DSL Solutions



Leverage the Lucent Advantage™ to deliver the high-value broadband services your customers demand, cost-effectively, over existing copper wiring

The benefits of DSL for your business:

- Offers a single platform for voice, data and video services
- Enables additional income from a growing spectrum of value-added services
- Leverages copper infrastructure and minimizes capital expenditures
- Enhances customer satisfaction and retention
- Helps you maintain a competitive edge
- Facilitates evolution to IP networking

The benefits of DSL for your residential and business customers:

- Provides data transport speeds hundreds of times faster than dial-up modems
- Maintains "always on" connections
- Supports business-class broadband capabilities at less cost than a T1 line
- Saves time and helps boost business productivity
- Keeps pace with a growing array of multimedia applications

Lucent Technologies
Bell Labs Innovations

DSL Solutions



DSL technology delivers the increased bandwidth that residential customers and small- to medium-sized businesses require for efficient networking, at a price they can afford.

By taking advantage of unused frequencies on existing voice lines, DSL can deliver data and video traffic at speeds up to 8 Mbps, with "always on" connections. These solutions offer cost-effective ways to support a growing range of online businesses and entertainment applications — from telecommunicating and videoconferencing to streaming multimedia and animated gaming.

Even if traditional voice services are your primary source of revenue and profit, data and video services are becoming increasingly important. With DSL Solutions that deliver the Lucent Advantage™, you can provide the broadband capabilities that more customers are demanding by building on your investment in copper infrastructure to support a growing range of online business and residential applications.

Lucent's DSL Solutions deliver the power and performance you need to support the latest broadband applications, the efficiency to keep operating costs down and the flexibility to meet your unique deployment needs — whether you are adding DSL to an existing network or building a new facility.

You can start small and "pay as you grow," or launch a full-scale DSL service — Lucent can provide a solution to meet your needs. As the demand for broadband intensifies, you can utilize DSL to keep your residential and business customers satisfied, while you bring in additional revenue from an array of exciting new applications.

Why your customers need DSL at home and the office

The Internet keeps growing in importance, because it's one of the most versatile, timesaving tools now available. But the Web's leading features often require high transport speeds to perform at their best, without interruptions and delays. As a result, your customers want faster ways to download files and Web pages—along with reliable support for leading-edge multimedia applications, such as Web conferencing, Internet radio and video-on-demand.

DSL is ideal for small to medium-sized businesses, as well as residential customers. It transforms standard phone lines into cost-effective, high-speed connections, and lets you deliver information hundreds of times faster than the typical 56 Kbps dial-up modem. For your subscribers, DSL service pays off with greater efficiency, enhanced performance and the convenience of always-on connections that eliminate the dial-up process.

- **Businesses** gain sophisticated network capabilities that save time, boost productivity and improve service to their customers. Previously, these high-bandwidth applications required an expensive T1 line that was out of the financial reach of most small to medium-sized companies. But now, DSL technology can offer higher-than-T1 speeds, at lower cost.
- **Residential customers** not only speed up their basic Web surfing with DSL — they can also take advantage of the latest communication and entertainment services (i.e., exchanging photos and graphics with friends, or enjoying popular entertainments like streaming audio, animated gaming or video-on-demand). With new multimedia applications emerging every day, DSL offers your subscribers a richer Web experience.

Keeping broadband costs down

With DSL solutions, your subscribers gain the broadband advantages they're looking for, while reducing costs in several ways. First, DSL eliminates the need to install special wiring, because it carries data and video over the same phone lines used for voice calls. Next, this technology allows subscribers to dial voice calls during high-speed Internet connections—as if two phone lines are available for the price of one. And a DSL home or business network can be set up to support multiple Internet connections simultaneously, for additional savings. In comparison, a home or business would require multiple phone lines in order to set up multiple simultaneous Internet connections, with each line adding more expense, yet delivering lower speeds.

How DSL pays off for you...

NEW REVENUE OPPORTUNITIES

DSL Solutions with the Lucent Advantage™ help you expand your revenue opportunities by supporting a full spectrum of high-value broadband services, for the widest range of subscribers. The Stinger® DSL Access Multiplexer and the AnyMedia® Access System both provide the power and performance you need, backed by the reliability of ATM QoS. That means you can support sophisticated applications such as Web conferencing, video-on-demand or rich multimedia gaming. Or you can offer premium service for a higher price. By making sure you can deliver the services your subscribers want most, you enhance customer satisfaction and retention, while you improve your bottom line.

COST-EFFECTIVE DEPLOYMENT

Lucent solutions help you keep costs down while delivering broadband services where they're needed most. With the Stinger® DSL Access Multiplexer portfolio, you select the model you need to deliver service efficiently, with minimal capital expenditure. For example, the Stinger® FS+ is a high-density, cost-competitive Central Office-based solution, while the compact MRT helps you cost-effectively reach out to underserved communities — delivering DSL from remote terminals in the neighborhood or inside office buildings and apartment complexes.

The AnyMedia® Access System enables DSL support on the same platform that delivers POTS, which gives you a fast, easy way to start integrating your narrowband and broadband services. To add broadband, you insert a DSL line interface card. You can adjust the mix of services quickly in response to customers' changing demands. This solution offers a highly cost-effective way to retain subscribers and stay ahead of your competition. By allowing you to add new technologies incrementally, it also offers a seamless path to packet networks.

HIGH-QUALITY CPE

The CellPipe® is a cost-effective, high-performance DSL customer premises equipment (CPE) device. Based on ATM, it has the QoS capabilities to support integrated services. It supports reliable IP routing and IP multicast to optimize bandwidth for video services. Its robust management features streamline operations.



Why DSL is important: Broadband Internet access has nearly tripled in the U.S. since February 2000.

(Source: Garner Dataquest)

We have products, software and services that enable you to offer DSL services quickly and profitably. DSL solutions that deliver the Lucent Advantage™ consist of:

The Stinger® DSL Access Concentrator portfolio

Every Stinger® DSLAM is built on an advanced ATM switching architecture to maintain highly reliable performance. Modular design lets you build in the special features you want—such as IP routing and multicasting, broadband remote access server (BRAS) functionality or copper loop testing. High-density models are available for Central Office deployments, along with micro-remote terminals to extend your DSL reach to underserved subscribers.

Navis® Management System

Provides streamlined, centralized management.

The AnyMedia® Access System portfolio

This multi-service solution lets you deliver DSL and narrowband services on a single integrated platform. Using plug-and-play line interface cards, you can quickly adjust your mix of services to meet growing demand for DSL—with minimal investment. One element management system manages both DSL and voice service, resulting in significant reduction in operations expense.

The CellPipe® portfolio

These bridge/router solutions provide ideal CPE for both the Stinger® and AnyMedia® product lines — supporting reliable, high-quality performance end-to-end.

Lucent Worldwide Services

Discover better ways to make your DSL network more efficient, secure and cost-effective. Lucent's experienced consultants offer a broad range of world-class planning, integration, deployment, operations and maintenance services.

Leverage the Lucent Advantage™ with your enterprise customers

Now you can launch a full spectrum of data, voice, and video offerings, while maintaining rock-solid performance for your existing services. Award-winning Lucent DSL solutions put broadband capabilities wherever you need them, with the most adaptable, cost-effective platforms on the market. To enhance performance further, add the capabilities of Lucent Worldwide Services. We can design, implement and integrate DSL solutions into your network, helping you generate revenue more quickly. LWS is able to utilize proprietary network design, security and optimization tools developed by Bell Labs to support faster, better decisions. Talk to your Lucent representative about DSL products that deliver the Lucent Advantage™ and offer your customers the most cost-effective and easily deployed broadband solutions available today.

To learn more about DSL Solutions with the Lucent Advantage™, please contact your sales representative, or call 1-888-426-2252. You can also visit our web site at http://www.lucent.com/dsl.

This document is provided for planning purposes only and does not create, modify or supplement any warranties which may be made by Lucent Technologies relating to the products and/or services described herein. The publication of information contained in this document does not imply freedom from patent or other protective rights of Lucent Technologies or other third parties.

Stinger, AnyMedia, CellPipe and Navis are registered trademarks of Lucent Technologies Inc.

Lucent Advantage is a trademark of Lucent Technologies Inc.

Copyright © 2003 Lucent Technologies Inc.

All rights reserved

Lucent Enabled Services/DSL v2 10/03

Lucent Technologies
Bell Labs Innovations