

SpeedStream® 5260

ADSL LAN Modem Installation Guide



Part No. 007-5260-003, Rev C

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A. Prior to returning a product under this warranty, the end user must first contact EFFICIENT NETWORKS by sending an email to support@efficient.com to obtain a return materials authorization (RMA) number. RMAs are issued between 8:00 a.m. and 5:00 p.m. Central Time, excluding weekends and holidays. The end user must provide the serial number(s) of the products in order to obtain an RMA.

B. After receiving an RMA, the end user shall ship the product, including power supplies and cable, where applicable, freight or postage prepaid and insured, to EFFICIENT at 4849 Alpha Road, Dallas Texas 75244, U.S.A. Within five (5) days notice from EFFICIENT, the end user shall provide EFFICIENT with any missing items or, at EFFICIENT's sole option, EFFICIENT will either (a) replace missing items and charge the end user or (b) return the product to the end user freight collect. The end user shall include a return address, daytime phone number and/or fax. The RMA number must be clearly marked on the outside of the package.

C. Returned Products will be tested upon receipt by EFFICIENT. Products that pass all functional tests will be returned to the end user.

D. EFFICIENT will return the repaired or replacement Product to the end user at the address provided by the end user at EFFICIENT Network's expense. For Products shipped within the United States of America, EFFICIENT will use reasonable efforts to ensure delivery within five (5) business days from the date received by EFFICIENT. Expedited service is available at additional cost to the end user.

E. Upon request from EFFICIENT, the end user must prove the date of the original purchase of the product by a dated bill of sale or dated itemized receipt.

5. Limitations.

The end user shall have no coverage or benefits under this limited warranty if the product has been subject to abnormal use, abnormal conditions, improper storage, exposure to moisture or dampness, unauthorized modifications, unauthorized repair, misuse, neglect, abuse, accident, alteration, improper installation, or other acts which are not the fault of EFFICIENT, including acts of nature and damage caused by shipping.

EFFICIENT will not honor, and will consider the warranty voided, if: (1) the seal or serial number on the Product have been tampered with; (2) the Product's case has been opened; or (3) there has been any attempted or actual repair or modification of the Product by anyone other than an EFFICIENT authorized service provider.

The limited warranty does not cover defects in appearance, cosmetic, decorative or structural items, including framing, and any non-operative parts.

EFFICIENT's limit of liability under the limited warranty shall be the actual cash value of the product at the time the end user returns the product for repair, determined by the price paid by the end user for the product less a reasonable amount for usage. EFFICIENT shall not be liable for any other losses or damages.

The end user will be billed for any parts or labor charges not covered by this limited warranty. The end user will be responsible for any expenses related to reinstallation of the product.

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Efficient Networks, Inc.
4849 Alpha Road
Dallas, TX 75244
U.S.A.
Attn: Customer Service

Introduction

About the 5260 LAN Modem

The SpeedStream 5260 ADSL LAN modem provides high-speed connectivity between a local Ethernet network segment and an asymmetric digital subscriber line (ADSL) segment.

The ADSL segment provides for a single asynchronous transfer mode (ATM) permanent virtual circuit (PVC) used for connectivity to wide area network (WAN) devices.

The 5260 is designed to “plug and play.” Setup of the 5260 is as simple as connecting it to a PC that is equipped with an Ethernet adapter card or to a hub on an Ethernet LAN and then connecting it to a DSL wall jack.

ADSL Data Rate Support

The 5260 uses discrete multi-tone (DMT) data transmission technology. When the unit is powered on, it will connect to your service provider. Once this connection is established, the unit will negotiate the highest possible data rate. This process is transparent to the user and rates achieved are dependent upon the data rates supported by your service provider.

What Systems are Supported?

The 5260 can be connected to any 10Base-T Ethernet networking device, such as a hub, PC, workstation, or laptop, equipped with an Ethernet network interface card (NIC). All operating systems are supported. The 5260 also requires a telephone line that supports ADSL.

5260 Configuration Settings

The following table shows the factory-default configuration of the 5260. These settings are not user-configurable.

ATM Interface	<ul style="list-style-type: none">• One Permanent Virtual Circuit supported• F4/F5 loopback cells supported• Multi-Protocol Over ATM AAL5 (MPOA) per RFC 2684 Multiprotocol Encapsulation over ATM Adapter Layer 5• Logical Link Control (LLC)/ Subnetwork Access Protocol (SNAP) encapsulation over ATM per RFC 1483, Multiprotocol Encapsulation over ATM Adapter Layer 5
Ethernet Interface	10 Mbps half duplex
Bridging	<ul style="list-style-type: none">• LLC encapsulation of Ethernet packets to/from the ATM interface• LLC duplication supported (for frames whose source MAC address and destination MAC address are the same, learns address, but does not forward)• Supports learning of up to 255 MAC addresses

Installation Requirements

To install the 5260 ADSL LAN modem, you will need the following:

- A computer equipped with an Ethernet network interface card (NIC) or an Ethernet hub
- A DSL-ready telephone line

Package Contents

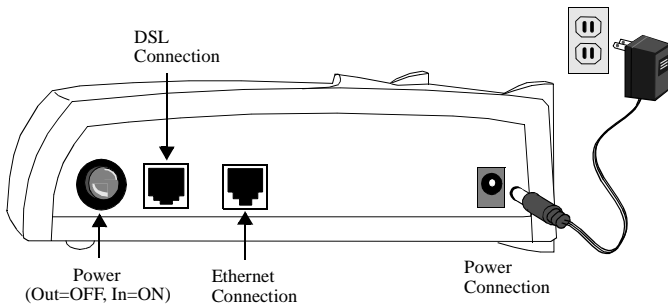
Your package should contain the items listed below. If anything is missing or damaged, please contact the dealer from whom the equipment was purchased.

- 5260 LAN modem unit
- Power supply
- One RJ11 (4pin) unshielded twisted pair (UTP) cable (for the DSL connection)
- One RJ45 (8 pin) UTP straight-through cable (for direct connection to a PC with a NIC installed)
- *Installation Guide, Safety and Certification* booklet, and *Release Notes* (if applicable).

Installation Instructions

NOTE: The labels for the back panel of the 5260 are located on the underside of the unit.

- 1 Be sure the power button is in the OFF position.
- 2 Plug the power cable jack into the power connector in the back of the unit. Plug the other end into a power outlet.



- 3 Connect the Ethernet port (**ENET**) of the unit to the Ethernet port of your computer using the gray-colored RJ45 cable provided. To connect the Ethernet port to a hub, use a crossover cable (not included).
- 4 Use the RJ11 cable to connect the 5260's **DSL** port to the DSL service port (wall jack).
- 5 Press the power button to turn on the unit.

5260 Front Panel

The 5260 is equipped with four lights on the front panel: the System LED (**sys**), ATM LED (**atm**), DSL LED (**dsl**), and Ethernet LED (**enet**).

- 1 First, the **sys** LED will come on. It turns solid green when the unit has finished passing diagnostic tests.
- 2 The **enet** LED will turn green when ethernet becomes active and flash green when Ethernet traffic is detected.
- 3 The **dsl** LED will blink yellow/green alternately while the 5260 searches for a far-end signal. If the **dsl** LED remains in this state for more than a minute, check your cable connection. Once a far-end signal is detected, the unit will begin negotiation of the optimum transmission rate and attempt to train the line at the highest rate available. The **dsl** LED will blink green/unlit alternately while training. This process usually only takes a minute, but if renegotiation of data rates is necessary, it may take several minutes during which time the 5260 is not yet operational. The **dsl** LED will show solid green when it is ready to transmit data.
- 4 The **atm** LED will flash green indicating traffic flow on the WAN interface.

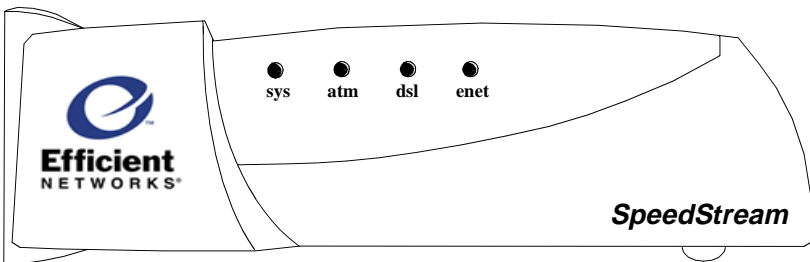


Table 1 5260 LED Indicator Descriptions

LED	Unlit	Red	Yellow	Green
sys	Power off	Power on self test (POST) error occurred; call customer support to report problem	Power on self test (POST) in progress	Normal system operation
atm	<ul style="list-style-type: none"> • Power off • Line not yet trained or no ATM cell delineation 	ATM failure	N/A	Blinking: ATM cell delineation and traffic flow Solid: ATM ready
dsl	<ul style="list-style-type: none"> • Power off • Power on self test (POST) in progress 	<ul style="list-style-type: none"> • DSL error has occurred • LAN modem is not configured correctly 	Line not yet trained Blinking green/yellow: Searching for far-end signal	Blinking: Attempting to train line Solid: Line is trained and ready for data traffic
enet	<ul style="list-style-type: none"> • Power off • No Ethernet link detected; check cable connection, ensure correct cable was used. 	Power on self test (POST) error occurred; call customer support to report problem	N/A	Blinking: Ethernet traffic flow Solid: Ethernet ready

SpeedStream 5260 LAN Modem Specifications

Size	5.5W in. x 7D in. x 1.5H in. (14W cm x 17.8D cm x 3.8H cm)
Weight	1.25 lbs Bridge Only (0.57 Kg)
Power	Wall-mount 12 watt AC to DC adapter. 11-18vDC @ 1.1 amp output. AC input to meet country specific input requirements. North America: 115 Vac, 60 Hz, .2 amp max Europe: 220 Vac, 50 Hz, .1 amp max Other: 230 Vac, 60 Hz, .1 amp max
Temperature	Operating: 0 to 40° C Non-Operating, storage: -10 to 85° C
Humidity	10% to 90% noncondensing
Ethernet Interface	
Cabling	Unshielded Twisted Pair (UTP) Category 3, 4, or 5 (IEEE 802.3 Standard Compliant)
Connector	Eight-contact, shielded RJ45
DSL Interface	
Connector	Two-contact, shielded RJ11 (pins 3 & 4) isolation per IEC 950
Operating distance	18,000 feet maximum on standard 26 AWG copper pair wire

