





JET EDUCATION

Obsidian Consulting Group's Jet Billing System - Education, is the ideal solution for Data and Voice cost recovery and user management for Educational Institutes.

Data Billing

Jet is the preferred Educational cost recovery and billing system in Australia, with over one quarter of Universities using Jet for data and/or voice billing and management. This experience has given Obsidian the tools and understanding to create a system that solves the unique problems that Universities, TAFEs, Schools and Educational Associations face with data and voice management.

Jet Education comes with a number of specially designed features and that allow the system to fit seamlessly into an Educational facility network. Being the creators of Jet, Obsidian are available to customise the billing system to specifically suit each customer's individual needs.

Jet integrates with a number of edge devices, including Cisco's Service Selection Gateway (SSG), Intelligent Services Gateway (ISG), Service Control Engine (SCE) and Netflow; BlueCoat PacketShaper (previously Packeteer) and SGProxy; Procera's PacketLogic, Juniper's JFlow; Fortinet; Websense; and our latest addition, Allot. Other devices are being added continuously, so please ask a consultant about other devices not listed here.

Integration with an edge device enables Jet to pull information from the device and perform deep packet analysis and reporting, shape users and specified protocols (dependant on the device), and on-net vs off-net accounting and billing.

LDAP integration performs authentication against an LDAP, Microsoft Active Directory or Novell database, allowing users to log onto the Institute's file network and internet with a single sign-on.

Jet's advanced quota management and hierarchical structure are designed so that Educational Institutes can assign quota to users and easily assign management levels to departmental administrators.

Quota can be assigned in various ways, including differentiation between undergraduate and postgraduate students, and staff. Quota can also be assigned by megabyte or by currency amount. In practical terms, this feature allows Institutes to assign 200Mb per month to Undergrads, 300Mb per month to postgrads, and unlimited usage to staff.

Alternatively, students and staff can also be assigned quota by department or faculty, or usage can be tracked without quota rules put in place at all.

Hierarchical management tools let the Institute set a tiered management system, so that department administrators can manage all staff and students within their department, faculty administrators can manage departments, etc. Alternatively, centralised management can be put in place to allow the IT department management over the entire system.

Adjustments are available to administrators to manually add or remove quota, suspend or activate accounts and add one-off fees and charges.

The customer care portal allows users to view their usage and use the credit card or BPAY facility to instantly top-up accounts, while Jet's prepaid tools allow clients to produce scratch cards so that students can easily obtain further quota from student services such as the library.

Jet's flexible provisioning system enables the client to set up automatic emails to users, for example when their account reaches a certain point, such as 80% of assigned usage.

Wireless billing and tracking is also included, with the one system able to track and manage the client's network and wireless network.

Jet is white branded, and customers can easily change the look and feel of the system through the web interface. Jet also supports multiple realms, which Universities often use to manage residential colleges.

Jet is written in Python with a MySQL database and ships with the source code so that client's are able to develop their own modules if they choose.

Addition modules are also available, including a Redundancy/Failover module that licenses a second server to act as a failover.

The IP Manager module enables management of IP address ranges within Jet, while the Location Manager module provides the ability to manage multiple access locations, as well as mapping of user login locations to enable differential billing based on login location.

Voice Billing

The Jet Billing System is a convergent system that not only performs both pre-paid and post-paid billing, but also Data and Voice billing and rating.

Jet's voice billing module is included in the license fee, so Universities can now enjoy the benefits of supporting the one system for both networks.

Jet currently imports Voice and VoIP billing for Nextep, Optus, Telstra and Powertel in Australia, while for mobile billing Jet supports the TAP2 standard for global mobile billing.

More importers are continually being added, and if your importer is not listed, so check the web site:

http://www.jet.obsidian.com.au

or contact Obsidian to have an importer purpose built for you.



Jet imports call data and then rates the calls based on the upstream provider's call classification codes, then rates according to the user's plan structure to provide a margin on top of the wholesale cost of the call to the client.

Jet's online reporting provides full breakdowns of call data to your users, allowing resolution of phone billing queries easily through the online customer care portal. This allows both students and staff to query their call records without having to go through Department administrators.

Jet Education's flexible provisioning hooks allow Universities, TAFEs and Schools to integrate any upstream provisioning requirements, be it a simple automated email alerting users that they are low on credit, or a full API.

Voice data can enter the system in a variety of ways, including:

- Direct access to an Asterisk database.
- CDR files from a PABX system.
- CDR files from an upstream provider.

Jet's voice billing module includes a generic usage importer, which gives Universites, TAFEs and Schools the flexibility to add new data types, such as Video and Music management and billing.

Customised modules are available for Voice and VoIP billing including:

- Bill reconciliation
- Full A end to B end rating tables
- Directory services

Jet integrates with a number of systems, including Cisco's PABX and Atea's contained front end to present a full combined solution for voice and VoIP billing.

Jet also integrates with Ericsson and NEC PABX's along with a long list of other products. The more recent models also allow Jet to manage pin dialling for staff and students to ensure that all calls are tracked through user, not just location.

Jet's invoicing features include fixed-date or anniversary billing, automatic e-mailing of PDF invoices as well as a range of printable invoice export formats. Invoices are customisable, and can include line items generated from outside the Jet system. Jet supports real-time credit card processing via a range of payment gateways, and provides automated actions on overdue accounts.

Obsidian provides integration with external systems with easy .csv exports of all reports. This means that Jet can export financial reports to the University/ TAFE's financial system, reducing the amount of administrative work.

Problem

Even if I could allocate quotas to users, I don't have any way to enforce them.

Solution

Jet incorporates a range of event triggers, including the ability to perform actions on reaching quota limits.

Problem

I don't have any way to apply quotas to users.

Solution

Jet can store a quota for every different resource type, bringing you unprecedented power to create flexible plans for your users.



Problem

We currently have no way to determine what proportion of network usage is attributable to each faculty or department within the university.

Solution

Jet allows users to be attributed to cost centres, allowing usage to be allocated to their primary department or faculty. Extensive reporting capabilities ensure that you have complete information at your fingertips.

Problem

We want to allocate multiple quotas – global, faculty, and individual – but don't have a way to manage them.

Solution

Jet supports the creation of multiple, cascading quotas. Quotas are decremented in a predetermined order. If applicable, students can purchase additional quota to top-up their account.

Problem

I can only map traffic down to the IP level. How can I track usage back to an individual user?

Solution

Jet knows the IP address of each authenticated user. Usage is stored against individual users, giving you an accurate picture of your network.

Problem

We want students to be able to purchase additional quota, but don't have a way to enable that.

Solution

Jet provides online payment facilities, allowing users to take payments and purchase additional account quota. A range of credit card payment gateways are supported. Scratch cards can also be produced allowing students to purchase quote without going through the online portal. Scratch cards can also be used for conferencing facilities enabling participants to purchase.

Contact Obsidian Consulting Group

Contact Obsidian Consulting Group for a quote for your Department, University, TAFE or School. With offices in Australia & the UK, Obsidian staff are available to come onsite and discuss your needs in detail, and provide a suitable, cost effective solution.

Web: www.obsidian.com.au Phone: Aust: +61 3 9355 7844 Email: sales@obsidian.com.au UK: +44 20 8816 7317

