



corporate
pc



hp vectra
vl600

corporate pc you can count on

You can depend on HP corporate PCs to optimize your IT environment and reduce cost of ownership through comprehensive software image stability, manageability, supportability and security programs.

- **Software image stability:**

Adapt your standard software image more quickly and less frequently on HP corporate PCs.

- **Easy to manage:**

HP corporate PCs with HP Tootools provide the inventory information you need, and the most efficient way to decrease desk-side visits.

- **Easy to support:**

HP corporate PCs are easy to diagnose, troubleshoot and service, greatly empowering your help desk resources and providing a better user experience.

- **Security ready:**

HP corporate PCs reduce security risks.

the hp vectra vl600

- **The mainstream performance corporate PC:**

The performance and bandwidth to take advantage of tomorrow's emerging corporate applications.

at a glance

new technology highlights

- Next-generation technology based on Intel® 820 chipset
- Latest Intel® processors, starting with Pentium® III 733 MHz, 800EB MHz, 866 MHz, 933 MHz, or 1000 MHz processor with 133 MHz front side bus (FSB)
- New Rambus® Direct (RDRAM®) memory—128 MB expandable to 512 MB
- New Ultra ATA/66 SMART II 10.0 GB (5400rpm), 15.0 GB (7200rpm), or 30.0 GB (7200rpm) hard disk drive
- Choice of high-performance graphics solutions:
 - New Matrox Millennium G400 AGP 4X graphics card with 32 MB SGRAM memory
 - New Matrox Millennium G400 AGP 4X DualHead card with 16 MB SGRAM memory
 - New Matrox Millennium G250 AGP 2X graphics card with 8 MB SGRAM memory, upgradable to 16 MB
- Wide range of optical storage devices:
 - HP 48X Max-speed IDE CD-ROM drive
 - HP 8X Max-speed IDE DVD-ROM drive with video playback and DVD-RAM compatibility
 - HP 4X Max-speed IDE CD-Writer Plus drive
- Two serial ports, one parallel port, two Universal Serial Bus (USB) ports, audio connectors (stereo in, stereo out, microphone in)
- 16-bit stereo full duplex PCI audio integrated
- Choice of operating systems:
 - Windows NT® Workstation 4.0
 - Windows® 2000 Professional
 - Windows® 98SE
 - Windows® 95
- Linux Enabled:
 - Certified by Linuxcare (TurboLinux, RedHat, SuSE, Caldera)
- Highly serviceable packages:
 - 5-shelf, 7-slot desktop
 - 6-shelf, 7-slot minitower

pc system features

package	<ul style="list-style-type: none">▪ Choice of two different packages:<ul style="list-style-type: none">– Desktop (5 shelves, 7 slots)– Minitower (6 shelves, 7 slots)▪ Easy to expand, easy to open, easy to service and repair
processor	<ul style="list-style-type: none">▪ Choice of processors:<ul style="list-style-type: none">– Intel® Pentium® III 733 MHz, 800EB MHz, 866 MHz, 933 MHz, or 1000 MHz processor with 133 MHz FSB▪ Includes Advanced Configuration and Power Interface (ACPI)
chipset	<ul style="list-style-type: none">▪ Intel® 820 chipset
cache	<ul style="list-style-type: none">▪ Processor dependent:<ul style="list-style-type: none">– 256 KB Level-2 advanced transfer cache (full speed)
memory	<ul style="list-style-type: none">▪ 128 MB Rambus Direct RAM (RDRAM®):<ul style="list-style-type: none">– Expandable to 512 MB through two RIMM™ sockets– Support for ECC memory– Auto detection of memory modules via serial presence detect (SPD)
hard disk drive	<ul style="list-style-type: none">▪ Choice of hard disk drive technologies:<ul style="list-style-type: none">– 10.0 GB (5400rpm), 15.0 GB (7200rpm), or 30.0 GB (7200rpm) Ultra ATA/66 hard disk drive:<ul style="list-style-type: none">➢ SMART II (self-monitoring analysis and reporting technology)➢ 66 MB/s transfer rate maximum
hard disk controller	<ul style="list-style-type: none">▪ PCI Bus Master Ultra ATA controller:<ul style="list-style-type: none">– Support for Ultra ATA/66, PIO (up to Mode 4), DMA Mode 2, and Ultra DMA Mode 2– Up to four Fast-IDE devices supported on desktop and minitower models, including two hard disk drives and two ATAPI devices (CD-ROM, DVD-ROM, or CD-RW drive or any other ATAPI-device)▪ PCI Ultra Wide SCSI controller on Ultra Wide SCSI models
floppy disk drive	<ul style="list-style-type: none">▪ Third-height, 3.5-inch, 1.44 MB floppy disk drive preinstalled.
optical storage	<ul style="list-style-type: none">▪ Choice of CD-ROM, DVD-ROM and CD-RW solutions:<ul style="list-style-type: none">– HP 48X Max-speed IDE CD-ROM drive– HP 8X Max-speed IDE DVD-ROM drive– HP 4X Max-speed IDE CD-Writer Plus drive (Adaptec Easy CD Creator and DirectCD software included)
mass storage shelves	<ul style="list-style-type: none">▪ Desktop—five shelves:<ul style="list-style-type: none">– One front-accessible with standard, third-height, 3.5-inch floppy disk drive preinstalled– Two front-accessible for standard, half-height, 5.25-inch devices (one with optical device drive preinstalled)– Two internal with standard, third-height devices (one with 3.5-inch hard disk drive preinstalled)▪ Minitower—six shelves:<ul style="list-style-type: none">– One front-accessible with standard, third-height, 3.5-inch floppy disk drive preinstalled– Three front-accessible for standard, half-height, 5.25-inch devices (one with optical device drive preinstalled)– Two internal for standard, third-height devices (one with 3.5-inch hard disk drive preinstalled)
total expansion slots	<ul style="list-style-type: none">▪ Seven slots:<ul style="list-style-type: none">– Four PCI (LAN adapter preinstalled in one PCI slot on LAN models)– Two ISA (ISA cards supported up to card height of 106 mm)▪ One AGP (occupied by Matrox Millennium graphics card)

pc system features (continued...)

audio subsystem

- 16-bit stereo PCI audio recording and playback
 - Full duplex audio
 - DirectX 6 compliant (Windows® 95/98 only)
 - Headset
 - Available audio drivers: Windows NT® Workstation 4.0, Windows® 95, Windows® 98, Windows® for Workgroups, OS/2 Warp 4.0
-

built-in i/o

- One 25-pin parallel port (ECP/EPP bidirectional Centronics supporting IEEE 1284)
 - Two 9-pin serial ports (16550 UART)
 - Two PS/2 connectors for keyboard and mouse (mini-DIN)
 - Two stacked Universal Serial Bus (USB) ports for easy reconfiguration, attachment, and hot swapping of external peripherals
 - One 15-pin VGA connector
 - Audio ports (stereo in, stereo out, microphone in)
 - One RJ-45 Ethernet port on all LAN models (10/100 Base-T)
-

upgradability

- BIOS in flash EEPROM for convenient BIOS upgrades
- Memory upgradable using Rambus Direct (RDRAM®) RIMM™s
- Hard disk storage upgradable up to 2 x 30.0 GB

graphics subsystem

video graphics

Matrox Millennium G400 AGP 4X SingleHead graphics card with video accelerator on AGP bus. With 32 MB of SGRAM video memory, it can be made DualHead capable (supporting two independent monitors on the same AGP card) by installing an add-on module in the graphics card. This option is only available from and supported by Matrox Corp.

- Outstanding 2D and Direct 3D performance, speed, and visual quality
- Fully DirectX 6 compliant with Environment Mapped Bump Mapping for maximum 3D realism
- 300 MHz UltraSharp RAMDAC for flicker-free displays
- Vibrant color quality—32-bit rendering, texturing, and Z-buffering
- 256-bit dual bus architecture
- DDC2b support for Plug-&Play detection of monitor

▪ **Matrox Millennium G400 AGP 4X DualHead* graphics card** with video accelerator on AGP bus. Available from HP as an accessory, this graphics card is capable of supporting two connected independent monitors on the same AGP card and comes installed with 16 MB of SGRAM video memory.

- Outstanding 2D graphics performance and best professional DirectX graphics
- Dual-monitor support in a single AGP slot
- Integrated 300 MHz RAMDAC with UltraSharp technology for highly saturated and separated colors
- Matrox DualHead Display technology and PowerDesk manager
- DDC2b support for Plug-&Play detection of monitor
- 256-bit dual bus architecture; true 128-bit external bus to video
- Vibrant color quality—32-bit rendering, texturing, and Z-buffering
- 16/10 monitor support
- Bilinear, trilinear, and anisotropic filtering
- Floating-point 3Dcsetup engine
- DirectX6 and open GL hardware acceleration

Matrox Millennium G250 AGP 2X graphics card with video accelerator on AGP bus.

- Best price/performance 2D graphics card
- Optimized 2D performance
- Support for accelerated 3D graphics
- 128-bit dual bus architecture
- 250 MHz RAMDAC for flicker-free displays
- DDC2b support for Plug-&Play detection of monitor

* Note: Available as an option.

memory

- 32 MB SGRAM on Matrox Millennium G400 AGP 4X SingleHead models
- 16 MB SGRAM on Matrox Millennium G400 AGP 4X DualHead models
- 8 MB SGRAM, upgradable to 16 MB, on Matrox Millennium G250 models

available graphics drivers

- Windows NT® Workstation 4.0, Windows® 2000, Windows® 98, Windows® 95, Windows® for Workgroups 3.11 and OS/2 Warp 4.0
- Drivers may be preloaded or available from HP desktop PC support web site: <http://www.hp.com/go/vectrasupport>

graphics subsystem (continued...)

maximum resolutions

Matrox Millennium G400 4X SingleHead and DualHead graphics system

2D resolutions and 3D resolutions

Supports the following maximum resolutions and colors:

color Palette	maximum 2D display area	maximum 3D display area	double-buffered+ 16-bit Z	Double-buffered+ +32-bit Z
8-bit	2048 x 1536	—	—	—
15- or 16-bit	2048 x 1536	2048 x 1536	1800 x 1440	1600 x 1200
24-bit	2048 x 1536	—	—	—
32-bit	2048 x 1536	1600 x 1200	1280 x 1024	1280 x 1024
Refresh rates				

Supports the following maximum non-interlaced refresh rates and the resolutions listed here:

color Palette	primary screen (8-/16-/24-/32-bit)	secondary screen (with add-on module) (16-/32-bit)
4:3 aspect ratio		
640 x 480	200Hz	200Hz
800 x 600	200Hz	200Hz
1024 x 768	160Hz	115Hz
1280 x 1024	120Hz	75Hz
1600 x 1200	100Hz	43Hz
1600 x 1280	90Hz	43Hz
1800 x 1440	80Hz	—
1920 x 1440	75Hz	—
2048 x 1536	70Hz	—
16:9 aspect ratio		
1600 x 1024	120Hz	43Hz
1920 x 1035	100Hz	—
1920 x 1080	100Hz	—
1920 x 1200	90Hz	—

Matrox Millennium G250 AGP 2X graphics card

Supports the following maximum non-interlaced refresh rates at the resolutions listed here:

resolutions	256 colors (8-bit)	32K colors (16-bit)	16.7M colors (24-bit)	16.7M colors (32-bit)
640 x 480	60–200Hz	60–200Hz	60–200Hz	60–200Hz
800 x 600	60–180Hz	60–180Hz	60–180Hz	60–180Hz
1024 x 768	60–140Hz	60–140Hz	60–140Hz	60–140Hz
1152 x 864	60–120Hz	60–120Hz	60–120Hz	60–120Hz
1280 x 1024	60–100Hz	60–100Hz	60–100Hz	60–90Hz
1600 x 1200	60–90Hz	60–90Hz	60–85Hz	60–65Hz
1920 x 1200	60–76Hz	60–76Hz	60–70Hz	—
1800 x 1440	60–70Hz	60–70Hz	60–65Hz	—

software

operating system

- **HP supported operating systems:**
Microsoft Windows® 2000 Professional, Windows NT® 4.0 Workstation, Windows® 98 Second Edition, Windows® 95
 - **Other certified operating systems:**
Novell Client for Microsoft Windows NT® 4.0 Workstation, Linux distributions: RedHat, TurboLinux, SuSE, and Caldera
- More information about the Linux operating system is available on the HP desktop PC web site:
<http://www.hp.com/desktops/linux>
-

provided software

- **Operating system:**
Microsoft Windows® 2000 Professional or Windows NT® 4.0 Workstation, Microsoft Windows® 98 Second Edition or Windows® 95, depending on model*
- HP Tootools agent
- HP Diagtools hardware diagnostic solution
- HP safe off (not available with Microsoft Windows® 2000 Professional)
- 3Com LAN driver
- HP soft power down, HP lock, HP energy saver for Windows NT® 4.0 Workstation
- Every unit includes in the box:
 - HP image creation and recovery CD-ROM (OS installation and hard disk preparation)
 - HP image library and diagnostics CD-ROM (drivers and utilities installation and diagnostics)

* Note: End user must make one-time selection between Windows® 2000 and Windows NT® 4.0, Windows® 98 and Windows® 95. If end user desires rejected product(s) after selection is made, end user must require and pay for rejected product(s) separately. A one-time selection only applies where two operating systems are preloaded.

software available from the web

- HP Tootools device manager <http://www.hp.com/tootools>
- HP LAN card ready drivers available from HP desktop PC support web site:
<http://www.hp.com/go/pcsupport>

communication features

ethernet LAN interface	<ul style="list-style-type: none">▪ 3Com Fast Etherlink 10/100BASE-TX▪ Wake on LAN support▪ Low CPU usage releases resources for local user tasks (DMA)
preconfigured networking	<ul style="list-style-type: none">▪ Ultra-fast installation▪ Remote Boot protocols in system BIOS (3Com): RPL, NetWare, BootP, PXE/DHCP
remote booting	<ul style="list-style-type: none">▪ 3Com Managed PC Boot agent multiprotocol firmware to enable pre-boot capabilities in a networked environment:<ul style="list-style-type: none">– 3Com Managed PC Boot agent is included in the BIOS.– Enables remote automated installation and pre-OS desktop management– Supports multiple protocols (DHCP, BootP, PXE, NCP/IPX, and RPL)– Compliant with today's industry standards: Wired for Management (WfM) 2.0 and PC 99
network administration guide	<ul style="list-style-type: none">▪ Information on remote booting and network setup in all supported environments available on web http://www.hp.com/go/vectrasupport
internet ready	<ul style="list-style-type: none">▪ Microsoft Internet Explorer
available lan drivers	<ul style="list-style-type: none">▪ Novell NetWare 3.x/4.x clients; Windows® 2000 Professional, Windows NT® 4.0 Workstation, Windows® 98 Second Edition, Windows® 95▪ Latest LAN information and drivers available from HP desktop PC support web site http://www.hp.com/go/vectrasupport
lan card ready program	<ul style="list-style-type: none">▪ Tested with leading Ethernet and Token Ring adapters▪ Wake on LAN for selected third-party LAN cards in some operating system environments▪ Detailed setup instructions and HP-tested drivers for a wide range of LAN cards from 3Com, IBM, Madge, Intel®, D-Link, and Olicom available on web at: http://www.hp.com/go/vectrasupport

ergonomics

ergonomic and environmental design

- Video modes supporting non-interlaced resolutions up to 1600 × 1200 at ergonomic refresh rates up to 85Hz
- EPA Energy Star® and Blue Angel certified*
- Energy-saving variable-speed fan for temperature control
- Large selection of MPRII—and EPA Energy Star—certified displays
- CFC-free manufacturing process; single plastic for easy recycling
- ACPI (Advanced Configuration and Power Interface) and APM (Advanced Power Management) compliant
- HP energy saver, HP safe off, HP soft power down
- Optimized desk-space-saving desktop package
- Control panel keeps user aware of PC status:
 - On/Off switch integrated in the surface to avoid accidental power-off
 - On/Off green LED (blinks in sleep mode)
 - Hard disk drive activity LED
 - Lock LED

* Note: As an Energy Star partner, HP has determined that this product meets the Energy Star guidelines for energy efficiency (on appropriate models).

regulatory compliance and approvals

safety approvals

- CSA C22.2 No. 950-M89 (Canada)
- UL 1950 listed (USA)
- NOM-019-SCFI-1993 (Mexico)
- IEC 60950: 1991 +A1 +A2 +A3 +A4 International)
- 73/23/EEC Low Voltage Directive amended by Directive 93/68/EEC
- EN 60950: 1992 +A1 +A2 +A3
- TÜV-GS Mark (Germany)
- PSB (Singapore)
- GB 4943-1995 (China)
- Eastern countries compliance

electromagnetic compatibility

- FCC Part 15 Class B (USA)
- ICES-003 Class B (Canada)
- European EMC Directive 89/336/EEC amended by Directive 93/68/EEC
- GB 9254-1988 (China)
- VCCI Class B (Japan)
- RRL Class B (Korea)
- AS/NZS3548 Class B (Australia-New Zealand)
- BSMI CNS13438 Class B (Taiwan)
- EASTERN countries compliance
- CISPR 22: 1993 (International)

ergonomics

- TÜV-GS Mark (Germany)
- ENERGY STAR Certification (USA)
- Blue Angel Certification (European Countries)

pc specifications

physical characteristics

		metric	non-metric	
system	dimensions (without keyboard)	desktop	43.5 cm x 43 cm x 13.5 cm.	17.1 in. wide x 16.9 in. deep x 5.3 in. high.
		minitower	20.6 cm x 45.5 cm x 46.9 cm.	8.1 in. wide x 17.9 in. deep x 18.5 in. high
	weight (without keyboard)	desktop	10 kg.	22 lb.
		minitower	13.4kg.	29.5 lb.
keyboard	dimensions (standard)	46.4 cm x 17.8 cm x 3.3 cm (5.1 cm standing).	18.3 in. wide x 7.0 in. deep x 1.3 in. high (2.0 in. standing).	
	dimensions (multimedia)	47.5 cm x 18.5 cm x 5.0 cm (7.3 cm standing).	19.0 in. wide x 7.4 in. deep x 2.0 in. high (2.9 in. standing).	

environmental conditions

		metric	non-metric
temperature	operating	10° to 35° C	50° to 95° F
	non-operating	-40° to 70° C	-40° to 158° F
humidity	operating	15% to 80% RH	15% to 80% RH
	non-operating	8% to 85% RH (noncondensing) at 40°C	8% to 85% RH (noncondensing) at 104°F

electrical characteristics

input voltage	power supply: manually switch-selectable on some models	110–127 Vac/200–240-Vac	
	input voltage	100–127 Vac/200–240-Vac.	
	frequency	50 Hz/60 Hz	
power supply	continuous	desktop	minitower
		120W	200W
Power consumption		desktop	minitower
	typical	<=37W	<=41W
	standby (Windows® 95 and Windows® 98 only)	<=30 W	<=30W
	off	<=4W	<=4W

acoustic emission

sound level (LwA)	typical (desktop and minitower)	<= 37dBA
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service and support

warranty

- Three-year on-site international limited hardware warranty and a full range of flexible warranty options.
 - Next business day on-site service. For full details, see HP hardware warranty statement provided with your product. You can upgrade your warranty terms up to 90 days after purchase
-

support

24 hours a day, 7 days a week, there is always a way to reach HP support:

- Web technical support including BIOS and driver updates, white papers and additional product information
- HP 3-year free hardware diagnostic phone support (24 hours a day, 7 days a week in U.S. Standard business hours in other regions)
- For more information, go to <http://www.hp.com/go/pcsupport> and click on Assistance to find the telephone number of the HP customer care center near you

software image stability

Adapt your standard software image more quickly and less frequently on HP corporate PCs.

image creation and recovery cd-rom

- HP Vectra PCs come with an image creation and recovery CD-ROM in the box. This CD-ROM contains the operating system, drivers, and system utilities, and allows you to:
 - Reload the operating system only
 - Recover HP preloaded software
 - Configure the hard disk drive (FAT 16, FAT 32, or NTFS)
 - Run the HP hardware diagnostic tool (HP Diagtools)
-

image library cd-rom

- The image library CD-ROM contains HP drivers and system software pre-packaged for unattended install. These packages can be used locally or distributed with Microsoft scripting tools or SMS. Available on the web from <http://www.hp.com/go/vectrasupport> (shipping and handling fee applies)
-

image stability

- Program tightly controls PC revisions, enabling you to create a single software image for easy deployment across all your new HP Vectra PCs
-

proactive notification

- Informs you of the changes by e-mail, letting you decide whether to upgrade your PCs

More details on HP software stability can be obtained at: <http://www.hp.com/go/pcstability>

easy to manage

HP corporate PCs with HP Tootools provide the inventory information you need, and the most efficient way to decrease desk-side visits.

inventory management

Remote and central inventory

- Auto-discovery of devices
- Automated collection of inventory
- PC search and selection
- Standard reports (including asset location, configuration)
- Report of Microsoft Windows® 2000 Professional-ready PCs (this report includes PCs matching the minimum hardware requirements and that are certified)
- Access to detailed configuration information
- Customizable asset string

Performance Management

- Resources bottleneck analysis (requires HP Tootools Value Pack D7160A)
-

Configuration management

Remote boot control

- Scheduled system reboot
- Scheduled system power-off
- Scheduled system power-on

Remote and central system software updates

- HP Tootools agents deployment and update (agent deployment is only available with Windows NT® 4.0 Workstation or Windows® 2000 Professional, within the same Windows NT® domain)
 - BIOS update
 - Drivers update (video, hard disk drive, and LAN card)
 - Selected HP Laserjet printers installation
 - Hardware diagnostics deployment and update (HP Diagtools)
-

compliance with industry standards

Desktop Management Interface (DMI)

- Provided with Tootools agent for Windows® 9x and NT 4.0 models. HP PCs have the most comprehensive DMI implementation in the industry:
 - DMI 2.0s compliant.
 - HP DMI instrumentation for PC system information, monitor, LAN cards, security, devices, drivers, bios, end-user information and more ...
 - Support for all DMI management application including Intel LANDesk, McAfee ZAC and more ...
- HP Tootools can uniquely:-
 - Power on DMI on HP and non-HP PCs
 - Read DMI information from HP and non-HP PCs
 - Report DMI alerts from HP and non-HP PCs
 - Control DMI hardware monitoring from HP and non-HP PCs

Windows® Management Interface (WMI)

- Provided with Tootools agent for Windows® 2000 models. HP PCs have the industry leading WMI implementation:
 - Full WMI instrumentation (equivalent to DMI).
 - Common Tootools agent and WMI instrumentation across Vectra, Kayak, Omnibook and e-PC.
- First to implement WMI instrumentation for Intel® IPSEC LAN card adaptors, HP Tootools can uniquely:-
 - Power on WMI on HP and non-HP PCs
 - Read WMI information from HP and non-HP PCs
 - Control WMI hardware monitoring from HP and non-HP PCs

Wired for Management (WfM)

- HP PCs are WfM 2.0 ready:
 - Provide easy remote power-on (RPO/WOL), remote power-off, and remote reboot.
- HP PCs are PXE 2.0 ready:
 - Provide easy Windows 2000 Workstation software deployment with Windows® 2000 remote installation service

easy to manage

complementary products

HP Tootools Value Pack

- The HP Tootools Value Pack expands the functionality of the free version of HP Tootools by including:
 - System Performance Advisor
 - CPU, memory, and disk I/O performance monitoring and trend analysis for Windows NT® 4.0 Workstation, Windows® 95, and Windows® 98 Second Edition systems
 - PC remote control (Symantec pcANYWHERE)
 - Custom reports and tables
 - Enhanced notification actions and action triggers
 - Most frequent alerts report
 - Third-party trap import/configuration
 - IP/MAC address file importing
 - Enhanced HP Tootools user password administration
 - Enhanced action-on-alerts (e-mail and paging)
 - Support for larger environments (up to 5,000 nodes per device manager server)

HP Tootools Bridges

- The HP Tootools bridges enable full integration with complementary applications. Bridges are available with the following applications:
 - HP Openview NNM (Windows NT® 4.0)
 - HP Openview NNM (HP-UX)
 - HP Openview NNM (Solaris)
 - Microsoft SMS 2.0/2.01
 - IBM Tivoli NetView (Windows NT® 4.0)
- Computer Associates Unicenter TNG (Windows NT® 4.0)

More details on HP PCs manageability and HP Tootools can be obtained at: <http://www.hp.com/go/pcmanageability>

easy to support

HP corporate PCs are easy to diagnose, troubleshoot and service, greatly empowering your help desk resources and providing a better user experience.

fault management

Fault diagnostics

- HP Diagtools (local and remote)
- Smart card and smart card reader diagnostics
- On-line video video and LAN cards (3Com, Intel, Matrox)

Remote and local alert reporting

- Power-On Self-Test (POST)
- Chassis intrusion detection
- IDE hard disk drive SMART failure warning

Resources monitoring

- CPU
- Memory
- Hard disk drives
- Networking card (requires SNMP services to be installed)

diagtools

HP Diagtools hardware diagnostics solution

- <http://www.hp.com/desktops/diagtools>
- Diagtools can diagnose hardware related problems
- It is preloaded on the hard disk drive in a hidden partition and can be launched during the boot
- Test results and system configuration are stored in a support ticket file for further access from your HP support provider if necessary

ease of setup and servicing

Highly serviceable packages—easy to open, repair, and expand, with built-in intuitiveness

- Features include:
 - Cover—tool-free, intuitive removal
 - System board—direct access to upgradeable parts (memory, microprocessor, I/O cards)
 - Hard disk drive—easy removal, direct access, tool-free removal of hard disk drive cage
 - Front-accessible drives—direct access, easy removal of tray
 - Embedded repair instruction labels
 - Easy upgrade of I/O cards—tool-free single I/O locker
 - No mounting accessories needed when installing accessory devices
 - Color-coded connectors for simplified PC assembly
- Hassle-free security with HP master pass key system—chassis lock with configurable master setting (optional)
- BIOS stored in flash EEPROM for fast and easy upgrades
- Setup program in flash ROM
- Automatic detection of major components at power-on
- Power-On Self-Test (POST) displays start up errors, suggests solutions
- All models are local area network (LAN) ready for easy integration into the network
- HP Diagtools: fast, easy-to-use hardware diagnostics for quick system troubleshooting
- LAN hardware diagnostics

More details on HP PCs supportability can be obtained at: <http://www.hp.com/go/pcsupportability>

security ready

HP corporate PCs reduce security risks.

physical security

- Boot Block BIOS Flash hardware protected
- HP physical security to protect PCs from theft:
 - Optional HP master pass key lock (lock must be purchased separately)
 - Kensington lock provision
 - Two BIOS level passwords
 - Chassis Intrusion detection

reliability

- To safeguard user files, protect against data losses, shut down the PC cleanly and securely, and to back up the power supply during short power failure, taking advantage of the hibernate mode of Windows® 2000 Professional:
 - HP Power Protection device
 - Compact device, fits into a 5.25" PC free expansion shelf

smart cards

- To secure desktop access, ensure secure storage and allow mobility, the HP Protecttools 2000 smart card provides:
 - Secure Logon by replacing Microsoft operating system logon with a PIN entry
 - Folder encryption
 - Digital certificate storage onto Smart Card (CAPI, PKCS#11)

secure network communication

- To secure your links without losing performance and maintaining throughput:
 - Optional Intel Pro/100S Management Adapter, 10BaseT, 100 Base TX LAN interface
 - With network encryption co-processor to off-load security encryption from the PC to the adapter, reducing processor utilization and maximizing network performance

security management

Remote and central system boot configuration

- Enable/Disable start from hard disk
- Enable/Disable start from floppy disk
- Enable/Disable start from CD-ROM drive
- Enable/Disable start from network drive
- Enable/Disable Remote Power On and Wake on LAN

Remote and central security configuration

- Enable/Disable floppy disk drive
- Enable/Disable writing on floppy disk drive
- Enable/Disable CD-ROM, DVD-ROM, CD-RW drives (requires Windows® 2000 Professional or Windows NT® 4.0 Workstation)
- Enable/Disable serial and parallel ports
- Enable/Disable USB ports

Remote and central security control

- Complete system lock
- System protection (power-on and reset buttons)

Remote and central security management

- Enable/Disable start with keyboard locked
- System administrator and user password change
- Enable/Disable user password on power-on
- System SNMP community password change
- Report of PCs not password protected

Security management

- Inventory of smart card readers, power protection device and IP-Sec LAN card
- Local diagnostic of smart card and reader

More details on HP PCs security can be obtained at: <http://www.hp.com/go/pcsecurity>

Whatever your business need, HP has the monitor for you. Optimized for your HP desktop PCs, HP monitors deliver the performance you need, the quality you expect, at the right price point.
www.hp.com/go/monitors

For the latest information on HP Vectra PCs, visit HP's World Wide Web site at:
<http://www.hp.com/go/desktops>



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