Appendix A: Best of Breed Cross Platform

An important factor with any corporate decision to use a comprehensive product like IE 4.0 is its ability to operate across different platforms. A key differentiator between IE 4.0 and Netscape Communicator is that Microsoft's product targets a best-of-breed strategy optimized for each platform, versus the single, least common denominator approach taken by Netscape.

Internet Explorer 3.0 has the greatest support for native OS technologies, like Internet Config and JManager on the Apple Macintosh, allowing it to run in as little as 4 MB of RAM versus 16MB for Netscape Navigator. Because of this best-of-breed strategy, IE 3.0 for the Mac has won rave reviews and is quickly taking away market share from Netscape. Internet Explorer 3.0 on Windows 3.1 provides the widest support for the latest web technologies, such as ActiveX, Java, Authenticode, PICS, and more.

Although Netscape has developed their products for a wider array of OS platforms than Microsoft, the majority of them are used by relatively few people. Once the Unix version of Internet Explorer 3.0 is available, Internet Explorer will be available on the vast majority of personal computer platforms. Microsoft plans to meet it's customers needs best by focusing on providing the most important features with stable and optimized code for the platforms most people are using.

Microsoft will develop IE 4.0 for the Macintosh, Windows 3.1, and other platforms. But because Internet Explorer 3.0 was developed as a componentized architecture using ActiveX, and because it supports the broadest array of web technologies now, it can be used with the latest version – IE 4.0 – without integration problems. Corporations needing to roll-out a cross-platform intranet solution can feel safe about using the current version, Internet Explorer 3.0, on their Macintosh, Windows 3.1, and Unix platforms, in conjunction with IE 4.0 on their Windows 95/NT machines. Customers are assured they can easily upgrade from Internet Explorer 3.0 to 4.0 and exploit all the enhanced capabilities of IE 4.0, once it becomes available on a particular OS platform.

The following table compares the platforms supported now or in the near future by Internet Explorer versions 3.0 and 4.0 to those supported by Netscape.

Platform Support	Internet Explorer 4.0 "The Web PC"	Netscape Communicator
Intel-based (x86)		
Windows 95	IE 3.0 / IE 4.0	Yes
Windows NT 4.0	IE 3.0 / IE 4.0	Yes
Windows NT 3.51	IE 3.0 / IE 4.0 planned	Yes
Windows 3.1 and 3.11	IE 3.0 / IE 4.0 planned	Yes
OS/2 Warp		Yes
Caldera Linux		Yes
BSD Unix 3.0		Yes
SCO Unix		Yes
Apple Macintosh		
Macintosh OS 7.1 and higher (68K)	IE 3.0 (beta)	Yes
Macintosh OS 7.1 and higher (PowerPC)	IE 3.0 / IE 4.0 planned	Yes
Workstations		
Digital Alpha (Digital Unix 3.2 and higher)	IE 3.0 (4.0a & >) planned	Yes
Digital Alpha (Windows NT 3.51 and 4.0)		Yes
Hewlett-Packard (HP-UX 9.03, 9.05, 10.x	IE 3.0 (10.2 & >) planned	Yes
and higher)		
IBM RS/6000 (AIX 4.1 and higher)	IE 3.0 (4.1.4 & >) planned	Yes
Silicon Graphics (Irix 5.3, 6.2 and higher)	IE 3.0 (6.2 & >) planned	Yes
Sun SPARC (Solaris 2.4 and higher)	IE 3.0 (2.5 & >) planned	Yes
Sun SPARC (Sun OS 4.1.3 and 4.1.4)		Yes

Appendix B: Detailed Comparison Tables

Best Browser

Ease of Use Innovation & Personalization Enhancements

Browser Features Ease-of-Use & Personalization	Internet Explorer 4.0 "The Web PC"	Netscape Navigator
Ease-of-Use Features Making the Internet easy	y for everyone	
Full Screen Browser & Kiosk Mode	Yes	Yes
Suite Integration		
Easy suite member launching	Yes	Partial
Consistent menus across suite	Yes	Partial
Common Toolbars	Yes	Yes
Common Keyboard shortcuts	Yes	Yes
Startup Splashscreen	Yes	No
Smart Favorites which check web site for updates and download for offline viewing	Yes	No
Thumbnail view of Favorite sites	Yes	No
Integrated Search Pane	Yes	No
Integrated History Pane	Yes	No
AutoComplete Address Bar	Yes	No
AutoComplete History on right click	Yes	No
Navigation		
Navigation history available on right- click on Back/Next buttons	Yes	Yes
Site identification tool tips	Yes	Yes
Site History on mouse-click	Yes	Yes
User Feedback		
 Sound events for link click, and page delivery 	Yes	No
User-friendly Error, alert & status messages and sound events	Yes	No
Animated cursors	Yes	Yes
Better Javascript/VBscript errors	Yes	Unknown
Improved Status Bar feedback while pages are loading	Yes	No
Improvements in file- and code- download feedback	Yes	Unknown
Context-Sensitive content menus		
Stop animations & applets	No	Yes
Frame-page management Insurance Printing Control	Yes?	Yes
Improved Printing Control		
Print active document in a frame	Yes	
Print Preview	No	Yes

Browser Features	Internet Explorer 4.0	Netscape Navigator
Ease-of-Use & Personalization	"The Web PC"	
Print all documents in a frameset	Yes	
WYSIWYG printing of framesets	Yes	
Recursive (1 level deep) printing of all links on a document.	Yes	
Print selected range	Yes	
Option to print background images and colors	Yes	
General		
ActiveX Controls management window	Yes	No
Easily switch between proxy and dial up	Yes	
Internet Connection Wizard	Yes	Yes
Offline browsing	Yes	
Search, e-mail, news, edit buttons on toolbar	Yes	Yes
Simple web address support	Yes	Yes
View frame's HTML source on context menu	Yes	?
View Source and Refresh context (pop-up) menu commands for pages in frames	Yes	?
Refresh and View Source context (pop-up) for page items	Yes	Yes
On-line tutorial	Yes	Yes
Off-line help	Yes	No
Mail Send command allows you to mail an Internet shortcut or page from the browser	Yes	Yes
Drag-and-drop of Web page links	Yes	Yes
Full keyboard accessibility	Yes	Yes
Standard default display window size cross- platform	?	Yes
Personalization & Fun Features - Enjoying you	r personal Web experience	
Favorites Organization		
User Defined Favorites on toolbar	Yes	Yes
Drag & drop to favorites toolbar	Yes (from upper left icon)	Yes
Create new folder when add new Favorite	Yes	No
Easily place bookmark in hierarchical folders 1 st time	Yes (including drag & drop in PR2)	Yes
Drag/drop favorites reordering	Yes	Yes
CoolBar Toolbars		
Toolbar can be docked vertically	Yes	No
Rearrange and combine toolbars	Yes	No
• Open/close tab	No	Yes
Custom Link ToolbarMinimally Sized	Yes Yes	Yes Yes
Auto-hide in full-screen mode	Yes	Yes
General	2.00	2 00
User Defined Start/Home Page	Yes	Yes

Browser Features		Netscape Navigator
Ease-of-Use & Personalization	"The Web PC"	
International Language Support	9 (Preview) 25-30 (final)	11 languages planned (final)
Ratings (PICS) Support	Yes	No
Distribution/Administration Kit	Yes	Yes
Use Mail/News Reader of choice	Yes	No

Browser Features Language Localization	Internet Explorer 4.0 "The Web PC"	Netscape Navigator
Localization Overview		
Number of IE 4.0 Preview Release localized versions	9	1
Number of IE 3.0 final release localized versions	30	11
Number of IE 4.0 final release localized versions	~30 planned	11
View any character set on any language version of Windows95/NT	Yes	Yes
International Language control settings	Yes	Yes
Ability to change languages on the fly	Yes	Yes
Languages in which the 4.0 browser will be av	/ailable⁴	
Arabic	Yes	No
Basque	Yes	No
Catalan	Yes	No
Chinese - Simplified	Yes*	No
Chinese - Traditional	Yes*	No
Czech	Yes	No
Danish	Yes*	Yes
Dutch	Yes*	Yes
English (US and International)	Yes*	Yes
Finnish	Yes*	No
French	Yes*	Yes
German	Yes*	Yes
Greek	Yes	No
Hebrew	Yes	No
Hungarian	Yes	No
Italian	Yes*	Yes
Japanese	Yes*	Yes
Korean	Yes*	Yes
Norwegian	Yes*	No

[•] Not all languages will be available in the beta cycles.
• Within 30 days of final English release

Browser Features Language Localization	Internet Explorer 4.0 "The Web PC"	Netscape Navigator
Polish	Yes	No
Portuguese - Brazilian	Yes⁴	Yes
Portuguese - Iberian	Yes*	No
Russian	Yes	No
Slovak	Yes	No
Slovenian	Yes	No
Spanish	Yes*	Yes
Swedish	Yes*	Yes
Thai-enabled English	Yes	No
Turkish	Yes	No
Vietnamese	Yes	No

HTML 3.2 and Compatibility

Browser Features	Internet Explorer 4.0	Netscape Navigator
HTML 3.2 & Compatibility	"The Web PC"	
HTML Support - Employing standards to create	great looking Web pages	
HTML 3.2 tags	Yes	Some
Sub/Super Script	Yes	Yes
Tables wrapped by text (alignment)	Yes	No
FONT Sizing, Color	Yes	Yes
W3C/IETF RFC1952 Tables	Yes	Some
Tables with cell grouping	Yes	No
Tables border control	Yes	Yes
Header and footer grouping	Yes	No
COLS attribute	No	Proprietary
W3C HTML OBJECT tag	Yes	Yes
Cascading Style Sheets (CSS1)	Yes (core + advanced1)	Partial (core only) ¹
Typeface selection	Yes	Yes
Typeface scaling (any point size)	Yes	Yes
Margins control	Yes	Yes
Watermarks (non-scrolling backgrounds)	Yes	Yes
Table background color	Yes	Yes
Table background image	Yes	Yes
Non-tiled-backgrounds	Yes	Yes
Full white-space control	Yes	Yes
Typographical space control	Yes	Yes
Indenting	Yes	Yes
Negative Indenting margins	Yes	Yes
CSS1 Printing Enhancements	Yes 🏻	No

¹ Implementation involves JSSS, which means it is likely to create scripting errors for incorrectly implemented CSS1 tags, which is not very user-friendly.

Browser Features HTML 3.2 & Compatibility	Internet Explorer 4.0 "The Web PC"	Netscape Navigator
Rich Forms		
Button tag	Yes	Unknown
Label tag	Yes	Unknown
AccessKey for all intrinsic controls	Yes	Unknown
Disable attribute to disable an intrinsic control	Yes	Unknown
Tabindex attribute to control tabbing sequence	Yes	Unknown
Title attribute on all elements (creates tooltip)	Yes	Unknown
Other		
Rich HTML Scrolling Marquees	Yes	No
Standard Frames	Yes	Yes
Enhanced Frames (borderless, inline, and floating)	Yes	borderless only
Transparencies	Yes	Yes
Direct placement of objects in page	Yes	Yes
Background sound	Yes	Yes
Compatibility		
PICS ratings	Yes	No
File upload	Yes	Yes
Server push	Yes	Yes
Automatic Proxy Configuration	Yes	Yes
Frame target HTTP header	Yes	Yes
Complete Plug-in support	Yes	Yes
HTTP 1.1 support	Partial [] (performance enhancements)	Unknown
MailTo for form submissions	Yes	Yes
DDE support for legacy applications	Yes	Yes
support file:// URL's	Yes	Yes
SELECT for listbox support	Yes	Yes
Mouse-down link coloring	Yes	Yes
Downloadable Web fonts (True Type Standard)	Yes	No (non-standard Bitstream TrueDoc)
Unicode International character support	Yes	Yes

Bringing Interactivity to the Web

Browser Features	Internet Explorer 4.0	Netscape Navigator
Interactivity	"The Web PC"	
ActiveX: Using ActiveX to create the webs most interactive pages		
ActiveX support	Full	Partial
OLE Server or Container (Win32)	Yes	Yes

Browser Features Interactivity	Internet Explorer 4.0 "The Web PC"	Netscape Navigator
ActiveX Control Viewer	Yes	No
Java Bean Support	Yes	No
ActiveX Script Debugger	Yes	No
Windowless Controls	Yes	No
Apartment Model Controls	Yes	No
Quick Activation	Yes	No
Asynchronously data downloading	Yes	No
Plug-ins		
AutoInstall and signing of plug-ins	Yes	Yes
Component Object Model:		
ActiveX	Yes	Partial
DCOM	Yes	No
CORBA/IIOP Support	No	Yes
Extensible for creating custom applications	Yes	No
Installable JIT architecture	Yes	No
Browser serves as reusable control for Integration into external applications	Yes	No
Browser serves as extensible components integrated into desktop operating system	Yes	No

Java

ivu		
Browser Features	Internet Explorer 4.0	Netscape Navigator
Java	"The Web PC"	
Java		
Object tag support	Yes	Yes
Auto-install of Java class libraries	Yes	Unknown
Improved load & run speed	Yes	Yes
Java JIT	Yes	Yes
JDK 1.1 support	Planned	Yes
Support for Java Beans	Yes	Unknown
Dynamic HTML class library	Yes	Unknown
Improved AWT	Yes	No
New AFC support	Yes	No
New multimedia class libraries w/DirectX support	Yes	No
User ability to stop applets on low resource machines	No	Yes
Persistent security state	Yes	Unknown
Enhanced signed Java applet access		
Limited disk access	Yes	Yes
Limited disk & network access	Yes	Yes
Limited disk read access, unlimited disk	Yes	Yes

Browser Features Java	Internet Explorer 4.0 "The Web PC"	Netscape Navigator
write access		
Unrestricted access	Yes	Yes
International Support		
Unicode support	Yes	Yes
Multilingual display and input	Yes	Unknown
Easy resource format	Yes	Unknown

Multimedia

Browser Features Multimedia	Internet Explorer 4.0 "The Web PC"	Netscape Navigator
Multimedia - Using ActiveX Controls to make you	ır Web pages come alive!	
Multimedia Controls	Yes (iHammer)	No
Interactive Music Control	Yes	No
Hardware acceleration of video playback	Yes (DirectX)	No
Progressive Playback of Video/Audio files	Yes	Yes
Video formats (ActiveMovie™/LiveVideo)	MPEG, AVI, MOV, QuickTime	AVI
Audio formats	WAV, MIDI, AIFF, AU, MPEG audio	WAV, MIDI, AIFF, AU
In-line (streamed) sound support	NetShow, RealAudio and other ActiveX Controls	Live Media, Real Audio plugin
In-line (streamed) video support	Yes	Yes
Video Streaming support	Yes	Yes
Windowless ActiveMovie controls	Yes	No
Native QuickTime video playback	Yes (ActiveMovie™²)	Apple QuickTime plug-in
Native MPEG video/audio playback	Yes (ActiveMovie)	No
Windowless controls	Yes	?
DirectX for faster rendering	Maybe?	?
OpenGL API compatibility	Yes	?
User ability to stop animations on low resource machines	No	Yes
HTML text in Marquee	Yes	?
PNG Image format	Yes	?
3D Animation and VRML – Cruise the Virtual Web		
3D Animation	Yes (Direct3D)	Yes (Live3D)
VRML 2.0 with 1.x Compatibility	Yes	Yes

² Active Movie supports MPV, MPA, MPE, MPEG, AU, AIF, AIFF, SND, MID, RMI, Wav + AVI, MOV, and QuickTime formats in a single control and is extensible for support of future technologies

Provides Protection on the Internet

Browser Features Security	Internet Explorer 4.0 "The Web PC"	Netscape Navigator
Secure Communication and Interaction		
SSL 2.0/3.0 support, PCT 1.0 support	Yes	Yes/No PCT support
Server authentication	Yes	Yes
Client authentication	Yes	Yes
Code signing for Navigator Plug-ins, ActiveX Controls	Yes (Authenticode)	No
Code Signing for Java Applets	Yes (Authenticode)	Yes
Support for Java applet "sandboxing"	Yes	Yes
Enhanced Java applet security (out of the sandbox)	Yes	Yes
PICS ratings	Yes	No
Wallet	Yes	No
Personal Information Exchange (PFX)	Yes	Unknown
Smart Card Authentication (PKCS #11)	Yes	Limited
Cryptographic API	Yes	No
Transport Layer Security (TLS)	Planned	Unknown
SOCKS Firewall Support	Yes	?
Control scripting security (for scripting not mentioned above)	Yes	Unknown
Control security for data streaming (for scripting not mentioned above)	Yes	Unknown

Complete Communication & Collaboration

Messaging & Discussions

Communication and Collaboration Mail Features	Microsoft Outlook Express	Netscape Messenger
General Mail Features - Communicating with oth	ners over the Internet	
Internet Mail Standards Supported		
SMTP/POP3	Yes	Yes
IMAP4 Servers	Yes	Yes
LDAP (Internet Directories)	Yes	Yes
S/MIME	Yes	Yes
MIME	Yes	Yes
MIME HTML (Offline HTML capabilities)	Yes 🏻	Yes
General Functionality		
Import mail from other mail programs	Netscape, Eudora	Unknown
Synchronization with offline IMAP folders	Yes	Unknown
Drag and drop messages from IMAP Inbox/folders	Yes	Yes
HTML Read and Author	Yes	Yes

Communication and Collaboration Mail Features	Microsoft Outlook Express	Netscape Messenger
Auto-completion addressing	No	Yes
Spelling	Yes, w/Office installed	Yes
Share Custom Dictionaries w/other apps	Yes, w/Office installed	No
Postponed message composition support	Yes	Yes
Offline Mail and News support	Yes	Yes
Multilingual support for Mail and News reading	Yes	Unknown
Send docs from MAPI-compliant apps	Yes	Yes
Rich Mail filtering	Yes	Partial
Sort folders	Yes	Yes
Watch Message Threads	No	Yes
Receipts	No	Yes
BCC (blind carbon copy of message)	Yes	Yes
Priority	Yes	Yes
File Messages from Toolbar	No	Yes
Context-sensitive menus	Yes	Yes
Auto message header expansion	No	Yes
Drag &drop hyperlinks	Yes	Yes
Single-step web page mailing	Yes	Yes
# of unread messages in the folder-tree view	Yes	Yes
Download message count & status	Yes	Yes
Search		
Typical: sender, CC, recipient, date, subject, body	Yes	Yes
More: priority, status	No	Yes
Rich search rules (contains, is, begins with, etc)	Planned	Yes
Messages on server	Yes	Yes
Integration		
Global Suite Switching Menus	Yes	No
Address Book available everywhere	Yes	Unknown
Taskbar Integration	Yes	Selector Bar Only
New mail notification on tray	Yes	Yes
User selectable News & Mail application	Yes	No
Integrated Message Center	Yes	Partial
Personalization Features - Create your own pro	oductive environment	
Setup & Preferences Wizard	Yes	Yes
3-pane view	Yes—can have 1, 2, or 3 panes	No—only preview pane on/off
Preview pane	Yes	Yes
Configurable preview pane	Yes	No
Configurable toolbar	Yes	No
Return receipts	No	Yes

Communication and Collaboration Mail Features	Microsoft Outlook Express	Netscape Messenger
Per-user settings	Based on OS logon	Planned
Hierarchical folders	Yes	Yes
Secure password authentication using SASL standard	Yes	No
Stationary Templates	Yes:	No
HTML threading support	Planned	No
HTML Editing & Viewing – Create and share ric	h HTML messages	
Can receive full-fidelity Inbox Direct	Yes	Yes
Linked pictures shown in-line	Yes	Yes
Attached pictures shown in-line	Yes 🏻	Yes
MHTML (Bundle stuff linked to the HTML in the message itself)	Yes 🛚	Yes
HTML Editing	Yes	Yes
Styles based use of HTML to distinguish authors	Yes 🏻	Unknown
Background support	Yes	Yes
Default to plain text or HTML	Yes	Yes
Switch to plain text on per-message basis	Yes	No
Per-recipient HTML mail options	No	Yes
Address Book - Find email addresses for anyon	ne on the Web	
Multiple LDAP servers	Yes	Yes
LDAP Lookup	Yes	Yes
Automatic name resolution (in message addressing) from address book and LDAP servers	Yes	No
Lookup names from received message	Planned	Unknown
LDAP search criteria	Can search on name and/or email address.	Can be on name, email address, phone number, organization, organizational unit, city, street.
Conferencing integration	Yes	Yes
Certificate management	Yes	Yes
vCard support	Yes	Yes
Import	Eudora, Netscape, Internet Mail & News for Win 3.1, PAB	Unknown
Export	vCard (now), planned are: PAB, CSV, Outlook	No
Auto-add to address book	Yes	No
Attach vCard to outgoing messages	Yes	Yes
Secure Communications – Protect your communications and verify senders		
Security status & help	Yes	Yes
Send encrypted mail	Yes	Yes
Send signed mail	Yes	Yes
Attach your certificate to mail	Yes	Yes

Communication and Collaboration Mail Features	Microsoft Outlook Express	Netscape Messenger
Password for your certificates	Yes (Managed by OS and/or CryptoSAPI)	Yes
Authority management	Yes (Managed by IE3)	Yes
Easy signup for personal certificate	Planned []	No
Attachments – Easily attach and view different document types		
Drag & drop attachments	Yes	Yes
Drag messages to folders	Yes	Yes
Attachment types supported		
MIME	Send/Receive	Send/Receive
UUENCODE	Send/Receive	Send/Receive
BINHEX		Receive

Communication and Collaboration News Features	Microsoft Outlook Express	Netscape Collabra
General News Features – Access to corporate of	discussions and worldwide news g	groups
HTML View & Compose	Yes	Yes
Multiple news servers	Yes	Yes
Watch & ignore thread rules	No	Yes
User-friendly discussion group names	No, non-NNTP standard	Yes (proprietary extension)
Threaded Message views	Yes	Yes
Bookmark discussion groups	Yes	Yes
Create internal discussion groups	Yes	Yes
Set access privileges for private discussion groups	No	Yes
Secure discussions with SSL 3.0	Yes	Yes
Create categories of discussions	No	Yes
Multiple Search Criteria at once	From, Subject & Date	Yes
"Virtual" discussion groups	No, non-NNTP std	Yes
Set message retention time	No	Yes
Edit posted messages	No, non-NNTP std	Yes
Quick-find of newsgroups	Yes	Yes

Complete Internet Conferencing

Communication and Collaboration Conferencing	Microsoft NetMeeting	Netscape Conference
Internet Conferencing Features - Communication	ng and Collaborating with others o	over the Internet
Data Conferencing (T.120, Multipoint)	Yes	No
Audio Conferencing	Point-to-Point (G.723.1, G.711, Multi-point enabled)	Point-to-Point (G.711)
Video Conferencing	Yes (H.323, H.263, H.261)	No

Communication and Collaboration Conferencing	Microsoft NetMeeting	Netscape Conference
3		
Collaborative Whiteboard	Multipoint	Point-to-Point
File Transfer	Yes (T.127, multipoint)	Yes (proprietary, point-to- point)
Internet Chat	Multipoint	Point-to-Point
True Application sharing (any application, only	one user needs the application)	
Application Sharing	Yes - Multipoint	No
Application Choices	Any Windows-based app	N/A
Number of participants	Multipoint	N/A
Collaborative Browsing	Yes – through use of application sharing - Multipoint	Yes – Point-to-Point
Standards-based conferencing		
T.120 Data Conferencing	Yes (T.120, T.121, T.122, T.123, T.124, T.125, T.127, T.Share)	No
H.323 Audio/Video Conferencing	Yes (Audio & Video)	Audio only
Audio: G.723.1 (low bandwidth)	Yes	No
Audio: G.711 (high bandwidth)	Yes	Yes
Video: H.263 (low bandwidth)	Yes	No
Video: H.261 (high bandwidth)	Yes	No
Additional Features		
LDAP Directory Lookup	Yes	No
Caller ID	Yes	Yes
Speed Dial (Frequent numbers)	Yes	Yes
Do Not Disturb	Yes	Yes
Call Logging	Yes	Yes
Answering Machine Functions	Yes (send mail, and unanswered calls recorded in log)	Yes
Background Call Notification agent	Yes	Yes
Redial & Call Return	Yes	Yes
General		
Setup Wizard	Yes	Yes
Automatic Optimized Codec Selection	Yes	Yes
Backward compatible with previous version	Yes	No
OS Platforms supported	Win95/NT (interoperability on Unix through third-party)	Win 95
International Language support	>20 languages	Unknown
System Policy Support for Management and Administration Control	Yes	No
SDK	Yes	Yes
Deployment Resource Kit	Yes	No

Broadcast

Communication and Collaboration Broadcast	Microsoft NetShow	Netscape Media Player
Multimedia Broadcast Features – Watch the W	/eb!	
Ability to listen and watch multimedia content	Yes	Yes
Streaming Video playback	Yes	Yes
Streaming Illustrated audio (images synchronized with audio tracks)	Yes	Yes
Streaming audio	Yes	Yes
File Format Interoperability	ASF, WAV, AVI, BMP, GIF, JPEG, Lossy JPEG, MOV, URL, DIB	WAV, AU, Live Media (LMA) and RealMedia
Live Features – IP Multicast		
Live Audio IP Multicast	Yes	Yes
Multiple codecs	Yes	Yes
Encodes audio content at multiple compression ratios	Yes	Yes
Video IP Multicast	Yes	No
File IP Multicast	Yes	No
Rich scheduling capabilities	Yes	No
Other		
Standards	TCP/IP, UDP/IP, RTP and IP Multicast, HTTP, ActiveX, Java, evaluating RTSP	RTSP(draft), TCP/IP, UDP/IP, RTP and IP Multicast
Audio Codecs supported	GSM, IMA ADPCM, DSP Group TrueSpeech, L&H, MSN Audio, MS ADPCM, MS with more to come	Lucent Elemedia, Voxware. Claim other codecs can be plugged in.
Video Codecs supported	MS Video 1, Cinepak, Indeo RM 3.1 & 3.2, RLE, with more to come	Lucent Elemedia, Voxware. Claim other codecs can be plugged in.
Codec model support	Any Standard ACM, VCM	Proprietary

Authoring and Publishing

Communication and Collaboration HTML Authoring & Publishing	Microsoft FrontPad	Netscape Composer
General Features - Easy HTML Authoring		
Edit HTML for Web View Folders	Yes	No
Common Menu access across all clients	Yes	Yes
WYSIWYG editing	Yes	Yes
Integration with Mail & News	Outlook Express uses native HTML editing, can use FrontPad if desired	Yes
HTML tag insertion	Yes	Yes
HTML source editor	Yes	No
HTML syntax checker	Yes	Yes

Multi-level undo No (single level) Yes Drag and drop hyperlink creation Yes Yes Follow links in editor feature Yes No Editor API No Yes Importing Content Wes (will use if Office 97 filters installed) Yes Import and convert images Yes (will use if Office 97 filters installed) Yes Import content in native file formats Yes (will use if Office 97 filters installed) Yes Import text files (no conversion) Yes Yes Text Tools Yes Yes Table column editing Yes Yes Table column editing Yes Yes Frames support No No Find and replace text Yes No Headers/flooters tool Yes No Spell check No Yes Multiple fonts Yes Yes Graphics Yes Yes Image map tools No No Transparency tool No No Drag and drop images </th <th>Communication and Collaboration HTML Authoring & Publishing</th> <th>Microsoft FrontPad</th> <th>Netscape Composer</th>	Communication and Collaboration HTML Authoring & Publishing	Microsoft FrontPad	Netscape Composer
Follow links in editor feature	Multi-level undo	No (single level)	Yes
Follow links in editor feature	Drag and drop hyperlink creation	Yes	Yes
Importing Content Import and convert images	Follow links in editor feature	Yes	No
Import and convert images	Editor API	No	Yes
Import content in native file formats	Importing Content	1	
Import text files (no conversion)	Import and convert images		Yes
Text Tools Table editing & creation Yes Yes Table column editing Yes Yes Frames support No No Find and replace text Yes No Headers/footers tool Yes No Spell check No Yes Multiple fonts Yes Yes Graphics Tes Yes Image map tools No No Transparency tool No No Drag and foro images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes Yes Sample graphics No No Sample graphics No No Forms – if using a server running FrontPage server extensions No One-Line Text Box Yes No Scrolling Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Rad	Import content in native file formats	1 '	Yes
Table editing & creation Yes Yes Table column editing Yesil Yes Frames support No No Find and replace text Yes No Headers/footers tool Yes No Spell check No Yes Multiple fonts Yes Yes Graphics Image map tools No No Transparency tool No No Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No No No No Forms – if using a server running FrontPage server extensions No One-Line Text Box Yes No Scrolling Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Radio Button Yes No	Import text files (no conversion)	Yes	Yes
Table column editing Yes Yes Frames support No No Find and replace text Yes No Headers/footers tool Yes No Spell check No Yes Multiple fonts Yes Yes Graphics Umage map tools No No Transparency tool No No Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No No No No Forms – if using a server running FrontPage server extensions No One-Line Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Radio Button Yes No Drop-Down Menu Yes No Push Button Yes No	Text Tools		
Frames support	Table editing & creation	Yes	Yes
Find and replace text Yes No Headers/footers tool Yes No Spell check No Yes Multiple fonts Yes Yes Graphics Image map tools No No Transparency tool No No Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No Forms – if using a server running FrontPage server extensions No One-Line Text Box Yes! No Scrolling Text Box Yes! No Check Box Yes! No Scrolling Text Box Yes! No Check Box Yes! No Drop-Down Menu Yes! No Push Button Yes! No Image Yes! No Image Yes! Yes Pag	Table column editing	Yes□	Yes
Headers/footers tool Yes	Frames support	No	No
Spell check No Yes Multiple fonts Yes Yes Graphics Image map tools No No Transparency tool No No No Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No Forms - if using a server running FrontPage server extensions No One-Line Text Box Yes No Scrolling Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Radio Button Yes No Drop-Down Menu Yes No Push Button Yes No Image Yes No Interactive Tools Yes Yes Page Wizard Yes Yes Page templates Yes Yes <tr< td=""><td>Find and replace text</td><td>Yes</td><td>No</td></tr<>	Find and replace text	Yes	No
Multiple fonts Yes Yes Graphics Image map tools No No Transparency tool No No No Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No Forms – if using a server running FrontPage server extensions No One-Line Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Radio Button Yes No Drop-Down Menu Yes No Push Button Yes No Image Yes No Interactive Tools Yes Yes Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscap	Headers/footers tool	Yes	No
Graphics Image map tools No No Transparency tool No No Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No Forms – if using a server running FrontPage server extensions No One-Line Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Radio Button Yes No Drop-Down Menu Yes No Push Button Yes No Image Yes No Interactive Tools Yes Yes Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Java applets	Spell check	No	Yes
Graphics Image map tools No No Transparency tool No No Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No Forms – if using a server running FrontPage server extensions No One-Line Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Radio Button Yes No Drop-Down Menu Yes No Push Button Yes No Image Yes No Interactive Tools Yes Yes Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Java applets	Multiple fonts	Yes	Yes
Transparency tool No No Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No Forms - if using a server running FrontPage server extensions No One-Line Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Radio Button Yes No Drop-Down Menu Yes No Push Button Yes No Image Yes No Image Yes Yes Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Graphics		
Drag and drop images Yes Yes Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No Forms – if using a server running FrontPage server extensions No One-Line Text Box Yesil No Scrolling Text Box Yesil No Check Box Yesil No Radio Button Yesil No Drop-Down Menu Yesil No Push Button Yesil No Image Yesil No Interactive Tools Yesil Yes Page templates Yesil Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Image map tools	No	No
Style pages Yes Yes Image editor No No Image resizing Yes No Sample graphics No No Forms – if using a server running FrontPage server extensions No One-Line Text Box YesII No Scrolling Text Box YesII No Check Box YesII No Radio Button YesII No Drop-Down Menu YesII No Push Button YesII No Image YesII Yes Page Wizard YesII Yes Page templates YesII Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes No Yes Yes	Transparency tool	No	No
Image editor No No No Image resizing Yes No No Sample graphics No No No No No No No N	Drag and drop images	Yes	Yes
Image resizing Yes No Sample graphics No No Forms – if using a server running FrontPage server extensions One-Line Text Box Yes No Scrolling Text Box Yes No Check Box Yes No Radio Button Yes No Drop-Down Menu Yes No Push Button Yes No Image Yes No Interactive Tools Yes Yes Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Style pages	Yes	Yes
Sample graphics No No Forms – if using a server running FrontPage server extensions One-Line Text Box YesI No Scrolling Text Box YesI No No Check Box YesI No No Radio Button YesI No No Drop-Down Menu YesI No No Push Button YesI No No Image YesI No No Interactive Tools YesI Yes Yes Page templates YesI Yes Yes Web Technology Tools Yes Yes Yes Internet Explorer tags Yes Yes Yes Netscape Navigator tags Yes Yes Yes Java applets YesI Yes Yes	Image editor	No	No
Sample graphics No No Forms – if using a server running FrontPage server extensions One-Line Text Box Yesil No One-Line Text Box Yesil No Scrolling Text Box Yesil No Check Box Yesil No Radio Button Yesil No Drop-Down Menu Yesil No Push Button Yesil No Image Yesil No Interactive Tools Yesil Yes Page Wizard Yesil Yes Page templates Yesil Yes Web Technology Tools Yesil Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yesil Yes Java applets Yesil Yes	Image resizing	Yes	No
Forms – if using a server running FrontPage server extensions No One-Line Text Box Yesil No Scrolling Text Box Yesil No Check Box Yesil No Radio Button Yesil No Drop-Down Menu Yesil No Push Button Yesil No Image Yesil No Interactive Tools Yesil Yes Page Wizard Yesil Yes Page templates Yesil Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yesil Yes Java applets Yesil Yes		No	No
Scrolling Text Box Yes I No Check Box Yes I No Radio Button Yes I No Drop-Down Menu Yes I No Push Button Yes I No Image Yes I No Interactive Tools Yes I Yes Page Wizard Yes I Yes Page templates Yes I Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes I Yes Java applets Yes I Yes		server extensions	
Check Box Yes No Radio Button Yes No Drop-Down Menu Yes No Push Button Yes No Image Yes No Interactive Tools Yes Yes Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	One-Line Text Box	Yes	No
Radio Button YesI No Drop-Down Menu YesI No Push Button YesI No Image YesI No Interactive Tools YesI Yes Page Wizard YesI Yes Page templates YesI Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins YesI Yes Java applets YesI Yes	Scrolling Text Box	Yes	No
Drop-Down Menu YesI No Push Button YesI No Image YesI No Interactive Tools YesI Yes Page Wizard YesI Yes Page templates YesI Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins YesI Yes Java applets YesI Yes	Check Box	Yes	No
Push Button Yes No Image Yes No Internet Explorer tags Yes Yes Ves Yes Yes Ves Yes Yes Ves Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Radio Button	Yes□	No
Image Yes No Interactive Tools Yes Yes Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Yes Yes Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Drop-Down Menu	Yes	No
Interactive Tools Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Push Button	Yes	No
Interactive Tools Page Wizard Yes Yes Page templates Yes Yes Web Technology Tools Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Image		
Page templates Yes Web Technology Tools Internet Explorer tags Netscape Navigator tags Netscape Plug-Ins Java applets Yes Yes Yes Yes Yes Yes Yes	Interactive Tools		
Web Technology Tools Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Page Wizard	Yes	Yes
Internet Explorer tags Yes Yes Netscape Navigator tags Yes Yes Netscape Plug-Ins Yes Yes Java applets Yes Yes	Page templates	Yes	Yes
Netscape Navigator tags Yes Yes Yes Yes Yes Yes Yes Y	Web Technology Tools		
Netscape Plug-Ins Yes Yes Yes Yes	Internet Explorer tags	Yes	Yes
Java applets Yes Yes	Netscape Navigator tags	Yes	Yes
· · ·	Netscape Plug-Ins	Yes	Yes
JavaScript Yes Yes	Java applets	Yes	Yes
	JavaScript	Yes	Yes

Communication and Collaboration HTML Authoring & Publishing	Microsoft FrontPad	Netscape Composer
Active X Controls	Yes	No
VB Script	Yes	No
Layers	No	No
Absolute Positioning	No	No
JSS	No	No
Web Fonts	No	No
VRML	No	No
Publishing Tools		
Web Publishing Wizard	Yes	No
Web server	Personal Web Server	No
Support for multiple servers	Yes	No
Secure Web page support	No	Yes
One-step web publishing	Yes	Yes

Information Delivery

Premium Channels

Personalized Information Premium Channels	Internet Explorer 4.0 "The Web PC"	Netscape Constellation	
Premium Channels - Live Web Content avail	ilable on demand		
Exclusive Premium Channels	Yes	Maybe	
Content Type Available			
Internet sites	Yes	Yes	
Intranet sites	Yes	Yes	
• Secure sites	Yes	Yes	
Channel content type supported	Any HTML, Dynamic HTML, Applets, ActiveX controls	Unknown	
Information Delivery Options			
• Live Channels	Yes	Yes	
Smart Favorites	Yes	No	
Site Subscriptions	Yes	Unknown	
Delivered to mailbox	Yes, possible with <i>any</i> HTML web site	Limited to InBox Direct Content Providers	
 Mini channels (tickers, company phone directories, stock quotes, etc.) 	Yes	Yes	
Customization			
Update frequency	Yes	Yes	
Cache size limits	Yes	Yes	
Offline viewing	Yes	Yes	

Subscriptions

Personalized Information Features Subscriptions	Internet Explorer 4.0 "The Web PC"	Netscape Constellation	
Receive – Get the info you want			
In a Desktop web component	Yes	Yes	
In Channels	Yes	Yes	
In Tickers	Yes	Yes	
In Taskbars	Yes	No	
In Mail	Yes	Only InBox Direct	
Schedule – Get the info when you want it			
Individually schedule each subscription	Yes	Yes	
Notification –			
Email Alert	Yes	No	
On the Desktop	Yes	Yes	
Icon on Taskbar	Yes	No	
Tooltips on Favorites	Yes	No	
Indication on Favorite icons	Yes	Yes	
Subscription Status Folder	Yes	Unknown	

Offline Reading

Personalized Information Features Offline Reading	Internet Explorer 4.0 "The Web PC"	Netscape Communicator & Constellation
Offline Features - Get the info when you can, as	nd access it when you want!	
Integrated offline support for web sites, channels, mail, news	Yes	No
Download Favorite Web sites	Yes, for any subscribed site	Yes
Support site passwords	Yes	Unknown
Control how many pages deep you want	Yes	Unknown
Control download of other hyperlinked sites	Yes	Unknown
Customized Download Schedule	Yes	Unknown
Control Cache size	Yes	Unknown
Choose to download images & sounds or not	Yes	Unknown
Choose to download applets & controls or not	Yes	Unknown

Integration between the Web and the PC

Single Explorer

	Frue Web Integration Features Single Explorer	Internet Explorer 4.0 "The Web PC"	Netscape Constellation	
5	Simple, Consistent Navigation			
•	Single click navigation and icon launching	Yes	Not on local hard drive or network file systems	

	ue Web Integration Features ngle Explorer	Internet Explorer 4.0 "The Web PC"	Netscape Constellation
•	Forward/backward buttons work everywhere (Web, PC, LAN)	Yes	No
•	Single window for navigating local and Web content (Browser enabled everywhere)	Yes	No
•	Full Screen Navigation Window	Yes (File system and Web)	Browsing Web only
Co	ntext-Sensitive Toolbars & Menus		
•	Unified toolbar adjusts for file management vs web browsing	Yes	No
•	Address bar recognizes file paths and URLs	Yes	Yes
Gl	obal Favorites		
•	Combined Web and local favorites	Yes (everywhere, including file system and Start Menu)	Partial (in browser and Constellation)
•	Shortcuts on HTML desktop	Yes	Yes, but no right-click menu, rich properties
НТ	ML Folder View		
•	HTML viewing of file system	Yes	No
•	Customizable with Wizard	Yes	No
•	Server-based option (for central control)	Yes	No
Ge	neral		
La	unch applications natively	Yes (Start Menu, file system)	No, only links from within Constellation
Sw	vitch natively between apps	Yes (Taskbar, etc.)	No
Na	tive File Management	Yes	No
Sy	stem Configuration tasks	Yes	No
	iick toggle between HTML desktop and rmal desktop	Yes	Yes
НТ	ML-based Help	Yes	Yes
Не	lp SDK	Yes	Yes

Start for the Web

True Web Integration Features Start Menu & Taskbar	Internet Explorer 4.0 "The Web PC"	Netscape Constellation	
Start Menu- More control and customization	from the Start menu & Taskbar		
Launch Web icons	Yes	No	
Contains your Favorite Web sites	Yes	No	
Contains History List	Yes	No	
Drag/drop customization of entire Start Menu, including Programs	Yes	No	
Desktop button to switch to OS native view	N/A (already in native OS)	Yes	
Taskbar and Toolbars			
Allows creation of toolbars for launching	Yes	One Activity Selector	

True Web Integration Features Start Menu & Taskbar	Internet Explorer 4.0 "The Web PC"	Netscape Constellation
files/apps		Bar only
Customizable launching area for Web Tasks	Yes	No
Can contain optional address, favorite links, or desktop shortcuts toolbars	Yes	No
Can contain Favorites, tickers, search forms	Yes	No
Extensible by ICPs, ISVs, and Corps	Yes	Unknown
Desktop button for quick access to desktop (minimizes all open windows)	Yes	No
Adjustable toolbar bands	Yes	No
Toolbars can float, dock, or merge anywhere	Yes	No
Always on top & autohide options	Yes	Activity Selector only

Active Desktop

True Web Integration Features Active Desktop	Internet Explorer 4.0 "The Web PC"	Netscape Constellation			
Customizable Desktop - Add rich Web content	to your desktop				
Web Components on the desktop	Yes (natively)	Only in Constellation			
Dynamic HTML	Yes	No			
Multimedia	Yes	Yes			
Java Applets	Yes	Yes			
Floating frames	Yes	Unknown			
JavaScript	Yes	Yes			
ActiveX controls	Yes	Requires Ncompass plug- in (not included)			
Active Documents (Office docs, VB forms, etc.)	Yes	Requires Ncompass plug- in (not included)			
Plug-ins	Yes	Yes			
• HTML 3.2	Yes	Yes			
Built-in Components					
Channel Bar	Yes	Yes			
Notification of downloaded content	Yes	Unknown			
Screen Saver	Yes	Unknown			
Roaming Use & Lockdown					
Transportable (for roaming users)	Yes	Yes			
Create custom desktops and control	Yes	Yes			
General	General				
Automatically update content via Web	Yes	Yes			
Offline caching	Yes	Yes			
Put any HTML content into a desktop component	Yes	Unknown			
Rearrange/resize desktop components to	Yes	Unknown			

	ue Web Integration Features ctive Desktop	Internet Explorer 4.0 "The Web PC"	Netscape Constellation
	any position via drag/drop		
•	Easily add data from web sites via button- click or drag/drop	Yes	Unknown
•	Displays the pre-existing content on users native OS desktop	Yes	Unknown
•	Allows file management via native file management user interface	Yes	No
•	Provides top-level file-system location for users to open/save files via native File Open dialog box	Yes	No
•	One-click access directly to desktop from windows taskbar	Yes	Unknown

Complete Administrative Features

Internet Explorer Administration Kit

Complete Administrative Features Central Administration	Internet Explorer Administration Kit	Netscape Administration Kit & AutoAdmin
Central Administration Features – IE 4.0 is des	signed to reduce your corporate	e cost of ownership
Price	Shipping & Handling only	\$1995
Setup		
Easy, Single-step Wizard-based set-up	Yes	No
Every aspect of the system can be configured or "locked down"	Yes	?
Large-scale deployment	Yes	Unclear
Pre-configuration of the desktop and browser by the administrator	Yes	Yes
Bundle 3 rd party apps and components with install	Yes	No
Hands-free setup in corporate deployment	Yes	Yes
Distribute using CDs or net install	Yes	Yes
Automatic migration of existing configurations	Yes (Netscape)	No
Automatic multiple download site switching	Yes	Unknown
Administration		
Automatic Proxy Configuration	Yes	Yes
Maintenance and Update of User profiles	Yes	Yes
Enhanced logging features	Yes	?
Win95/NT system administrator policies	Yes	No
Roaming User Features – Get your PC anywher	e	
Set up and control remote user profiles for	Yes (Win32 clients with	Yes

Complete Administrative Features Central Administration	Internet Explorer Administration Kit	Netscape Administration Kit & AutoAdmin	
roaming users on a corporate network.	WinNT servers)		
Remote user logon to personal workspace	Yes (Win32 clients with WinNT servers)	Yes	
Intranet/LAN access	Yes (Win32 clients with WinNT servers)	Yes	
Internet Access	Maybe	Yes	
Multiple User Features - Personalized, cost-effective use of shared PCs			
Multiple User Profiles	Yes	Yes	