS category that was experienced by the receiver of the call.

Figure 1: Gateway Detail Report, on page 23 displays sample output of the Gateway Detail Report in PDF format.

Figure 1: Gateway Detail Report

Gateway Summary Report Results

The Gateway Summary report includes the following fields. See the following table.

✎

Note   The Gateway Summary report segregates calls for each call classification that the user selects and divides the calls based on QoS type.

Table 13: Gateway Summary Report Fields

Field	Description
Call Classification	Shows the type of call (internal, incoming, and tandem.)
Quality of Service	Shows a summary of the performance of the various gateways with the total number of calls for each voice-quality category. The parameters set in the Define QoS Values provide the basis for all voice-quality categories. • Good - QoS for these calls specifies the highest possible quality. • Acceptable - QoS for these calls, although slightly degraded, still falls within an acceptable range. • Fair - QoS for these calls, although degraded, still falls within a usable range. • Poor - QoS for these calls was unsatisfactory. • NA - These calls did not match any criteria for the established QoS categories.
Calls	Shows the total calls for the particular call classification.
Duration (sec)	Shows the total duration for all the calls for the particular call classification.

The following figure displays sample output of the Gateway Summary Report in PDF format.

Figure 2: Gateway Summary Report

Gateway and Route Utilization Report Results

The Gateway, Route Group, Route List, and Route Pattern Utilization reports provide similar output. If you choose to display the report in PDF format, the report shows the utilization as a bar chart. A graph displays for each selected gateway or route group. See the table.

Table 14: Gateway and Route Utilization Report Fields

Field	Description
Time/Day	Time in one-hour blocks if you chose Hourly or one-day blocks if you chose weekly or monthly. The results show the utilization for each hour or day for the entire period that is shown in the from and to dates.
%	Gateway, route group, route list, or route pattern utilization percentage. This field gives the estimated utilization percentage of the gateways or route groups or route lists or route patterns relative to the total number of calls that all the gateways put together can support at any one time.

Figure 3: Gateway Utilization Report, on page 26 displays sample output of the Gateway Utilization Report in PDF format.

Figure 3: Gateway Utilization Report

Gateway Utilization - Hour of Day

From Date:Jan 1, 2008
To Date:Jan 26, 2008

Date:Jan 26, 2008
Page:1 of 4

Time	%
S1/DS1-0@c3725-MGCP.cisco.com	
00-01	0.00
01-02	0.00
02-03	0.00
03-04	0.00
04-05	0.00
05-06	0.00
06-07	0.00
07-08	0.00
08-09	0.00
09-10	0.00
10-11	0.00
11-12	0.00
12-13	0.00
13-14	0.00
14-15	0.00
15-16	0.00
16-17	0.00
17-18	0.00
18-19	0.00
19-20	0.00
20-21	0.00
21-22	0.00
22-23	0.00
23-24	0.00

Report for   S1/DS1-0@c3725-MGCP.cisco.com

Gateway Name {Port Number}	Max No. of Ports
S1/DS1-0-MGCP.cisco.com	24

Figure 4: Route/Hunt List Utilization Report, on page 27 displays sample output of the Route/Hunt List Utilization report in PDF format.

Figure 4: Route/Hunt List Utilization Report

Route/Hunt List Utilization - Hour of Day

From Date:Jan 1, 2008   Date:Jan 31, 2008
To Date:Jan 31, 2008   Page:1 of 3

Time	%
testRL	
00-01	0.00
01-02	0.00
02-03	0.00
03-04	0.00
04-05	0.00
05-06	0.00
06-07	0.00
07-08	0.00
08-09	0.00
09-10	0.00
10-11	0.00
11-12	0.00
12-13	0.00
13-14	0.00
14-15	0.00
15-16	0.00
16-17	0.00
17-18	0.00
18-19	0.00
19-20	0.00
20-21	0.00
21-22	0.00
22-23	0.00
23-24	0.00

Route List Name	Gateway Name {Port Number}	Max No. of Ports
testRL	S1/DS1-0@c3725-MGCP.cisco.com	24
	Total number of Ports for testRL	24

280497

Figure 5: Route and Line Group Utilization Report, on page 28 displays sample output from the Route and Line Group Utilization report in PDF format.

Figure 5: Route and Line Group Utilization Report

Route and Line Group Utilization - Hour of Day

From Date:Jan 31, 2008
To Date:Jan 31, 2008

Date:Jan 31, 2008
Page:1 of 3

Time	%
testRG	
00-01	0.00
01-02	0.00
02-03	0.00
03-04	0.00
04-05	0.00
05-06	0.00
06-07	0.00
07-08	0.00
08-09	0.00
09-10	0.00
10-11	0.00
11-12	0.00
12-13	0.00
13-14	0.00
14-15	0.00
15-16	0.00
16-17	0.00
17-18	0.00
18-19	0.00
19-20	0.00
20-21	0.00
21-22	0.00
22-23	0.00
23-24	0.00

Route Group Name	Gateway Name {Port Number}	Max No. of Ports
testRG	S1/DS1-0@c3725-MGCP.cisco.com	24
	Total number of Ports for testRG	24

280495

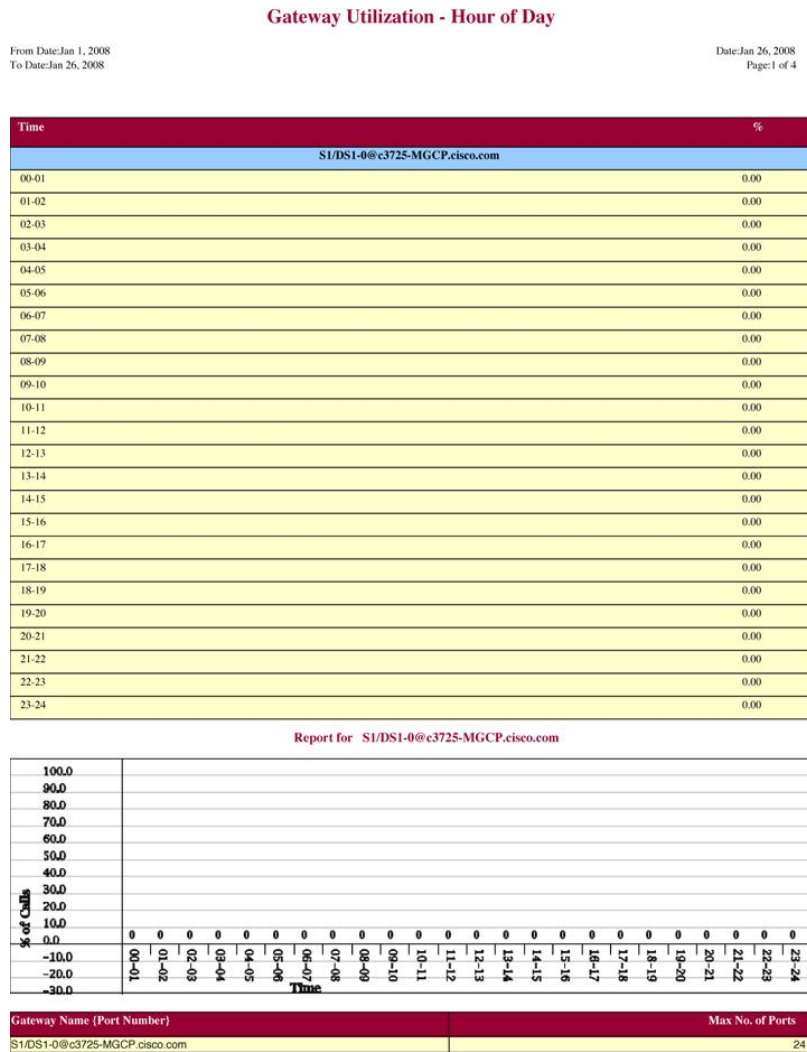Figure 6: Route Pattern/Hunt Path Utilization Report, on page 29 displays sample output of the Route Pattern/Hunt Path Utilization report in PDF format.

Figure 6: Route Pattern/Hunt Path Utilization Report

Route Pattern/Hunt Pilot Utilization - Hour of Day

From Date:Jan 1, 2008   Date:Jan 29, 2008
To Date:Jan 29, 2008   Page:1 of 3

Time	%
7.XXXX	
00-01	0.00
01-02	0.00
02-03	0.00
03-04	0.00
04-05	0.00
05-06	0.00
06-07	0.00
07-08	0.00
08-09	0.00
09-10	0.00
10-11	0.00
11-12	0.00
12-13	0.00
13-14	0.00
14-15	0.00
15-16	0.00
16-17	0.00
17-18	0.00
18-19	0.00
19-20	0.00
20-21	0.00
21-22	0.00
22-23	0.00
23-24	0.00

Route Pattern Name	Gateway Name {Port Number}	Max No. of Ports
7.XXXX	S1/DS1-0@c3725-MGCP.cisco.com	24
	Total number of Ports for 7.XXXX	24

280496

Hunt Pilot Summary Report Results

The Hunt Pilot Summary report includes the following fields. See the table.

Table 15: Hunt Pilot Summary Report Fields

Field	Description
Time	Time in one-hour blocks if you chose Hourly or one-day blocks if you chose weekly or monthly. The results show the call details for each hour or day for the entire period that is shown in the from and to dates.

Field	Description
No.of Calls Presented/Received	Number of calls presented and received at the specified time duration/day. Number of calls received = Number of calls handled + Number of calls abandoned + Number of calls Forwarded due to no Answer + Number of calls Forwarded due to Busy + Number of calls Failed.
No.of Calls Handled/Answered	Number of calls answered.
No.of Calls Abandoned (Not Answered nor Redirected)	Number of calls that went on/off hook but were never connected or answered.
No.of Calls Forwarded due to no Answer (FONA)	Number of calls that were forwarded due to no reply.
No.of Calls Forwarded due to Busy (FOB)	Number of calls that were forwarded since the receiving end was busy.
No.of Calls Failed	Number of calls that failed to go through.
Hunt Pilot Name	Lists the name of the available Hunt Pilots.
Line Number	List the line numbers of the hunt members.

Figure 7: Hunt Pilot Summary Report, on page 31 displays sample output of the Hunt Pilot Summary report in PDF format.

Figure 7: Hunt Pilot Summary Report

Hunt Pilot Summary - Hour of Day

From Date:Nov 13, 2009
To Date:Nov 13, 2009

Date:Nov 13, 2009
Page:1 of 3

Time	No.of Calls Presented/Received	No.of Calls Handled/Answered	No.of Calls Abandoned(Not Answered nor Redirected)	No.of Calls Forwarded due to no Answer(FONA)	No.of Calls Forwarded due to Busy(FOB)	No.of Calls Failed
			5555			
00-01	0	0	0	0	0	0
01-02	0	0	0	0	0	0
02-03	0	0	0	0	0	0
03-04	0	0	0	0	0	0
04-05	0	0	0	0	0	0
05-06	0	0	0	0	0	0
06-07	0	0	0	0	0	0
07-08	0	0	0	0	0	0
08-09	0	0	0	0	0	0
09-10	0	0	0	0	0	0
10-11	0	0	0	0	0	0
11-12	2	2	0	0	0	0
12-13	0	0	0	0	0	0
13-14	0	0	0	0	0	0
14-15	0	0	0	0	0	0
15-16	0	0	0	0	0	0
16-17	0	0	0	0	0	0
17-18	0	0	0	0	0	0
18-19	0	0	0	0	0	0
19-20	0	0	0	0	0	0
20-21	0	0	0	0	0	0
21-22	0	0	0	0	0	0
22-23	0	0	0	0	0	0
23-00	0	0	0	0	0	0

Hunt Pilot Name	Line Number
5555	1001
	1002
Total number of MemberDns for 5555	2

277326

Hunt Pilot Detail Report Results

The Hunt Pilot Detail report includes the following fields. See the table.

Table 16: Hunt Pilot Detail Report Fields

Field	Description
Date/Time connected	Date and Time when the call was received
Date/Time disconnected	Date and Time when the call ended
Duration	Time duration of the call
Calling Party	Directory number (DN) of the caller

Field	Description
Called Party	Hunt Pilot Directory number (DN)
Final Called Party Number	Directory Number where the call landed in the end. If the call is landed in Hunt Pilot, then it will show its member DN. Suppose the call forward is set from member DN to some other DN, it will show that DN where the call got forwarded. The number of the hunt member is displayed only when the Show Line Group Member DN in finalCalledPartyNumber CDR Field is set to true. If the value is set to false, the Hunt Pilot DN is displayed in this field. For details on setting this parameter see, Service Parameters Configuration in Cisco Unified CM Administration Guide.
Dest. Device Name	Device identifier of the device that answered the call.
Call Answered	Indicates if the call was answered or not. Values could be Yes or No.
Call Abandoned	Indicates if the call was abandoned. Values could be Yes or No.
Call Forwarded Due to No Answer (FONA)	Indicates if the call was forwarded due to no reply. Values could be Yes or No.
Call Forwarded Due to Busy (FOB)	Indicates if the call was forwarded since the answering end was busy. Values could be Yes or No.
Call Failed	Indicates if the call failed to get through. Values could be Yes or No.
Call Reference	Identification number to trace the call. This is the globalcallid_callid value in the CDR database.

Figure 8: Hunt Pilot Details Report, on page 32 displays sample output of the Hunt Pilot Details report in the PDF format.

Figure 8: Hunt Pilot Details Report

Conference Call Detail Report Results

You can choose to generate Conference Call information in either a summary or a detailed report. The reports display the call details in a table when you generate the report in PDF format. The following tables show the fields in the Conference Call Detail and Summary reports. See the tables.

✎

Note   The report criteria include the type of conference (ad hoc and/or meet-me) and the From and To date range.

Table 17: Conference Call Detail Summary Report Fields

Field	Description
Orig. Time	Time that the first participant enters the conference.
Term. Time	Time that the last participant leaves the conference.
No. of Participants	Number of participants in the conference.
Duration	Sum of the duration of individual participants in the conference in seconds.
Device Name	Names of the conference devices that were used.

Table 18: Conference Call Detail Report Fields

Field	Description
Conference Start Time	Time at which conference started.
Conference End Time	Time at which conference ended.
Connect Time	Time at which conference participants connected to conference.
Disconnect Time	Time at which conference participants disconnected from conference.
Duration	Total time of conference.
Directory Number	Directory number of participants.
Call Classification	Call types of conference (internal, incoming, and so on.)
Device Name	Names of the conference devices that were used.
QoS	Quality of service.

Figure 9: Conference Call Details Summary Report, on page 34 displays sample output of the Conference Call Details Summary report in PDF format.

Figure 9: Conference Call Details Summary Report

Conference Bridge Utilization Report Results

The Conference Bridge Utilization report provides the following fields. If you choose PDF format, the report shows the utilization as a table. See the table.

Table 19: Conference Bridge Utilization Report Fields

Field	Description
Time/Day	Time in one-hour blocks if you chose Hourly or one-day blocks if you chose day of week or daily.
% Usage	Conference bridge utilization percentage.
Conf. Bridge	The conference bridge device that is used to hold conference calls.
Type	Either hardware or software conference bridge.
Max Streams	The number of conferences that can be held at a time along with the number of people per conference.

Figure 10: Conference Bridge Utilization Report, on page 35 displays sample output of the Conference Bridge Utilization report in PDF format.

Figure 10: Conference Bridge Utilization Report

Conference Bridge Utilization - Hour of Day

From Date:Feb 1, 2007   Date:Feb 24, 2007
To Date:Feb 24, 2007   Page:1 of 2

Time	% Usage
00-01	0.00
01-02	2.08
02-03	4.17
03-04	0.00
04-05	2.34
05-06	3.47
06-07	2.13
07-08	1.95
08-09	1.95
09-10	11.46
10-11	16.10
11-12	12.28
12-13	5.12
13-14	0.00
14-15	0.00
15-16	0.00
16-17	0.00
17-18	0.00
18-19	0.00
19-20	6.25
20-21	0.00
21-22	0.00
22-23	0.00
23-00	0.00

The Total Number of Streams is 96

Conf. Bridge	Type	Max. Streams
CFB_2	Cisco Conference Bridge Software	48
CFB_3	Cisco Conference Bridge Software	48
	Total Capacity:	96
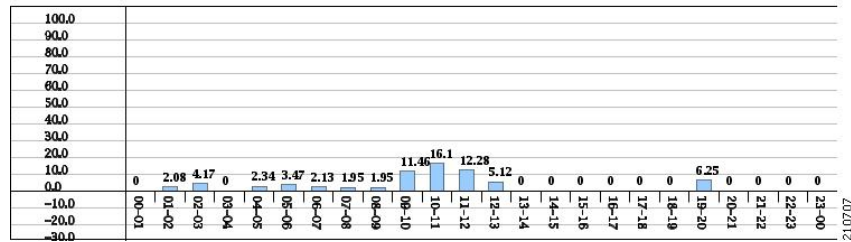
Voice Messaging Utilization Report Results

The Voice Messaging Utilization report provides the following fields. See the table.

Table 20: Voice Messaging Utilization Report Fields

Field	Description
Time/Day	Time in one-hour blocks if you chose Hourly or one-day blocks if you chose day of week or daily.
% Usage	Voice-messaging percentage.

Field	Description
Voice Messaging Ports	The sum of the maximum number of ports for all the gateways under the route patterns that are configured for the voice-messaging systems and the entries in the Device table of Unified Communications Manager that have type Class as 8.
Voice Messaging Gateways	The originating or destination device name of the gateways under the route patterns that are configured for the voice-messaging systems.
Number of Ports	The number of ports that the voice-messaging gateway supports.

Figure 11: Voice Messaging Utilization Report, on page 36 displays sample output of the Voice Messaging Utilization report in PDF format.

Figure 11: Voice Messaging Utilization Report

Voice Messaging Utilization - Hour of Day

From Date:Nov 4, 2006
To Date:Nov 11, 2006

Date:Feb 14, 2007
Page:1 of 8

Time	% Usage
7.XXXX	
00-01	0.01
01-02	0.00
02-03	0.00
03-04	0.00
04-05	0.17
05-06	0.07
06-07	0.24
07-08	1.70
08-09	0.21
09-10	0.15
10-11	1.52
11-12	0.20
12-13	0.11
13-14	0.05
14-15	0.20
15-16	0.04
16-17	0.23
17-18	0.01
18-19	0.00
19-20	0.10
20-21	0.00
21-22	0.07
22-23	0.00
23-24	0.00
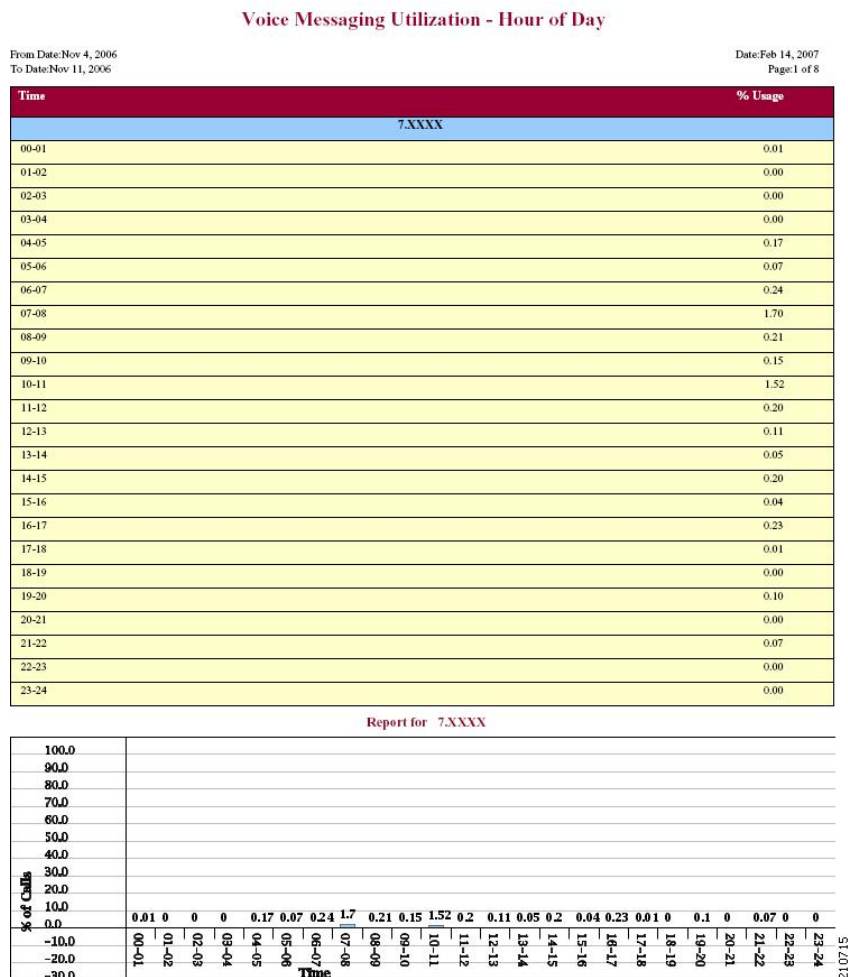
Trunk Utilization Report Results

The Trunk Utilization report provides the following fields. If you choose to display the report in PDF format, the report shows the utilization as a bar chart. A graph displays for each selected trunk. See the table.

Table 21: Trunk Utilization Report Fields

Field	Description
Time/Day	Time in one-hour blocks if you chose Hourly or one-day blocks if you chose weekly or monthly. The results show the utilization for each hour or day for the entire period that is shown in the from and to dates.
%	Trunk utilization percentage. This field gives the estimated utilization of the trunks relative to the total number of calls that passed through the devices.

Figure 12: Trunk Utilization Report Sample 1, on page 38 to Figure 15: Trunk Utilization Report Sample 4, on page 41 display sample output pages of the Trunk Utilization Report in PDF format.

Figure 12: Trunk Utilization Report Sample 1

Trunk Utilization - Hour of Day

From Date:Jul 1, 2010
To Date:Jul 1, 2010

Date:Jul 16, 2010
Page:1 of 10

Time	%
ICTNGC1	
00-01	0.00
01-02	0.00
02-03	100.00
03-04	0.00
04-05	0.00
05-06	0.00
06-07	0.00
07-08	0.00
08-09	0.00
09-10	0.00
10-11	0.00
11-12	100.00
12-13	100.00
13-14	100.00
14-15	0.00
15-16	0.00

Time	%
ICTNGC1	
16-17	0.00
17-18	0.00
18-19	0.00
19-20	0.00
20-21	0.00
21-22	0.00
22-23	0.00
23-00	0.00

Figure 13: Trunk Utilization Report Sample 2

From Date:Jul 1, 2010
To Date:Jul 1, 2010

Date:Jul 16, 2010
Page:4 of 10

Time	%
ICTNGC2	
00-01	0.00
01-02	0.00
02-03	0.00
03-04	0.00
04-05	0.00
05-06	0.00
06-07	0.00
07-08	0.00
08-09	0.00
09-10	0.00
10-11	0.00
11-12	0.00
12-13	0.00
13-14	100.00
14-15	100.00
15-16	0.00
16-17	0.00
17-18	0.00
18-19	0.00

Time	%
ICTNGC2	
19-20	0.00
20-21	0.00
21-22	0.00
22-23	0.00
23-00	0.00

Figure 14: Trunk Utilization Report Sample 3

Time	%
SIP1	
00-01	0.00
01-02	0.00
02-03	0.00
03-04	0.00
04-05	0.00
05-06	0.00
06-07	0.00
07-08	0.00
08-09	0.00
09-10	0.00
10-11	0.00
11-12	0.00
12-13	0.00
13-14	0.00
14-15	0.00
15-16	0.00
16-17	0.00
17-18	0.00
18-19	0.00

Time	%
SIP1	
19-20	0.00
20-21	0.00
21-22	0.00
22-23	0.00
23-00	0.00

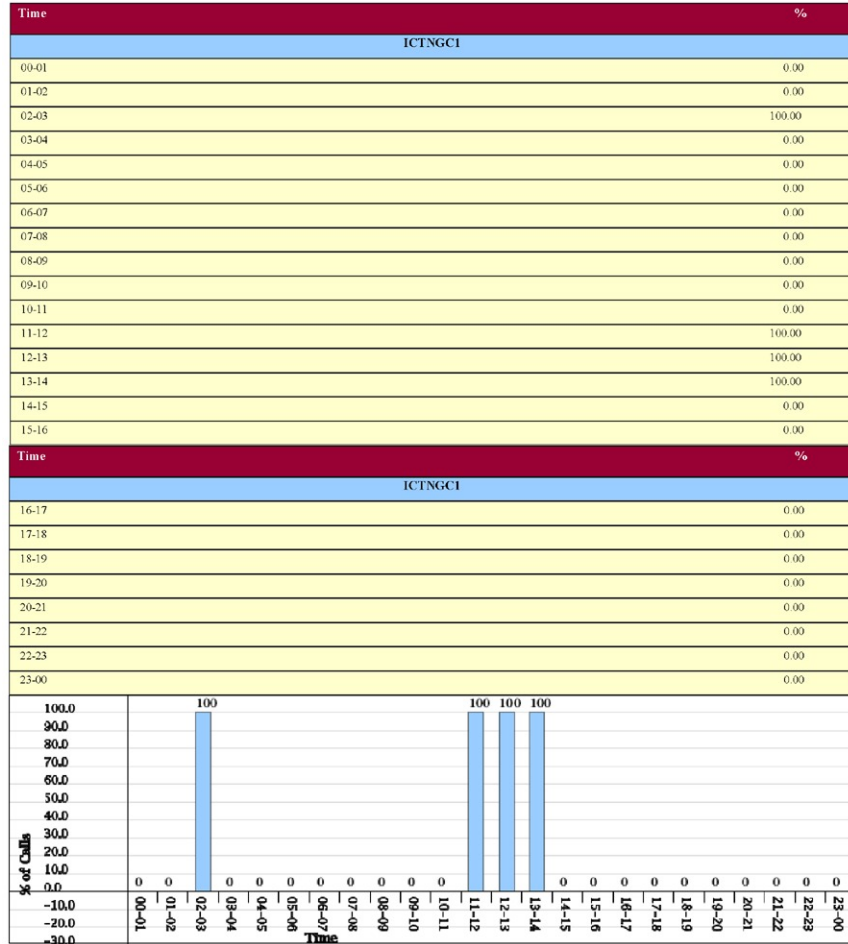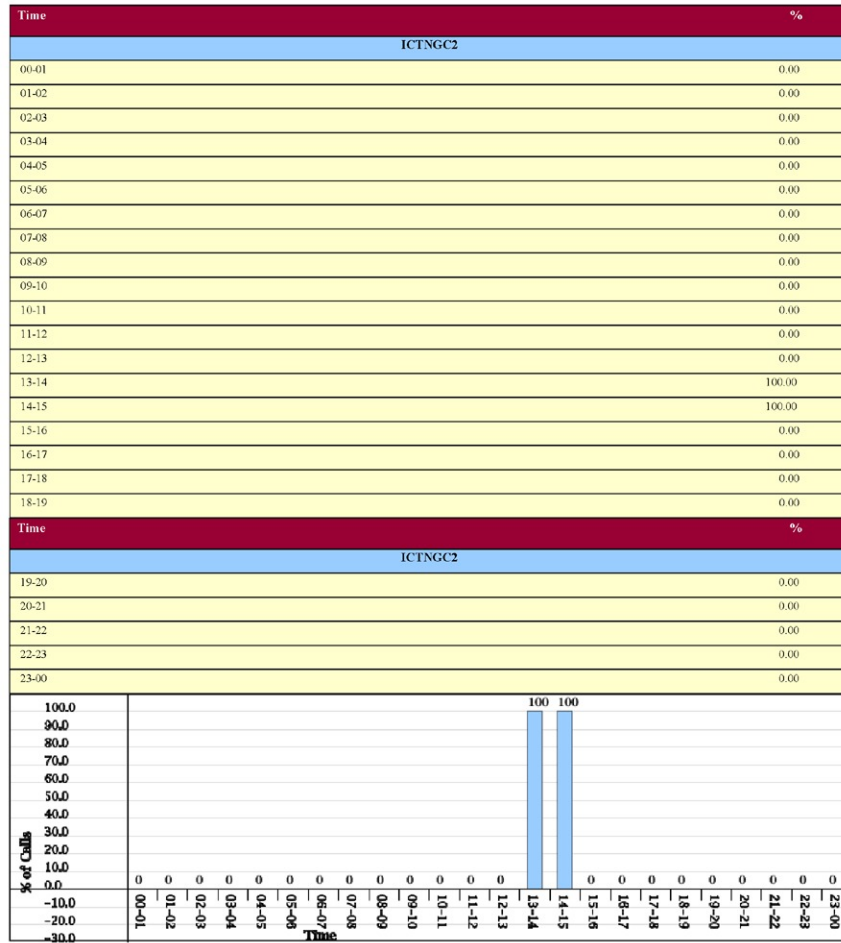*Figure 15: Trunk Utilization Report Sample 4*

From Date:Jul 1, 2010
To Date:Jul 1, 2010

Date:Jul 16, 2010
Page:8 of 10

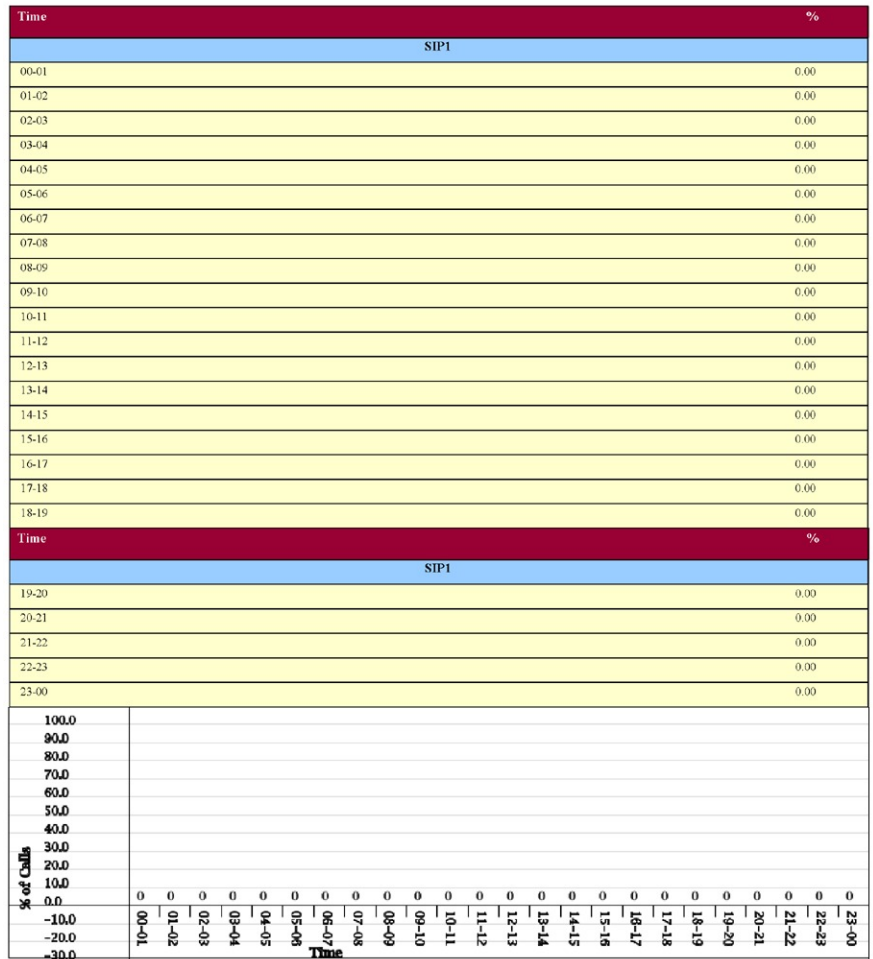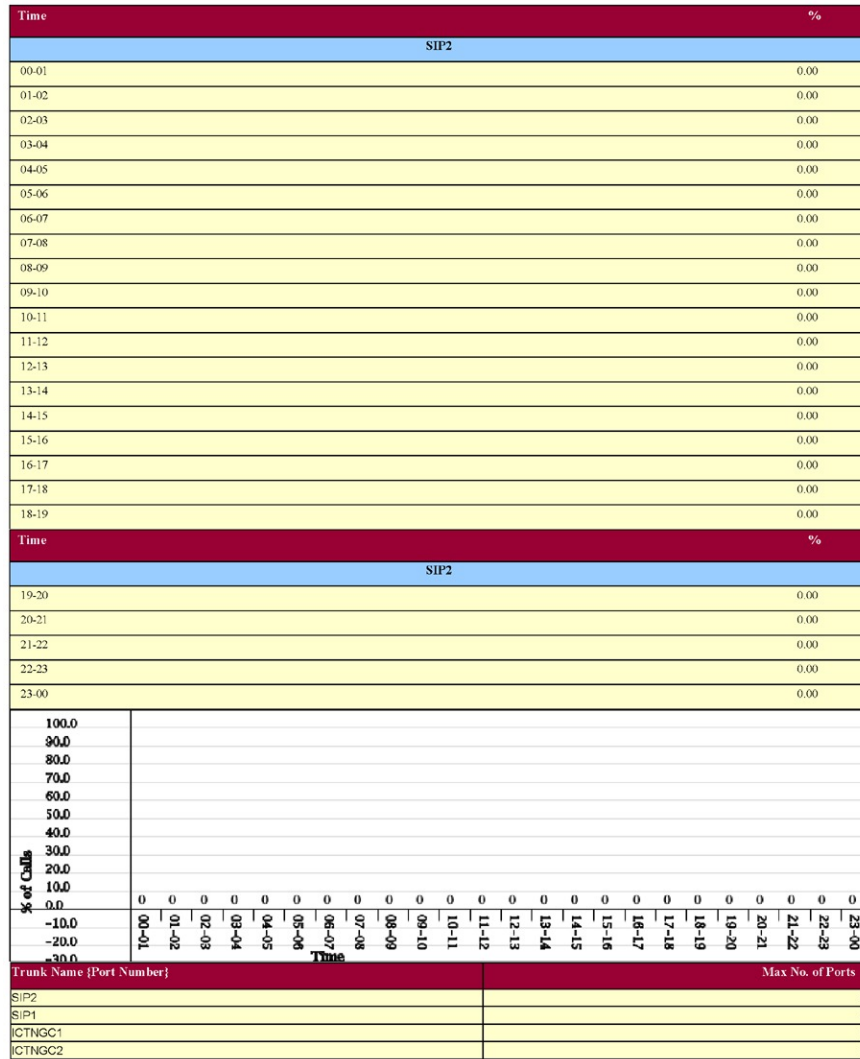| Time	%
SIP2	
00-01	0.00
01-02	0.00
02-03	0.00
03-04	0.00
04-05	0.00
05-06	0.00
06-07	0.00
07-08	0.00
08-09	0.00
09-10	0.00
10-11	0.00
11-12	0.00
12-13	0.00
13-14	0.00
14-15	0.00
15-16	0.00
16-17	0.00
17-18	0.00
18-19	0.00

Time	%
SIP2	
19-20	0.00
20-21	0.00
21-22	0.00
22-23	0.00
23-00	0.00

Trunk Name {Port Number}	Max No. of Ports
SIP2	5
SIP1	5
ICTNGC1	5
ICTNGC2	5

236184