IBM® ThinkPad®					WINDOWS 98 PRELOAD16
Processor Processor features L2 cache Diskette drive CD-ROM DVD-ROM	Intel® Mobile Pentium® III 450 or 500MHz¹ with 100MHz system bus No upgrade / processor in Ball Grid Array (BGA) / North and South Bridge cores 256KB / onboard (at processor speed) / sync pipelined burst / write-back / ECC External 3.5" 1.44MB / use externally with std cable or in UltraBase Option: CD-ROM / 24X-10X⁵ speed / bootable / removable from UltraBase Option: 6X-2X⁵ DVD-ROM / bootable / removable from UltraBase				- Microsoft® Windows® 98 Second Ed
Type - model Processor Preload (see side) Disk (removable) Avail / withdrawn date	Pentium III 450 Windows 98 SE				<ul> <li>RingCentral Fax</li> <li>ConfigSafe®</li> <li>Norton AntiVirus™ (OEM Version)</li> <li>PC-Doctor</li> <li>Universal Mgmt Services (web)</li> <li>Norton Mobile Essentials</li> </ul>
Memory (std / max)	64MB std / 320MB max SDRAM / non-parity / 100MHz / 3.3v / sockets accessed by removing screw on base One 144-pin socket / 64MB on planar / 1 socket available				→ Solivaire Selections OD-HOM  → Cotus® SmartSuite® Millennium CD  → Recovery CD-ROM (Windows 98)  → Recovery CD-ROM (Windows 95) <sup>40</sup> WINDOWS 2000 PRELOAD <sup>16</sup> - Windows 2000® Professional  • ThinkPad Utilities  • Online User's Guide  • ThinkPad Configuration Program
Display Display - features	13.3" (337.8mm) TFT color / Active Matrix XGA / 1024x768 / 150 to 1 contrast ratio 16.7 million simultaneous colors / 30ms refresh rate / 150 degree tilt / 125 nits (AC), 70 nits (battery)				
	NeoMagic <sup>™</sup> MagicMedia256AV <sup>™</sup> (NM2200) / Accelerated Graphics Port 2.5MB / SGRAM (embedded) / 128-bit engine, 256-bit memory interface AGP 1X / no sideband signaling / motion compensation / DDC2B / simultaneous LCD and CRT <sup>26</sup> / multiple-monitor support <sup>26</sup> for Windows 98				
Disk Disk controller	Left front / removable via coin screw or 2.5mm Allen wrench / SMART <sup>29</sup> / upgradeable Enhanced IDE / busmaster / PCI 2.1 / South Bridge / PIIX4M / DMA Mode 2, Ultra DMA/33, or PIO Mode 4 / supports 2nd disk in opt UltraBase Full size 85-key keyboard / 10 Fn key functions / integrated palm rest Flat keyboard (does not lift up) / optional Port Replicator adds slope TrackPoint® / Press-to-Select / Release-to-Select / dragging / click pace / center click button for scrolling or magnifying glass / suspension top / spare caps 11.8 x 9.4 x 1.1" (122 cubic inches) 3.97 lbs (1.80 kg) with battery with optional UltraBase CD-ROM and diskette drives: 6.9 lbs (3.12 kg) Top: carbon-fiber reinforced plastic; Bottom: glass-fiber reinforced plastic				
Keyboard / Fn keys Keyboard slope Pointing device					
Dimensions <sup>36</sup> Weight <sup>2</sup> Weight Case material					
<del></del>	Lithium Ion / intelligent / remove from base / locked with latch 3.0 hrs / supports 2nd battery in UltraBase 3 to 4 hrs / 2.5 to 3 hrs / no non-disruptive battery exchange				
	Intel 440BX AGPset / Intel 82371EB PIIX4M (EIDE, ISA Bridge, USB) / TI® PCI1450 for CardBus / AGP for graphics / ADM1021 digital thermometer / PCI 2.1 / 32-bit / 33MHz (EIDE, CardBus, modem, audio, USB, ext expansion) / PC97338 Super I/O / ISA (diskette, serial, parallel, infrared, ext expansion) / UltraBase / the following are supported by attachment to UltraBase or Direct Dock Adapter: ThinkPad Port Repl with Advanced EtherJet and Port Replicator None (UltraBase has two bays) 2 Type I, 2 Type II, or 1 Type III / CardBus 32-bit / PCMCIA 2.1 / Zoomed Video One USB / one 9 pin serial; 16550A / one (IEEE P1284-A, EPP, ECP, bidirectional)				<ul> <li>swap only)</li> <li>optional Zip 100MB drive (cold swap)</li> <li>optional HDD adapter; for second disk (cold swap only)</li> <li>optional ThinkPad Proven™ solutions¹² UltraBase right bay supports:</li> <li>standard diskette drive (hot swap)</li> <li>battery (uses standard 570 battery) Other features</li> <li>stereo speakers (0.5 watts)</li> <li>security keyhole, UltraBase lock</li> </ul>
Other features Video (TV) out MPEG-2/DVD Data/fax modem Audio support Jacks (3.5mm) Infrared ports	Ultraslim 56 watt AC Adapter, barrel, 3 prong / IBM BIOS Setup Utility (hit F1 at boot) None Software supported DVD movie playback (via UltraBase and UltraslimBay DVD) 56K <sup>22</sup> / V.90 / 14.4K fax / RJ-11 port / voice-capable / integrated Lucent® 1646 / international programmable DAA / Mini PCI Type IIIb CS4280 / PCI / FM synthesis / 16-bit playback and record / CS4297 (AC97) / full duplex / int speaker (bottom) / .5 watt / Fn+PgUp and PgDn (volume) / int mic Microphone jack (stereo) / headphone jack (stereo) / line-in jack (stereo) Infrared port (on right) / IrDA 1.1 compatible / up to 4Mbps				
Security	Power-on password / hard disk password / supervisor passwrd / security keyhole . Phillips-head screw on base for memory / optional Allen screw for disk				
Limited warranty <sup>11</sup> Service options <sup>15</sup>	<b>3 year</b> - carry-in or ThinkPad EasyServ™³¹ Rapid Depot Repair (3 business day average turnaround) On-site³², M-F, 8-5, next bus day (72 cities) / serv up to 5 yrs from purchase date				MIDI/joystick port, line out, USB port     PC 98 and DMI 2.0 compliant
	s, ATA-66 05Ks Base only) 37L2  External Monitor  60Hz 70Hz 75Hz 85 16M 16M 16 16M 16M 16 16M 16M 16M 16 256 cde on 13.3" TFT screes: 50f 2GB of remaining space	9200 - 64MB SC 2993 - 128MB S - 128MB S - ThinkPac - Direct Do - Port Rep - Port Rep - Ultraslim - Ultraslim - SuperDis - 24X-10X - 6X-2X D - Zip 100M - ThinkPac - ThinkPac	d 570 UltraBase  ck Adapter (from Colicator  licator w/ Advanced  56 watt AC Adapter Bay HDD adapter (fo k LS-120 (Ultraslimb  of CD-ROM (Ultraslimb  VD Drive (Ultraslimb	SDRAM 20L0254 P SDRAM 20L0255 P SDRAM 33L3069 05K5840 00M4650 46H4209 EtherJet 05K4872 (3 prong) 02K6545 r 2nd disk) 05K5336 Bay) 05K9122 05K9169 raslimBay) 37L1507 02K6546	DMI instrumentation ACPI ready (APM enabled) Wired for Management 1.1a compliant Wake on LAN® support28 Setup Guide, User's Reference, Quick Reference and Service Info Card, Options catalog, Windows manual Plug and Play 1.0a Standby, suspend, safe suspend, and hibernation modes ENERGY STAR compliant Personalized Web-based support International Warranty Service14 IBM SystemXtra®.35 24 hour / 7 day30 telephone, bulletin board, fax, electronic, and Internet