ASCENT
TECHNOLOGY, INC.

ARIS/PX® passenger-connection analyzer

Headquarters
Ascent Technology, Inc.
101 Federal Street, 19th Floor
Boston, MA 02110 USA

Mailing address
Ascent Technology, Inc.
PO Box 51435
Boston, MA 02205-1435 USA

Telephone: +1.617.395.4800
email: sales@ascent.com
www.ascent.com

Determine how flight delays and cancellations affect connecting passengers

The ARIS/PX passenger-connection analyzer determines how flight-arrival delays and flight cancellations affect passenger connections at an airport. Passenger-connection information is supplied to the ARIS/SmartBase® database from an external system, such as an airline reservation system.

Representative features

Scrollable passenger-connection matrix. The ARIS/PX passenger-connection analyzer display is a scrollable matrix, containing as many as 1,000 by 1,000 cells, that displays inbound flights across the horizontal axis and outbound flights down the vertical axis. Each cell of the matrix contains the number of passengers scheduled to connect between the inbound and the outbound flights associated with the cell. The matrix format provides an immediate assessment of connection information for thousands of possible connections at a time. The scrolling capability makes it possible to maintain a cell size that is easily readable.

Flight information. Actual or estimated flight arrival and departure times are displayed along the edges of the matrix, enabling you to assess the extent of the delays. When you place your pointer over a flight, the ARIS/PX passenger-connection analyzer indicates the original schedule time. Flight status indicators provide information about the flight, such as inbound, in range, or taxiing to a position.

Accurate connection-time model. When the ARIS/PX passenger-connection analyzer is installed, models of times required for passengers to check in at each gate, to deplane each aircraft type, and to connect from each parking position to every other parking position are entered into the ARIS/SmartBase database.

Alert indicator. Using models, the ARIS/PX passenger-connection analyzer computes the most reasonable connection times between flights and automatically selects and displays on each cell in the matrix one of four alert levels: no alert, difficult connection, unlikely to connect, and impossible to connect. Because each alert is associated with a different color, you can identify possible problems rapidly and select the best course of action.

Connection-detail information. When you place the pointer over connection cells in the matrix, the ARIS/PX passenger-connection analyzer displays information, such as the number of connecting passengers in each class, the time required for the connection, and the actual time available to make the connection.

Aircraft-turn indicator. The ARIS/PX passenger-connection analyzer displays an indicator when an aircraft makes the turn from an inbound to an outbound flight. Aircraft-turn indicators may be used to identify departure times that are overly optimistic and that, if readjusted correctly, could reduce connection problems.

Automatic sort and update. The ARIS/PX passenger-connection analyzer automatically places the most difficult connections in the upper left corner of the display. The system updates cells and flight information automatically as the ARIS/SmartBase database receives new information.

Time-range control. Rather than scrolling through a large matrix, you can use time-range control functions to select a specific time range for arrivals or for departures. You can view connections within each bank of flights. Because connections within the same bank of flights usually represent 95% of all connections, the bank-selection system provides a convenient way to partition the matrix.

Report generation. The ARIS/PX passenger-connection analyzer produces hardcopy output of sections of the connection matrix. The printout, which can cover any time period, is generated by a separate program that accesses the ARIS/SmartBase database directly. Users at gates and in arrival halls can print their own connection reports.

Generalized database access. All information processed by the ARIS/PX passenger-connection analyzer is stored in the ARIS/SmartBase database, where it can be used by other ARIS® products or by external systems. You can create a report that shows, for example, the average actual connection times compared with the scheduled connection times and the number of missed connections.
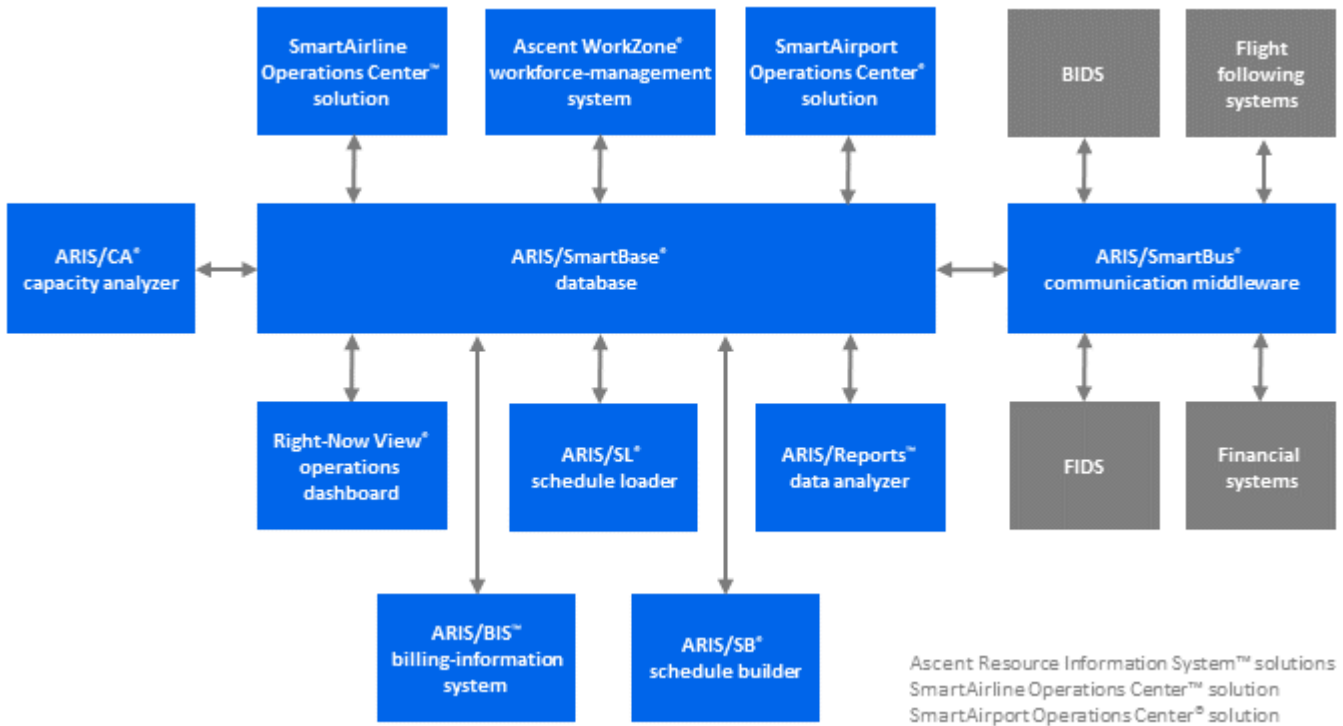
Worldwide capability. The ARIS/PX passenger-connection analyzer can store passenger connection information on a worldwide basis. By monitoring passenger connections on a worldwide basis, you can make more informed decisions regarding flight delays and reroutes.

Integration with the ARIS/CX® crew-connection analyzer. When the ARIS/CX crew-connection analyzer is also running, crew-connection information is integrated with the passenger-connection matrix. By sharing the matrix with the ARIS/CX crew-connection analyzer, a single display can monitor both passenger and crew connections.

Collaborative decision-making. The ARIS/PX passenger-connection analyzer supports team decision-making, ensuring all users share a consistent current view of operations. You can discuss possible solutions with other users before you commit to changes.

Web-enabled for cost-effective rapid and wide deployment. You gain access to the ARIS/PX passenger-connection analyzer through Ascent's From Touchdown to Takeoff® cloud-hosted service, a secure, highly-available, and readily-expandable platform. When

you subscribe to the service, you can gain access Ascent's entire suite of products, including the ARIS/PX passenger-connection analyzer, using a standard browser directly from your network without any need to install, maintain, and support on-premise hardware and software. We can readily adjust available computing power to meet your organization's changing needs, and you can easily expand your solution to accommodate additional users and to manage additional resources, facilities, and locations.

Ascent Resource Information System™ solutions
SmartAirline Operations Center™ solution
SmartAirport Operations Center® solution

Ways we can help you

Advisory and consulting services. We provide unbiased advice about resource allocation, optimization, planning, scheduling, management, and deployment methodologies; develop cost-benefit analyses; analyze business processes; manage projects; gather and document technical requirements; develop functional specifications; and specify hardware, software, and devices.

Project-management services. Our project-management team works closely with you, following our time-proven delivery methodology, and uses face-to-face meetings, teleconferences, web conferences, and email exchanges to keep you informed every step of the way. We believe careful project management is the key to successful on-time and on-budget deliveries of Ascent Technology's SmartAirline Operations Center™ solution and SmartAirport Operations Center™ solution.

Knowledge-engineering services. Knowledge engineering is the process of identifying your business knowledge—the business rules, policies, procedures, preferences, and requirements that guide the way your organization operates—and then codifying your business knowledge in the knowledge base at the heart of SmartAirline Operations Center solution and SmartAirport Operations Center solution. The business knowledge in the knowledge base determines how the solutions behave. Our knowledge engineers work with you to gather and enter the business knowledge that enables the solution to behave exactly the way you want it to.

Implementation, integration, and installation services. Our implementation team provides system integration and testing services; develops product extensions, enhancements, and connectivity software for importing data to and exporting data from external systems; and creates reports. Our implementation team is also responsible for setting up an environment, customized to meet your organization's needs, and monitoring its performance, in our secure hosting center.

Training services. We provide a wide range of user, administrator, trainer, and refresher training classes at your location, at our Boston, MA, headquarters, and remotely over the web. We also provide operational training services remotely when you begin to use the SmartAirline Operations Center solution or the SmartAirport Operations Center solution in production.

Maintenance and support services. We offer premium support services for the SmartAirline Operations Center solution and the SmartAirport Operations Center solution around the clock. We provide comprehensive remote user support services via telephone, email, web conferences, and Internet, as well as software maintenance, such as product updates, patches, and releases. Our customer support community portal and ticket system enable you to ask questions and receive responses, request service, report problems, and track issues day and night.

Ascent Technology's From Touchdown to Takeoff Cloud-Hosted Service

You gain access to the Ascent Resource Information System solutions in the SmartAirline Operations Center solution and in the SmartAirport Operations Center solution over the Internet, using a standard web browser.

Ascent Resource Information System solutions SmartAirline Operations Center solution SmartAirport Operations Center solution	From Touchdown to Takeoff cloud-hosted service Browser support: Google Chrome, Microsoft Edge, and Mozilla Firefox Minimum Internet connection speed: 5 Mbps Minimum resolution: Full HD (FHD)
ARIS/AV® aerial-view display	✓
ARIS/BB® baggage-belt allocator	✓
ARIS/BIS™ billing-information system	✓
ARIS/CA® capacity analyzer	✓
ARIS/CI® check-in counter allocator (with ARIS/IQ® queue manager)	✓
ARIS/FW® flight watcher	✓
ARIS/GateView® real-time display	✓
ARIS/GM® gate manager	✓
ARIS/Reports™ data analyzer	✓
ARIS/SB® schedule builder (with ARIS/LegGen® flight-leg generator)	✓
ARIS/SL® schedule loader	✓
ARIS/SmartBase® database (with Resource Editor tools)	✓
ARIS/SmartBus® communication middleware	✓
ARIS/SP® stand planner	✓
Ascent WorkZone® workforce manager	✓
ARIS/WorkModel® workload generator	✓
ARIS/WorkNet® bid and trade manager	✓ *
ARIS/WorkOptimize® work-period generator	✓
ARIS/WorkPlan® work-schedule generator	✓
ARIS/WorkRelay® task and attendance monitor	✓
ARIS/WorkTime® workday manager	✓
Right-Now View® operations dashboard	✓
ARIS/CX® crew-connection analyzer	✓
ARIS/FR® flight-readiness display	✓
ARIS/PX® passenger-connection analyzer	✓
ARIS/TE® tug-equipment assigner	✓
Gate Chart Display™ tool	✓
Stand Assignment Optimizer™ tool	✓

* Minimum requirements: 512 Kbps Internet connection speed and SXGA resolution