

Stephen D. Susman
Charles R. Eskridge III
Harry P. Susman
James T. Southwick
SUSMAN GODFREY L.L.P.
1000 Louisiana, Suite 5100
Houston, Texas 77002-5096
Telephone: (713) 651-9366

Parker C. Folse III
Timothy K. Borchers
SUSMAN GODFREY L.L.P.
1201 Third Avenue, Suite 3090
Seattle, Washington 98101
Telephone: (206) 516-3880

Ralph H. Palumbo
Matthew R. Harris
Lynn M. Engel
Philip S. McCune
Lawrence C. Locker
SUMMIT LAW GROUP PLLC
1505 Westlake Avenue N., Suite 300
Seattle, Washington 98109-3050
Telephone: (206) 281-9881

Max D. Wheeler (A3439)
Stephen J. Hill (A1493)
Ryan E. Tibbitts (A4423)
SNOW, CHRISTENSEN & MARTINEAU
10 Exchange Place, 11th Floor
P.O. Box 45000
Salt Lake City, Utah 84145
Telephone: (801) 521-9000

IN THE UNITED STATES DISTRICT COURT
DISTRICT OF UTAH, CENTRAL DIVISION

CALDERA, INC.,

Case No. 2:96CV 0645B

Plaintiff,

Judge Dee V. Benson

vs.

MICROSOFT CORPORATION,

Defendant.

**CALDERA, INC.'S MEMORANDUM IN
OPPOSITION TO DEFENDANT'S
MOTION FOR PARTIAL SUMMARY
JUDGMENT ON PLAINTIFF'S
"TECHNOLOGICAL TYING" CLAIM**

TABLE OF CONTENTS

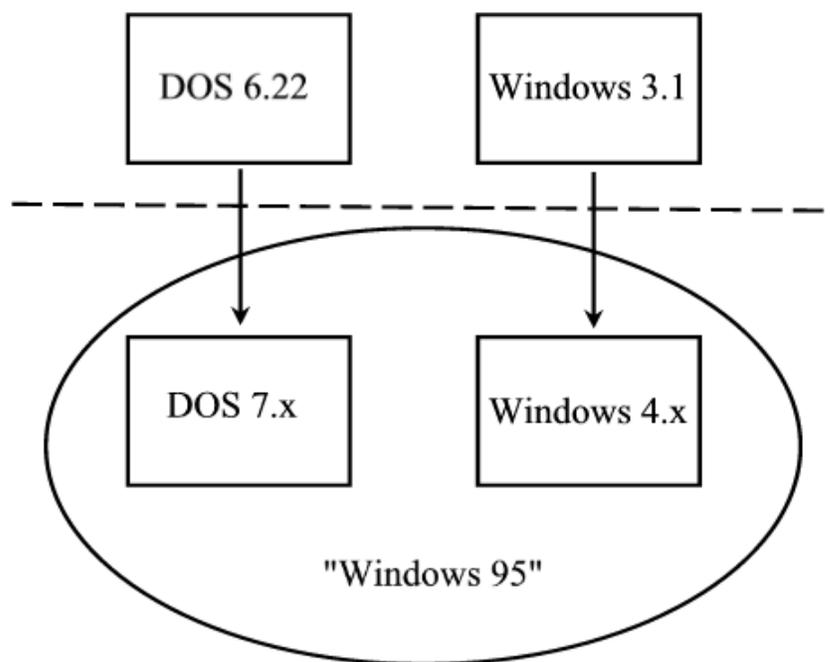
	Page
I. INTRODUCTION.....	iii
II. RESPONSE TO MICROSOFT’S “BACKGROUND” STATEMENT.....	ix
III. RESPONSE TO MICROSOFT’S “STATEMENT OF UNDISPUTED FACTS”	x
IV. ADDITIONAL STATEMENT OF MATERIAL FACTS	xxii
A. Separate Consumer Demand for Two Products: DOS and Windows.....	xxii
B. Windows 95 Is Nothing More Than Windows 4.x and MS-DOS 7.x Packaged Together and Sold as a Single Product.	xxiv
C. Microsoft’s Internal Documents Prove That MS-DOS 7.x and Windows 4.x Are Separate Products and There Was No Technical Reason to Package Them as a Single Product.	xxvi
1. MS-DOS 7.x and Windows 4.x Were Developed as Separate Products.....	xxvii
2. Microsoft Packaged Windows and MS-DOS Together to Eliminate DR DOS and Novell as Threats to Its Desktop Operating System Monopoly.	xxx
3. Microsoft’s Predatory Acts Caused Novell to Discontinue Development and Marketing of DR DOS.	xxxiv
D. Microsoft’s Engineers Admit the Falsity of Microsoft’s Claim That the Windows 95 package Is an “Integrated” Operating System.	xxxix
E. Consumer Demand Would Have Existed for Separate DOS and Windows 4 Products.	xli
V. ARGUMENT	1
A. Windows 95 Is an Illegal Tie.	1
1. Two Products: Separate Consumer Demand Test Governs.	1
a. <i>Jefferson Parish</i> and <i>Eastman Kodak</i> : Consumer demand test.	1
b. <i>Multistate Legal Services</i> : Product improvement does not make two products one for tying purposes.....	2
2. “Technological Tying” Jurisprudence Is Inapplicable Here.	4
a. “Technological tying” cases involve “compatibility tying.”	5
b. Tying of inseparable products.	7
c. New product rationale.	10
d. Separate consumer demand for GUI and DOS products exists.....	11
B. The D.C. Circuit’s Erroneous <i>Dicta</i>	15
1. The D.C. Circuit’s Opinion Is Wrong.	15
a. The D.C. Circuit’s analysis has previously been rejected by the Supreme Court and the Tenth Circuit.....	15
b. Even the authority cited by the D.C. Circuit does not support its position.	17

c.	The cornerstone of the D.C. Circuit’s opinion is a doubt about the institutional competence of judges to decide matters involving the software industry and product design.....	19
d.	The D.C. Circuit opinion is entirely <i>dicta</i>	21
e.	The D.C. Circuit Had No Factual Record Before It, Especially Regarding the “Integration” of Windows and MS-DOS, an Issue Not Even Litigated by the Parties.	21
2.	Even Under D.C. Circuit’s Standard, Caldera Is Entitled to a Jury Trial.	24
C.	Caldera Has Standing to Bring Its Section 1 Claim.	26
1.	Caldera Has Standing as an Actual Competitor.	27
2.	Caldera Has Standing as a Potential Competitor.	29
a.	Ability to finance.....	30
b.	Affirmative action.	30
c.	Background and experience.	32
D.	Caldera’s Section 2 Claim.....	32

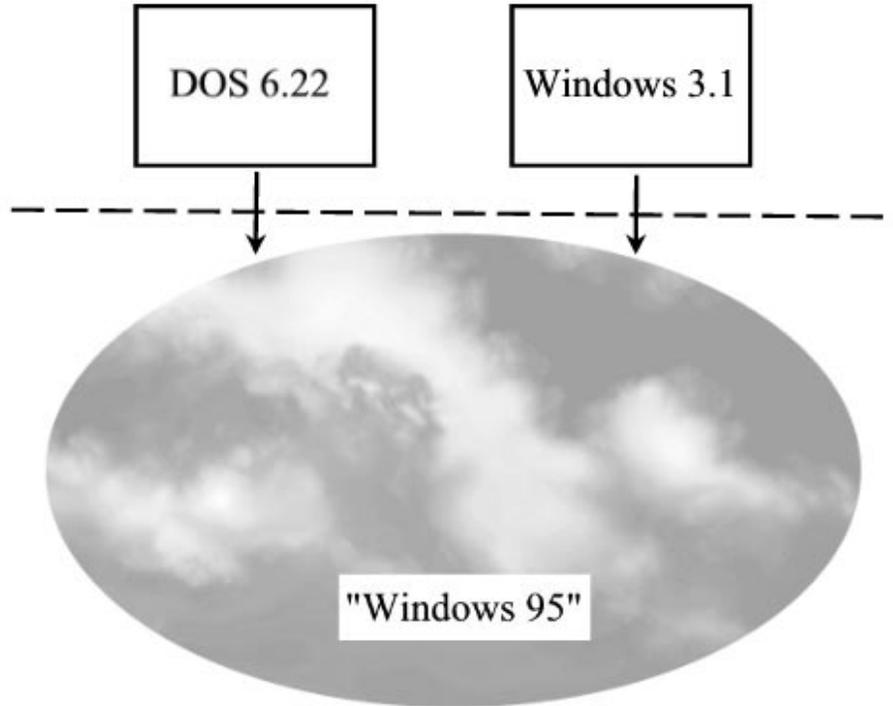
I. INTRODUCTION

For ten years—from 1985 to 1995—Microsoft sold MS-DOS and Windows as separate products. During this time period, Microsoft released seven successive versions of MS-DOS and five successive versions of Windows. The last of these separately marketed products, MS-DOS 6.22 and Windows 3.11, were released in 1993 and 1994. Although Microsoft did not admit it publicly—and denies it to this day—Microsoft released upgraded MS-DOS and Windows versions again in 1995. Microsoft upgraded MS-DOS 6.22 to MS-DOS 7.0 and it upgraded Windows 3.11 to Windows 4.0. Instead of selling them separately, though, Microsoft packaged them together in a single box, labeled the package Windows 95, and presented it to the world as a brand new operating system—a system so “advanced” that it did not need DOS anymore. *See Exhibit 404 to Consolidated Statement of Facts.*

The truth is much different. As Caldera’s experts explain and as Microsoft’s internal documents reveal, the Windows 95 package is simply a naked tie of updated versions of MS-DOS and Windows:



Microsoft is intent on convincing this Court and the public that this is not true, that the Windows 95 package is “a complete, integrated protected-mode operating system that does not require or use a separate version of MS-DOS.” (Exhibit 404 to Consolidated Statement of Facts), and that the supposed integration resulted in great benefits to users. Microsoft wants this Court and the public to believe that the Windows 95 package is not an upgraded MS-DOS tied to upgraded Windows. To create this illusion, Microsoft simply hid MS-DOS 7 behind the screen of blue sky and white clouds displayed during the now-familiar Windows 95 startup process.



Yet Caldera’s experts have demonstrated that, in fact, the Windows 95 package consists of two separate products, and the link between them is no tighter, no more complex and no stronger than it was between the previous versions of MS-DOS and Windows. *See* Expert Report of Lee Hollaar (“Hollaar Report”) at 15-26, Record Support, v. 6 to Consolidated

Statement of Facts; *see also* Deposition of Phillip Barrett (“Barrett Dep.”) at 60-61, Record Support, v. 1 to Consolidated Statement of Facts (Microsoft Windows developer: the Windows 95 package is MS-DOS and Windows tied together with “baling wire and bubble gum”). MS-DOS and Windows are separate products and there is separate consumer demand for them—yet Microsoft decided it would not permit the purchase of one without the other. In short, notwithstanding Microsoft’s characterization of Caldera’s Windows 95 claim, it is a straightforward Section 1 tying claim.

Microsoft undertook the tie in an effort to foreclose competition in the DOS market. At the time Microsoft made the Windows 95 packaging decision, Microsoft had monopolies in the DOS and Windows markets. For years, however, Microsoft had viewed DRI’s DR DOS as a significant threat to its DOS monopoly. When Novell, with its financial and marketing strength, announced its merger with DRI, Microsoft reacted strongly:

Novell is after the desktop This is perhaps our biggest threat. We must respond in a strong way by making Chicago a complete Windows operating system, from boot-up to shut-down. There will be no place or need on a Chicago machine for DR DOS (or any DOS).

Exhibit 309 to Consolidated Statement of Facts (emphasis added).

Make it so there is no reason to try DR DOS to get Windows We need to slaughter Novell before they get stronger.

Exhibit 175 to Consolidated Statement of Facts (emphasis added).

The packaging of MS-DOS and Windows as a single product was not done for any technical reasons or because it benefited users. Rather, the combination of MS-DOS and Windows was a marketing decision, designed to shove DR DOS out of the DOS market. *See, e.g.,* Deposition of Ralph Lipe (“Lipe Dep.”) at 80, Record Support, v. 1 to Consolidated Statement of Facts; Deposition of Paul Maritz (“Maritz Dep.”) at 18-19, Record Support, v. 2 to

Consolidated Statement of Facts. Microsoft's tie of MS-DOS and Windows in the Windows 95 package constitutes a *per se* Section 1 violation.

In an effort to avoid antitrust scrutiny of this conduct, Microsoft consistently mischaracterizes Caldera's claim and makes two diversionary arguments. In its opposition to Caldera's motion to amend the complaint and in its brief here, Microsoft repeatedly asserts that Caldera claims the Windows 95 package is nothing more than MS-DOS 6 packaged together with Windows 3. *See, e.g.*, Microsoft's Memorandum in Support of Its Motion for Partial Summary Judgment on Plaintiff's "Technological Tying" Claim ("Microsoft's Tech. Tying Memo.") at 9, 15, 17 & 18. Microsoft then argues it is so obvious that the Windows 95 package is an improvement over MS-DOS 6 plus Windows 3, that Caldera's claim is patently false. Microsoft couples this argument with its contention that the new features and functionalities available in the Windows 95 package were a direct result of the "integration" of MS-DOS and Windows, and thus the "integration" is not subject to scrutiny. *See id.* at 17-18. This is wrong for several reasons. Caldera has never alleged that the Windows 95 package is nothing more than MS-DOS 6 plus Windows 3. Rather, Caldera offers proof that both products were upgraded—just as they had been upgraded time and again during the prior ten years—and then the two separate products were packaged together. Windows 95 is nothing more than MS-DOS 7 plus Windows 4. That tie is the tie Caldera challenges, not the straw-man tie Microsoft constructs in its brief. Equally important, the new features and functionality in Windows 95 that Microsoft identifies result from the individual upgrades to MS-DOS and Windows, not from packaging the two products together. This point is important: the record demonstrates, and Caldera will prove at trial, that *none of the improvements in the Windows 95 package required—or even resulted from—the MS-DOS/Windows packaging tie.* *See, e.g.*, Hollaar Report at 23-26,

Record Support, v. 6 to Consolidated Statement of Facts; *see also* Lipe Dep. at 113-14, Record Support, v. 1 to Consolidated Statement of Facts.

Microsoft also contends Caldera’s tying claim should be treated differently than all other tying claims. Under well-settled law, a tying claim requires a plaintiff to show: (1) the defendant actually tied two products together; (2) the defendant had appreciable economic power in the tying market; and (3) the tie affected a substantial volume of commerce. *See Eastman Kodak Co. v. Image Technical Services, Inc.*, 504 U.S. 451, 461 (1992). Once all three elements are proven, the plaintiff has established a *per se* violation of the Sherman Act. Rather than explain how Caldera’s claim fails under this established framework, Microsoft offers only the repeated assertion that courts have made it impossible to bring what Microsoft calls “technological tying” claims. *See, e.g.*, Microsoft’s Tech. Tying Memo. at 9-15.

Microsoft’s analysis is premised on its mischaracterization of Caldera’s claim as something other than a straight-forward Section 1 tying claim. It is also premised on a skewed view of the law. Microsoft does not explain what types of claims constitute “technological tying” and thus merit immunity from antitrust scrutiny: Does this immunity attach every time computer software is involved? Does it apply only in highly technical industries? Only when the products are physically integrated? Or, perhaps whenever the defendant attempts to justify the tie by asserting technological benefits?

In fact, there are two relatively small categories of cases where courts have been hesitant to entertain tying claims. The first category involves tying claims where the tied products are integrated so tightly that separation is difficult, if not impossible. The recent D.C. Circuit opinion in the Consent Decree action is such a case. *See United States v. Microsoft Corp.*, 147 F.3d 935 (D.C. Cir. 1998). The second category involves so-called “technological tying” or

“compatibility tying” where the defendant stands accused of developing two products to be compatible only with each other, although *sold separately*. Almost all the so-called “technological tying” cases relied upon by Microsoft fall into this second category.

Caldera, however, makes neither of these claims. In contrast to the facts before the D.C. Circuit, the two products here—MS-DOS 7 and Windows 4—can easily be separated. *See* Hollaar Report at 20-23, Record Support, v. 6 to Consolidated Statement of Facts. And Caldera’s claim does not depend on any changes Microsoft made to Windows 4 that may have rendered it incompatible with pre-existing versions of DR DOS. Rather, Caldera’s claim is that Microsoft’s refusal to offer consumers the choice to buy Windows 4 separate from MS-DOS 7 was an illegal tie, designed to take advantage of Microsoft’s monopoly in the Windows market in order to eliminate competition in the DOS market. Caldera’s tying claim does not raise questions of product design or innovation; it does not assert a “technological tying” claim. It challenges a packaging decision and is no different from numerous other claims that the United States Supreme Court and Tenth Circuit have upheld as unlawful ties.

Microsoft also tries to avoid scrutiny of its Windows 95 packaging decision by arguing that Caldera lacks standing to pursue the claim, because neither Caldera nor its predecessors sold a product identical to the tied product, *i.e.*, MS-DOS 7. But tying law does not require a plaintiff to sell a product exactly identical to the tied product; rather, tying law requires that the plaintiff be a competitor in a properly defined product market for the tied product—which Caldera’s predecessors were. Although in September 1994 Novell decided to stop developing and actively marketing DR DOS, Novell continued to sell DR DOS. Moreover, Caldera continues to sell DR DOS today.

Microsoft argues, though, that it is undisputed Novell had no intention of becoming a competitor because it decided to “exit” the DOS market and therefore Caldera can not have standing as a potential competitor. Microsoft conveniently ignores the fact that its announced intention to tie MS-DOS with Windows in the Windows 95 package, before the tied products were actually released, is what *forced* Novell to surrender the DOS market to Microsoft. It would subvert the very purpose of the antitrust laws to allow a monopolist’s successful threats of illegal conduct to immunize it from liability.

Starting as early as 1992, Microsoft threatened the DOS market with a product tie that would destroy competition. In late 1993 and early 1994, Microsoft flooded the market with statements that it would release Windows 95 by the end of 1994 and that Window 95 “would not need DOS to run.” Novell took the threat seriously. In September 1994, believing that Microsoft would carry out its threat, Novell directed its resources and efforts elsewhere. And Microsoft did carry out its threat—it implemented the product tie as promised, and the DOS market vanished behind a bitmap of blue sky and white clouds.

II. RESPONSE TO MICROSOFT’S “BACKGROUND” STATEMENT

Microsoft presents an eleven-page “Background” that is largely unsupported by any proffer of evidence, or else simply points to specifics in its later “Statement of Undisputed Facts.” *See* Microsoft’s Tech. Tying Memo at ix-xx. To the extent this purported “Background” is argumentative and devoid of evidence, Caldera objects to it providing any basis for Microsoft’s summary judgment motion. To the extent this “Background” cites to the “Statement of Undisputed Facts,” Caldera responds to those numbered paragraphs below. To the extent that this “Background” contains any assertions of fact, Caldera denies each and every one, and will respond specifically to them if and when Microsoft complies with the local rules and sets forth

the factual assertions in separate numbered paragraphs in an amended statement of undisputed material facts.

III. RESPONSE TO MICROSOFT'S "STATEMENT OF UNDISPUTED FACTS"

Caldera incorporates by reference here in its entirety its prior filed Consolidated Statement of Facts. Caldera responds to Microsoft's numbered paragraphs as follows:

1. Caldera denies paragraph 1. All existing versions of MS-DOS do not operate solely in real mode. MS-DOS has long been packaged with a memory manager (EMM386.EXE) that permits MS-DOS to run in Virtual-86 mode rather than real mode. *See* Expert Rebuttal Report of Lee Hollaar ("Hollaar Rebuttal Report") at 19-20, attached as Ex. 1 to Declaration of Lynn M. Engel ("Engel Decl."). In addition, Windows 3.x Enhanced Mode ran DOS (and DOS applications) in Virtual-86 mode, which would allow several concurrent, preemptively multitasked DOS sessions to run at the same time. *Id.* Windows 95 does the same thing with the DOS packaged with it. *Id.* In addition, many DOS applications run in protected mode, because of DOS extenders included with the applications. *See* Deposition of John Constant ("Constant Dep.") at 60-61, Record Support, v. 3 to Consolidated Statement of Facts. Microsoft itself was instrumental in creation of the DOS Protected Mode Interface, which was an important piece in allowing DOS to run in modes other than real mode. *Id.*; *see also* Hollaar Rebuttal Report at 19-20, Engel Decl., Ex. 1.

2. Caldera admits paragraph 2, but notes that the assertion is misleading. Although Windows 3.0 included a seldom used "real mode" option, beginning with Windows 3.1 all Windows applications ran in protected mode. Hollaar Rebuttal Report at 19-20, Engel Decl., Ex. 1.

3. In response to paragraph 3, Caldera admits that Windows 95 was released for general commercial use in August 1995, but denies the remainder of the paragraph. Windows 95 is not an “integrated” operating system, any more than DOS 6.x running with Windows 3.x is an “integrated” operating system. *See* Hollaar Report at 20, Record Support, v. 6 to Consolidated Statement of Facts. Windows 95 is two separate products—MS DOS 7.x and Windows 4.0—packaged together. *Id.*

4. In response to paragraph 4, Caldera admits that Windows 95 has sold millions of copies, but Microsoft has failed to provide Caldera the data to support the specific assertions in this paragraph.

5. In response to paragraph 5, Caldera admits that Windows 95 won numerous awards, but denies that any of the improvements that gave rise to the awards were a result of, or otherwise required that, the MS-DOS and Windows products sold together as Windows 95 had to be packaged as a single product. *See* Hollaar Report at 23-26, Record Support, v. 6 to Consolidated Statement of Facts; Lipe Dep. at 113-14, Record Support, v. 1 to Consolidated Statement of Facts.

6. Caldera denies paragraph 6. Although it is true that the MS-DOS and Windows products sold together as Windows 95 offered new features and functionality over that provided in earlier versions of MS-DOS and Windows when those products were installed together on a personal computer, not one of those new features or functionalities required, or otherwise relied on MS-DOS and Windows being packaged together as a single product—as they are in Windows 95. *See* Hollaar Report at 23-26, Record Support, v. 6 to Consolidated Statement of Facts. Windows 95 is simply a package containing an upgraded version of MS-DOS and an upgraded version of Windows. *See id.* at 19; *see also* Consolidated Statement of Facts ¶¶ 63, 320-340,

391-401 & 414-418. Microsoft ignores testimony and other evidence that all of the new features and functionality in Windows 95 could have been implemented even if MS-DOS and Windows were sold separately. *See id.* ¶¶ 414-418. Microsoft offers no evidence that any purported “new feature[] or functionality” required, or otherwise relied on, the packaging together of Windows and MS-DOS, or that any such “new feature[] or functionality” could not have been achieved by continuing to update and offer those products separately as it had for the preceding ten years. Indeed, the evidence is to the contrary. *See Consolidated Statement of Facts* ¶¶ 64, 159, 161, 325, 328, 334, 396-397 & 414-418.

7. Caldera denies paragraph 7. Windows 95 provided users with an improved Graphic User Interface (“GUI”), just as Windows 3.1 provided users with an improved GUI as compared to Windows 2.0, and Windows 2.0 provided users with an improved GUI as compared to Windows 1.0. *See Hollaar Rebuttal Report* at 20, *Engel Decl.*, Ex. 1. None of the improvements in the Windows 95 GUI required, or otherwise relied on, DOS and Windows being packaged together and sold as a single product. *Hollaar Report* at 23-26, *Record Support*, v. 6 to *Consolidated Statement of Facts*; *Lipe Dep.* at 113-14, *Record Support*, v. 1 to *Consolidated Statement of Facts*; *see also Response to ¶ 6*, above.

8. Caldera denies paragraph 8. Windows 95 does not provide users with a new Virtual Machine Manager. The Virtual Machine Manager have been part of Windows since the release of Windows 3.0 in 1990. *See Hollaar Rebuttal Report* at 20, *Engel Decl.*, Ex. 1. Although the Virtual Machine Manager was updated as part of the changes made in Windows 4.x, it contains legacy code from prior versions. *See Lipe Dep.* at 96, *Record Support*, v. 1 to *Consolidated Statement of Facts*. None of the changes made to the Virtual Machine Manager or the virtual device drivers required, or otherwise relied on, MS-DOS and Windows being

packaged and sold together as a single product. *See* Hollaar Rebuttal Report at 20, Engel Decl., Ex. 1; *see also* Response to ¶ 6, above.

9. Caldera denies paragraph 9. Although Windows 95 provided software developers with access to Microsoft's 32-bit application programming interfaces, that change did not require, or otherwise rely on, MS-DOS and Windows being packaged and sold together as a single product. *See* Hollaar Rebuttal Report at 20, Engel Decl., Ex. 1. In fact, Microsoft first implemented the 32-bit application programming interface in Windows NT and Microsoft created an extension to Windows 3.1 that allows it to support 32-bit applications. *Id.*; *see also* Response to ¶ 6, above.

10. Caldera denies paragraph 10. Windows 95 did not provide a new 32-bit file system that permitted faster access to stored information. The 32-bit file system included as part of Windows 95 was introduced in an earlier version of Windows, *i.e.*, Windows for Workgroups 3.11. *See* Hollaar Rebuttal Report at 20, Engel Decl., Ex. 1. The 32-bit file system did not require, or otherwise rely on, MS-DOS and Windows being packaged together and sold as a single product. *Id.*; *see also* Response to ¶ 6, above. Furthermore, shortly after the commercial release of Windows for Workgroups 3.11, DR DOS was compatible with 32-bit file access. *See* Microsoft's Intentional Incompatibilities Memo., Undisputed Fact 19.

11. Caldera denies paragraph 11. Windows 95 support for long file names is the result of changes made in Windows 4.x. *See* Hollaar Rebuttal Report at 6, Engel Decl., Ex. 1. The changes in Windows 4.x to support long file names do not depend on changes in MS-DOS. *Id.* The only changes required in MS-DOS were minor changes to provide DOS with a minimal awareness of long file names to handle file deletes and renames. *Id.* None of the changes

necessary to support long file names required, or otherwise relied on, MS-DOS and Windows being packaged together and sold as a single product. *Id.*; *see also* Response to ¶ 6, above.

12. Caldera denies paragraph 12. Microsoft's support for "plug-and-play" configuration of hardware devices predated Windows 95. Microsoft produced a version of plug-and-play as early as Windows 3.1. *See* Hollaar Rebuttal Report at 8, Engel Decl., Ex. 1. Moreover, none of Windows 95's improvements to plug-and-play required, or otherwise relied on, MS-DOS and Windows being packaged together and sold as a single product. *Id.*; *see also* Response to ¶ 6, above.

13. Caldera denies paragraph 13. Although Windows 95 provides a "safe mode" boot-up process, none of the changes necessary to implement this functionality required, or otherwise relied on, MS-DOS and Windows being packaged together and sold as a single product. *See* Hollaar Rebuttal Report at 9-10, Engel Decl., Ex. 1; *see also* Response to ¶ 6, above.

14. In response to paragraph 14, Caldera admits that the version of MS-DOS packaged with Windows 95 was important for running programs written for MS-DOS, and that the MS-DOS packaged in Windows 95 performed the boot loader function for Windows 4.x, just as MS-DOS 6.x or DR DOS had performed that function for Windows 3.x. *See* Hollaar Rebuttal Report at 20, Record Support, v. 6 to Consolidated Statement of Facts. Caldera denies, however, that this is a complete description of the functions performed by the MS-DOS packaged with Windows in Windows 95. *See* Response to ¶ 6, above. Microsoft ignores the extensive use of the MS-DOS included with Windows 95. *See* Hollaar Report at 17, Record Support, v. 6 to Consolidated Statement of Facts (noting, for example, hundreds of DOS calls per second); *see also* Lipe Dep. at 54, Record Support, v. 1 to Consolidated Statement of Facts.

15. Caldera admits paragraph 15, but notes that none of the changes required, or otherwise relied on, MS-DOS and Windows being packaged together and sold as a single product. *See Responses to ¶¶ 6, 11 & 14, above.*

16. In response to paragraph 16, Caldera admits that MS-DOS 7.x had to be modified to be made “long file name aware,” but this did not require, or otherwise rely on, MS-DOS and Windows being packaged together and sold as a single product. *See Responses to ¶¶ 6 & 14, above.*

17. Caldera denies paragraph 17. Not all third-party utilities assume that file names are limited to 11 characters. Caldera admits that Microsoft implemented long file names so that programs that were not “long file name aware” would not corrupt long file names, but this did not require, or otherwise rely on, MS-DOS and Windows being packaged and sold together as a single product. *See Responses to ¶¶ 6 & 14, above*

18. Caldera admits paragraph 18, but denies that the change required, or otherwise relied on, MS-DOS and Windows being packaged and sold together as a single product. *See Response to ¶¶ 6 & 14, above.*

19. In response to paragraph 19, *see Responses to ¶¶ 6 & 14, above.*

20. Caldera admits paragraph 20, but denies that the change required that DOS and Windows be packaged and sold as a single product. *See Responses to ¶¶ 6 & 14, above.*

21. Caldera admits paragraph 21, but denies that the change required, or otherwise relied on, MS-DOS and Windows being packaged and sold together as a single product, or that the change was a “new feature of functionality.” *See Responses to ¶¶ 6 & 14, above.* With the “clouds” deactivated, the same “boot noise” appears. These “clouds” are nothing other than Microsoft’s effort to conceal the fact that MS-DOS and Windows are functionally related in the

same way under Windows 95 as when they were offered as separate products. The “clouds” were an attempt by Microsoft to persuade users and the trade press that the computer was starting directly into Windows, rather than the truth, *i.e.*, that just as with prior versions of MS-DOS and Windows, MS-DOS ran as a standalone program and was required by Windows. The fact that the default logo claims that Windows is starting while in fact MS-DOS is running is simple deception. *See* Consolidated Statement of Facts ¶¶ 322 & 396-397. The deception was furthered by other changes, such as the initial message that appears when you start the computer. When you turn on a PC with Windows 95 installed, the first thing you see is the message: “Starting Windows 95. . . .” But this message comes from the MS-DOS kernel file, IO.SYS. In MS-DOS 6.x and earlier, this same message read: “Starting MS-DOS . . .”—and the message came from the same MS-DOS kernel file, IO.SYS. *See* Hollaar Report at 18, Record Support, v.6 to Consolidated Statement of Facts.

22. Caldera admits paragraph 22. It is important to note, however, that this point contradicts Microsoft’s assertion that the package sold as Windows 95 does not contain a complete standalone version of MS-DOS. *See, e.g.*, Microsoft’s Tech. Tying Memo. at xvi, xx (“there was no longer any need to rely on a freestanding version of MS-DOS”; Windows 95 “has no need for the functionality offered by any standalone version of MS-DOS”). In single MS-DOS mode, Windows 4.x has exited. Everything from the loader portion of VMM32.VXD onward has unloaded. All that may remain is WIN.COM, an MS-DOS program, acting as a shell that can restart Windows. MS-DOS is running stand alone. Hollaar Rebuttal Report at 20-21, Engel Decl., Ex. 1.

23. Caldera denies paragraph 23. MS-DOS 7.10 can read FAT32 entries; earlier versions cannot. A hard disk formatted with FAT32 is simply unusable by any previous version

of MS-DOS, including the versions included with the first two releases of Windows 95. Hollaar Rebuttal Report at 11, Engel Decl., Ex. 1. In addition, this later-added change did not require that MS-DOS and Windows be packaged and sold as a single product. *See Responses to ¶¶ 6 & 14, above.*

24. Caldera denies paragraph 24. It misquotes Professor Hollaar and is misleading. The cited testimony from Professor Hollaar is referring specifically to the interrupt-hooking mechanism. This mechanism (Hook_V86_Int_Chain) is not new to Windows 95—it has been part of Windows since Windows 3.0 (code written in 1988-1989). This “complex relationship” is old, documented functionality. And, as history shows, this relationship did not require, or otherwise rely on, MS-DOS and Windows being packaged and sold together as a single product. Indeed, this “complex relationship” was the same relationship that existed between DR DOS and Windows 3.x. *See Hollaar Rebuttal Report at 1, Engel Decl., Ex. 1.* Caldera has brought forth substantial evidence that MS-DOS and Windows are held together in Windows 95 with nothing more than “baling wire and bubble gum,” and that the relationship between MS-DOS and Windows is no more “complex” in Windows 95 than when the two products were packaged separately. *See Consolidated Statement of Facts ¶ 415.* The only change is that users are no longer given the choice of running the latest version of Windows with a DOS other than MS-DOS. *Id.*

25. Caldera denies paragraph 25. The knowledge that Windows 4.x required of MS-DOS was no more important and no more “intimate” than that required by Windows 3.x. *See Responses to ¶¶ 6, 14 & 24, above.*

26. Caldera denies paragraph 26. First, as noted above, MS-DOS 7.x is a complete standalone version of MS-DOS. *See Response to ¶ 22, above.* Second, several changes were

improvements. Microsoft removed support for 80286 and earlier microprocessors, but this was unimportant in 1995 (286 processors had long been supplanted by more advanced processors). As Microsoft asserts in its “Undisputed Fact 28,” this is the sort of change that enabled code size to be reduced, thus reducing the size of DOS, which according to Microsoft was an important enhancement. Third, MS-DOS 7.0 runs Windows 3.1 and is the only Microsoft DOS that can safely run Windows 3.1 once a hard disk contains long file names. Fourth, the point that certain enhancements aided users running Windows was true for prior upgrades of MS-DOS as well. *See Hollaar Rebuttal Report at 20-21, Engel Decl., Ex. 1.*

27. Caldera denies paragraph 27. The “burdens” were not eliminated by forcing users to buy MS-DOS and Windows packaged together as a single product. The burdens were eliminated by requiring MS-DOS 7.x or higher to run Windows 4.x. This is easily achieved by simply including the requirement on the outside of the Windows 4.x box, just as Microsoft requires Windows 95 or higher to run Word 97 (“To use Microsoft Office 97, you need: Microsoft Windows 95 operating system or Microsoft Windows NT Workstation 3.51 Service Pack 5 or later (will not run on earlier versions)”) and required DOS 3.10 or higher to run Windows 3.x. In addition, it is a common practice for one program, in order to run, to require a minimum version of another program. For precisely this reason, DOS and Windows provide well-known, documented APIs that permit programs to determine which version of DOS or Windows is running, and act accordingly. This feature is implemented in Windows 4.x. Different components that make up Windows 4.x call the documented DOS “Get Version” API. If DOS reports that its version is less than 7.x, Windows 4.x will refuse to run. The DOSes that are packaged with Windows 95 and Windows 98 report version 7.x. There is nothing new about this practice. For example, Windows 3.0 Enhanced mode and onward required DOS 3.10 or

higher. Similarly, the 32-bit file access feature of Windows for Workgroups 3.11 required DOS 4.0 or higher, thus eliminating the need to test or support this key feature with earlier versions of DOS, yet MS-DOS was not packaged in the same box as Windows for Workgroups. In short, being compatible only with certain versions of DOS does not dictate that these versions of DOS be packaged in the same box with Windows. *See* Hollaar Rebuttal Report at 5-6, Engel Decl., Ex. 1.

28. Caldera admits paragraph 28, but it is irrelevant. The same results could have been achieved with the requirement (already implemented inside Windows 4.x) that MS-DOS 7.x or higher to run Windows 4.x. *See* Response to ¶ 27, above.

29. Caldera denies paragraph 29. Any reduction in testing was a function not of MS-DOS's "integrated" inclusion in the same package as Windows, but rather of the simple fact that Windows 4.x requires MS-DOS 7.x or higher. Any reduction in the size or complexity of the testing matrix was simply a function of Windows 4.x's refusal to run on versions of MS-DOS prior to 7.x. *See* Response to ¶ 27, above.

30. Caldera denies paragraph 30. Windows 95 already contains multiple setups. Windows 95 must allow for the possibility that the user will want to setup from an older version of DOS, so it contains versions of Windows 3.1 standard mode (DOSX.EXE) and an extended memory manager (XMSMMGR.EXE), to allow setup from such configurations. *See* Hollaar Rebuttal Report at 4-5, Engel Decl., Ex. 1; *see also* Consolidated Statement of Facts ¶ 416.

31. Caldera denies paragraph 31. The Windows 95 setup program is complex and difficult to use. *See* Hollaar Report at 26, Record Support, v. 6 to Consolidated Statement of Facts. Moreover, OEM testimony describes the single setup program as a "serious disadvantage" that created "a lot more work. . . ." Deposition of Roger Harvey ("Harvey Dep.")

at 31-32, Record Support, v. 5 to Consolidated Statement of Facts. In any event, any benefits associated with a single setup program could have been achieved without packaging MS-DOS 7.x and Windows 4.x together and selling them as a single product. *See* Hollaar Report at 25, Record Support, v. 6 to Consolidated Statement of Facts. In fact, Microsoft had earlier worked on such a common install for the separate products—known as “slick.” *See* Barrett Dep. at 45-47, Record Support, v.1 to Consolidated Statement of Facts.

32. Caldera admits paragraph 32.

33. Caldera denies paragraph 33. Novell released Novell DOS 7 in December 1993, and withdrew it from active development and marketing in August 1994. *See* Consolidated Statement of Facts ¶¶ 349 & 406. Microsoft ignores the fact that the decision to withdraw Novell DOS 7 was directly related to Microsoft’s preannouncement of Windows 95, and the purported fact that it would not require or use a separate DOS component. *Id.*

34. Caldera admits that Novell DOS 7 was not a substitute immediately upon the release of Windows 95. Caldera has demonstrated, however, that Novell DOS 7 can be modified to support Windows 4.x and will be prepared to demonstrate this fact at trial. *See* Hollaar Report at 21-23, Record Support, v. 6 to Consolidated Statement of Facts.

35. Caldera admits paragraph 35.

36. Caldera admits paragraph 36, except as follows: Microsoft ignores the fact that Windows 95 in fact killed the DOS market. Having already bought and paid for both DOS and Windows when purchasing Windows 95, no OEM or end-user is likely to purchase a separate DOS. This is a classic tie. The exclusionary effect is, in fact, similar to the results of per processor licensing: no OEM would negotiate a license for an alternative DOS once it had agreed to pay a royalty for any computer shipped. *See* Caldera’s Memorandum in Opposition to

Defendant's Motion for Partial Summary Judgment on Plaintiff's "Licensing Practices" Claim ("Caldera's Response to Microsoft's Summary Judgment Motion on Licensing").

37. Caldera admits paragraph 37.

38. Caldera denies paragraph 38. The cited testimony of Bryan Sparks and Professor Hollaar does not support Microsoft's assertion. Caldera agrees that WinBolt does not yet support every feature of Windows 4.x, but development of WinBolt is ongoing. Offering an updated version of Caldera's DOS to support Windows 4.x is technologically feasible. *See* Hollaar Report at 22-23, Record Support, v. 6 to Consolidated Statement of Facts. No such work has been undertaken because of Microsoft's anticompetitive tie in Windows 95.

39. Caldera admits paragraph 39, except as follows: If Microsoft were prevented from continuing its anticompetitive tie of DOS and Windows in Windows 95/98, Caldera would offer a DOS compatible with Windows 4.x.

40. Caldera denies paragraph 40. Even the quote Microsoft extracts from Professor Hollaar's deposition does not support Microsoft's contention. Professor Hollaar points out only that if Microsoft were not allowed to tie DOS and Windows together by packaging them in a single package called Windows 95, some users might want to receive a copy of a disk that contained DR DOS and Windows 4.x. Similarly, OEMs would have the option of installing DR DOS and Windows 4.x. Caldera has brought forth evidence that OEMs wanted Windows and MS-DOS to be offered separately, and that Microsoft conducted no survey of OEM or end-user attitudes to determine whether they wanted a combined product. *See* Consolidated Statement of Facts ¶¶ 64, 160, 323-325 & 417.

IV. ADDITIONAL STATEMENT OF MATERIAL FACTS

A. Separate Consumer Demand for Two Products: DOS and Windows.

1. For years, OEMs and PC users had the option of purchasing either DR DOS or MS-DOS to run with Microsoft's popular software application, Windows.

2. At the time the initial version of DR DOS was released in 1988, Microsoft had monopoly power in the DOS market with its operating system, MS-DOS. Expert Report of James R. Kearl ("Kearl Report") at 11, Record Support, v. 6 to Consolidated Statement of Facts. In addition, after the release of Windows 3.0 in May 1990, Microsoft had monopoly power in the Windows market (the "GUI market" defined in Caldera's First Amended Complaint). *See* First Amended Complaint ¶ 64; *see also* Kearl Report at 30; Deposition of Steve Ballmer ("Ballmer Dep.") at 139, Record Support, v. 1 to Consolidated Statement of Facts; Maritz Dep. at 148-49, v. 2 to Consolidated Statement of Facts.

3. Because each new version of DR DOS incorporated additional features and functionality long before those features and functionality were available in MS-DOS, Microsoft executives recognized that DR DOS was a serious threat to its desktop operating system. *See* Consolidated Statement of Facts ¶¶ 30 & 31; *see also* Caldera's Opposition to Microsoft's Motion for Partial Summary Judgment on "Product Disparagement" Claims ("Caldera's Response to Microsoft's "Product Disparagement" Claims Motion"), Statement of Additional Material Facts ¶¶ 1, 2, 14 & 15. For example, DR DOS 5.0 was released to the market 13 months before MS-DOS 5.0; DR DOS 6.0 was released 18 months before MS-DOS 6.0. *See* Consolidated Statement of Facts ¶¶ 292 & 307; *see also* Caldera's Response to Microsoft's "Product Disparagement" Claims Motion, Statement of Additional Material Facts ¶¶ 1 & 9.

4. Despite DR DOS' advanced features and functionalities, Microsoft was only able to maintain its DOS monopoly after 1988 by using the predatory practices alleged in Caldera's First Amended Complaint. *See* First Amended Complaint, ¶¶ 42 - 63; *see also* Caldera's Oppositions to Microsoft's Motions for Partial Summary Judgment on Plaintiff's "Licensing Practices," "Product Disparagement," and "Product Preannouncement" Claims and Caldera's Consolidated Response to Microsoft's Motions for Partial Summary Judgment on Plaintiff's Claims of "Predisclosure," "Perceived Incompatibilities" and "Intentional Incompatibilities" ("Caldera's Consolidated Response to Microsoft's Summary Judgment Motions").

5. Given the popularity of Windows, Microsoft knew Windows was key to maintaining its DOS desktop operating system monopoly. *See* Consolidated Statement of Facts ¶ 54; *see also* Caldera's Consolidated Response to Microsoft's Summary Judgment Motions, Statement of Additional Material Facts ¶ 20.

6. Accordingly, from 1990 to 1995, Microsoft successfully used several different means to tie MS-DOS and Windows 3.x in order to force OEMs to license MS-DOS instead of DR DOS. Microsoft tied Windows and MS-DOS directly, by refusing to sell the two products separately. *See* Consolidated Statement of Facts ¶¶ 282-284.

7. Microsoft also tied Windows 3.x and MS-DOS by offering prices for both products together that were significantly less than the price offered for Windows alone. For example, Joachim Kempin, Microsoft's Director of Worldwide OEM Sales, told Germany's largest PC manufacturer that, if it did not sign an MS-DOS per processor license, Microsoft would charge \$11 more for Windows alone than it would charge for both Windows and MS-DOS together. *See* Consolidated Statement of Facts ¶¶ 114-115; *see also* Deposition of Theo Lieven ("Lieven Dep.") at 48-63, Record Support, v. 5 to Consolidated Statement of Facts.

8. In addition, Microsoft effectively tied Windows and MS-DOS by creating false incompatibilities between DR DOS and Windows 3.1. *See* Caldera’s Opposition to Microsoft’s Motion for Partial Summary Judgment on “Product Disparagement” Claims and Caldera’s Consolidated Response to Microsoft’s Summary Judgment Motions.

9. Microsoft was aware that its tying practices violated the antitrust laws:

Uhhh . . . denying DRI the VxD [Windows 3.1 virtual driver] smells of an antitrust lawsuit. You are not suppose to use your control of one market, in this case Windows, to influence another market, in this case DOS. err something like that.

Exhibit 99.

10. Nonetheless, Microsoft embarked on a deceptive but even more effective way to tie Windows and MS-DOS: Microsoft packaged upgraded versions of MS-DOS and Windows as a single piece of software and named the package “Windows 95.”

B. Windows 95 Is Nothing More Than Windows 4.x and MS-DOS 7.x Packaged Together and Sold as a Single Product.

11. Windows is not an “integrated” software product. Windows 95 is two products—an upgraded version of MS-DOS and an upgraded version of protected-mode Windows—packaged together using a common installation program and blue cloud graphics to make them appear to be a single product. *See* Hollaar Report at 19, Record Support, v. 6 to Consolidated Statement of Facts.¹

12. The best proof that MS-DOS 7.x and Windows 4.x in the Windows 95 package are two separate products is the fact that the two products can be easily separated and in the same way as previous Microsoft products.

¹ Indeed, Windows 95 software code labels its real-mode operating system “MS-DOS 7” and its protected mode operating system “Windows 4.” *See* Hollaar Report at 18, Record Support, v. 6 to Consolidated Statement of Facts. Those designations are used throughout this brief to refer to updated versions of MS-DOS and Windows included in the package called Windows 95.

13. MS-DOS 7.x can be easily isolated by changing the “BootGUI” setting from 1 to 0, or by pressing F8 during the loading process. *See* Hollaar Report at 19, Record Support, v. 6 to Consolidated Statement of Facts. Once isolated, MS-DOS 7.0 can be used as a stand-alone DOS operating system to run popular DOS applications. It can run Windows 3.x—just as did its predecessors, MS-DOS 5 and 6. *Id.* at 21, Record Support, v. 6 to Consolidated Statement of Facts. MS-DOS 7.x even passes the AARD code test, which is Microsoft’s own test for detecting MS-DOS. *Id.* And, while there are some new features in MS-DOS 7.x, none require, or otherwise rely on, MS-DOS 7.x being packaged with Windows 4.x and sold as a single product. *See* Hollaar Rebuttal Report at 21, Engel Decl., Ex. 1. In short, MS-DOS 7.x is an upgraded version of MS-DOS, a product that was sold as a separate product for nearly ten years and for which there was separate consumer demand.

14. Similarly, Windows 4.x can be isolated. *See* Hollaar Report at 21-23, Record Support, v. 6 to Consolidated Statement of Facts. And again, while there are new features and functionality in Windows 4.x, none require, or otherwise rely on, Windows 4.x being packaged together with MS-DOS 7.x and sold as a single product. *See* Hollaar Rebuttal Report at 21, Engel Decl., Ex. 1. Indeed, Windows 4.x can be run with an enhanced version of DR DOS in place of MS-DOS 7.x. *See* Hollaar Report at 22, Record Support, v. 6 to Consolidated Statement of Facts.

15. The Windows 95 package does not integrate features or functionality in a way that an OEM or PC user could not. If Microsoft offered the two products separately—MS-DOS 7.x and Windows 4.x—an OEM or PC user could buy the separate products and combine them to produce the same features and functionality contained in the Windows 95 package—in short, the OEM or user combination would be identical to Windows 95. Alternatively, the OEM or PC

user could buy and combine an enhanced DR DOS and Windows 4.x to make a product that has the same features and functionalities contained in Windows 95. *See* Hollaar Report at 23 & 25-26, Record Support, v. 6 to Consolidated Statement of Facts.

16. There would even be technical *advantages* to users of using the enhanced version of DR DOS and Windows 4.x package. Those advantages derive from the unique attributes of DR DOS. Among other things, the DR DOS/Windows 4.x combination could provide more memory for applications programs; it could provide an environment that would allow easy switching between DOS and Windows; and the DR DOS/Windows 4.x combination could be more reliable because it would be less prone to users corrupting the real-mode subsystem. *See* Hollaar Report at 24-25, Record Support, v. 6 to Consolidated Statement of Facts.

17. If Microsoft had offered Windows 4.x as a standalone product, as well as a component of the Windows 95 package, DR DOS would not have been driven from the market. Microsoft would have faced continued competition, thereby limiting its ability to raise prices, as it did when DR DOS was forced to withdraw. *See* Kearl Report at 24-26, Record Support, v. 6 to Consolidated Statement of Facts. Moreover, DR DOS would have continued to provide technical leadership and make improvements to DOS, thereby forcing Microsoft to attempt to match or exceed improvements—all to the benefit of consumers.

C. Microsoft's Internal Documents Prove That MS-DOS 7.x and Windows 4.x Are Separate Products and There Was No Technical Reason to Package Them as a Single Product.

18. The defenses Microsoft asserts to Caldera's tying claim are contrary to the facts recorded in Microsoft's internal e-mail and other documents. Microsoft's internal documents prove: (1) Microsoft developed MS-DOS 7.x and Windows 4.x as separate products; (2) Microsoft did not have to package the two products together and sell them as a single product to

achieve the features and functionality it claims are available with Windows 95; and (3) Microsoft combined the two separate products to foreclose DR DOS from the market and maintain Microsoft's desktop operating system monopoly.

19. A word of caution: Microsoft's use of names and numbers for various systems and subsystems was not consistent over the 1990-1995 period. For example, Microsoft sometimes used the terms "Win4," "Windows 4" and "Win-32" to refer to the product that was to become the Windows 95 package, and sometimes used the same terms to refer only to the Windows 4.x portion of Windows 95. Microsoft used the term "Chicago" to mean the project that became the Windows 95 package, but, as shown below, the "Chicago" project initially included the package of Windows 4.x and MS-DOS 7.x, and standalone versions of both Windows 4.x and MS-DOS 7.x. For clarity this memorandum indicates in brackets and *italics* when it is possible to tell from context which system or subsystem is referenced by the author of the document. *Windows 4.x* will be used to identify the Windows 4.x portion of Windows 95; *MS-DOS 7.x* will be used to identify the MS-DOS 7.x portion of Windows 95; and *Windows 95* will be used to indicate the package of Windows 4.x and MS-DOS 7.x that Microsoft actually released.

1. MS-DOS 7.x and Windows 4.x Were Developed as Separate Products.

20. In October 1990, neither Bill Gates nor Steve Ballmer were focused upon packaging Windows and MS-DOS together. Gates gave a presentation on "Information at Your Fingertips" that showed "Win 4.0" sitting atop MS-DOS for shipment in 1993. Exhibit 82. Ballmer's presentation at an OEM briefing the next day stated that Microsoft's strategy would be to put its energy behind Windows, and, "*then leverage Windows back to DOS. . . .*" Exhibit 84.

21. By the end of 1990, two teams at Microsoft were developing the separate MS-DOS and Windows products that Microsoft would ultimately choose to package together and sell as Windows 95. David Cole, a key Microsoft developer, stated, “[t]hese components will be built in a ‘portable’ fashion so they can be used *for Windows ...on DOS.*” Exhibit 95 (emphasis added).

22. In early 1991, Microsoft distributed a “white paper” in which it acknowledged that no technical reasons prevented Windows and DOS from being developed as separate products essentially forever, nor did any technical reason compel their merger:

. . . Microsoft’s graphical operating system, Windows, runs on top of MS DOS, preserving customer investments in DOS applications and peripheral hardware.

. . . .

There are no foreseeable technological barriers to this approach: Microsoft is adding new technologies—such as object-oriented user interface functions, file systems, programming environments, and distributed computing capabilities—to Windows and DOS in this evolutionary manner.

Exhibit 103 (emphasis added).

23. In his deposition, Paul Maritz, Microsoft’s Senior Vice President for Operating Systems and Development, repeatedly admitted that MS-DOS 7.0 was a “subset” of Windows 95. *See* Maritz Dep. at 144-148, Record Support, v. 2 to Consolidated Statement of Facts.

24. Moreover, Maritz admitted the decision to release only the package of MS-DOS and Windows, and not to release the standalone MS-DOS 7.x product, was made by himself, Bill Gates and Steve Ballmer sometime after 1993. *See* Maritz Dep. at 109, Record Support, v. 2 to Consolidated Statement of Facts.

25. Thus, Microsoft’s software developers wrote upgraded versions of MS-DOS and Windows, *i.e.*, MS-DOS 7.x and Windows 4.x. Later, Microsoft’s most senior executives decided to offer a single package consisting of the two separate products. As Microsoft documents demonstrate, packaging the two products was a “marketing” decision.

26. Microsoft’s senior executives publicly admitted that there were no technological advantages in offering an MS-DOS/Windows package. In a 1991 *PC User* interview, Steve Ballmer confirmed this fact during the Windows 3.1 development cycle:

Q. What about the relationship between DOS and Windows? Or to put it another way, is Windows *ever* going to incorporate DOS and become an operating system itself?

A. Today, Windows *is* an operating system. . . . So Windows is mostly an operating system, and it has been designed synergistically with DOS to run alongside DOS.

* * *

Q. But why not put the file system and other functions in Windows so that GUI users can have a single operating system?

A. Good question. There’s a little bit more we can do, *and we’ll certainly be providing OEMs with an installation program that installs DOS and Windows as if they were one product. But not all hardware vendors want to sell Windows and not all end-users want to run Windows. And there is nothing we give up technically by offering Windows and DOS separately*; any new features in DOS will be designed totally to make sense in the context of what is going on in Windows.

Engel Decl., Ex. 3 (emphasis added).

27. Ralph Lipe—one of Windows 95’s chief architects, produced by Microsoft as its 30(b)(6) designee on Caldera’s Windows 95 tying claim—confirmed Ballmer’s admission that no technical benefit is derived from the MS-DOS/Windows package. After discussing the ability

to offer the MS-DOS and Windows portions of Windows 95 as standalone products, he conceded that (apart from requiring two setup programs and some additional testing) “you would have the same functionality . . . once you were done with the setup process.” Lipe Dep. at 113-114, Record Support, v. 1 to Consolidated Statement of Facts; *see, generally, id.* at 101-114.

2. Microsoft Packaged Windows and MS-DOS Together to Eliminate DR DOS and Novell as Threats to Its Desktop Operating System Monopoly.

28. The competitive situation changed dramatically for Microsoft in the Summer of 1991. Novell announced its merger with DRI, thereby putting the financial strength and marketing success of Novell behind DR DOS.

29. In the wake of the merger announcement, senior Microsoft executives immediately began planning to package MS-DOS and Windows together using a common installation program. The purpose: eliminate the market for DR DOS and prevent Novell from signing DR DOS license agreements with OEMs. Jim Allchin wrote Bill Gates and Steve Ballmer:

The news on the street continues to confirm the IBM and Novell announcements this week. DRDOS 6, Novell bundling, SLRP, and IBM reselling DRDOS are the words. Still no real data on the details.

MS Response:

....

2. *integrate Windows with DOS. Common install. Make it so that there is no reason to try DRDOS to get Windows.* This is much more important than 1, given the OEM deals that Novell will try to do for DRDOS on the clone machines.

We must slow down Novell... As you said Bill, it has to be dramatic.

.....

We need to slaughter Novell before they get stronger.

Exhibit 175 (emphasis added).

30. As early as March 1991, there are indications that Microsoft planned to package MS-DOS and Windows together as a means of eliminating DR DOS as a competitor. Gordon Letwin, one of Microsoft's chief DOS architects, stated that the purpose of "WIN4" [Windows 95] was to "lock out cloners," e.g., DR DOS. But he warned that Microsoft would have to price Windows 95 equal to the combined price of MS-DOS and Windows 3.x, or it would lose revenues:

—Reclaim market from Cloners
your proposal only half way addresses this. *In a sense, you lock cloners out of the WIN4 market, but we only benefit from this if you increase the price of WIN4 to be that of WIN3 + DOS. Otherwise, we've destroyed the DOS market under WIN4, revenue-wise, so this is a pyrrhic victory.*

Exhibit 113 (emphasis added).²

31. Two weeks later, Ben Slivka, a key member of the MS-DOS and Windows Product Group, summarized Microsoft's plans:

So, DOS is still DOS. It runs on all x86 platforms. After we tune up DOS 5.0 and add new disk support (and flash memory card file systems, etc.), we can sell that as DOS 5.1, say. And we can sell DOS + EnhDOS as DOS 6.0. Or, we can sell EnhDOS + Win4 as Win4 [Windows 95]. These are strictly packaging issues, and our development approach does not dictate which one we pursue.

.....

If DOS 5.1 is sufficient on its own to deter cloners, then there is no reason we have to merge DOS and EnhDOS. If it is not sufficient, then we can easily merge the two.

Exhibit 117 (emphasis added).

² Paul Maritz testified that the "WIN4" referred to by Letwin was "the project that became Windows 95." Maritz Dep. at 70, Record Support, v. 2 to Consolidated Statement of Facts; see also *id.* at 71.

32. In Slivka's e-mail, "MS-DOS 5.1" refers to the product Microsoft eventually released as "MS-DOS 6.0". Slivka says clearly that if DOS 5.1 (MS-DOS 6.0) is enough to kill DR DOS, there is no reason to tie portions of Windows to MS-DOS. More significantly, Slivka confirms Caldera's claim that MS-DOS 7.x and Windows 4.x were developed as separate products, and the decision to package them together in Windows 95 was a marketing, not a technical, issue:

Or, we can sell EnhDOS + Win4 as Win4 [Windows 95]. These are strictly packaging issues, and our development approach does not dictate which one we pursue.

33. By May 1992, Chicago was being designed as a package of Windows and MS-DOS:

SYSTEMS DIVISION QUARTERLY REPORT

.....

The kernel functions of "Chicago" (next major version of Windows & MS-DOS) are now functional, and the team is looking at a first developers release in late Q1'CY93.

Exhibit 298 (emphasis added). A Microsoft presentation explicitly notes that "Chicago" would be "Windows and new MS-DOS packaged together." Exhibit 299 (emphasis added).

34. Microsoft's internal communications make it clear that this packaging decision was in response to the threat created by the Novell/DRI merger. Paul Maritz, Microsoft's third-ranking executive, states in a July 1992 e-mail:

In the corporate market we should probably start to raise the profile of . . . Chicago—we have to keep the focus on Windows as the way to go, and start to undermine Novell's story that DOS and Windows decision can be made entirely separately. Maybe we need a corporate Chicago tour later this year that under NDA shows how we are going to mate DOS and Windows and shows how Chicago technically cant work on DR-DOS.???

Exhibit 316 (emphasis added).

35. In June 1992, Brad Silverberg, the senior executive responsible for MS-DOS and Windows, circulated the “Chicago Strategy Document”:

Chicago is the code name for the next major release of Windows from the Personal Systems Group.

....

Competition in the operating system business is intense. *There are a number of dire competitive threats which Chicago must address.*

Novell is after the desktop. . . . We must respond in a strong way by making Chicago a complete Windows operating system, from boot-up to shut-down. There will be no place or need on a Chicago machine for DR-DOS (or any DOS).

....

While Chicago is being developed as a single integrated Windows operating system, *it's being designing and built so that 3 specific retail products can be packaged up and sold separately. **Which products actually ship other than full Chicago is a marketing issue.***

....

Exhibit 309 (emphasis added).

36. As is clear from the Strategy Document, Microsoft's decision to package MS-DOS and Windows was “a *marketing* issue,” not a decision driven by technical needs, new features or functionality.

37. Microsoft will undoubtedly claim that “Chicago” changed after the Strategy Document was written in 1992. In his deposition, Silverberg repeatedly stated that “Chicago” changed and that Windows 95 actually bore little resemblance to the project outlined in the Strategy Document. *See* Deposition of Brad Silverberg (“Silverberg Dep.”) at 251-252, 262, 264, 265 & 271, Record Support, v. 2 to Consolidated Statement of Facts.

38. Silverberg’s deposition testimony is directly contradicted by statements he made in an internal Microsoft document in 1994:

Recently I discovered a document on my hard disk called “STRATEGY.DOC.” It was written in June of ‘92 to communicate to the team and to the executives what the key elements of Windows 95 (it was Chicago then) were. Then we boiled it down to what we called the 10 Commandments of Windows 95. I thought, “This should be funny, reading what we thought two years ago that this product was going to be.” As I read it, what struck me was, “Wow! We had really nailed it! We built that product!” So, before we had even gotten that deep into writing any of the code, we clearly understood what that product was and stayed focused on building it. In fact, we had articulated it so well that I was just blown away. We made the right choices. What seemed compelling in 1992 is just as compelling and exciting in 1994.

Exhibit 433 (emphasis added).

3. Microsoft’s Predatory Acts Caused Novell to Discontinue Development and Marketing of DR DOS.

39. As early as mid-1992, Microsoft started to “leak” information that “Chicago” would not work with DR DOS. Paul Maritz stated in a July 1992 e-mail:

In the corporate market we should probably start to raise the profile of ... Chicago — we have to keep the focus on Windows as the way to go, and start to undermine Novell’s story that DOS and Windows decision can be made entirely separately. Maybe we need a corporate Chicago tour later this year that under NDA shows how we are going to mate DOS and Windows and shows how Chicago technically cant work on DR-DOS.???

Exhibit 316 (emphasis added).

40. In 1992 and 1993, Microsoft told the industry press—and made presentations—disclosing a product variously called, “MS-DOS 7.0” and “Chicago.” Microsoft said the product would be released to the market in 1993 or 1994, and that it would likely include DOS and Windows, “in the same box.” See, e.g., Exhibit 338 (*InfoWorld*, December 28, 1992) (“another version of DOS is only a year or two away. ... *This new version, which will likely include*

Windows in the same box as DOS, has been referred to as both DOS 7.0 and ‘Chicago’”); Exhibit 331 (presentation to Gateway, November 24, 1992, showing future release of MS-DOS 7.0 in 1994); Exhibit 339 (presentation to Far East OEMs, 1993, showing release of MS-DOS 7.0 in 1994); Exhibit 346 (“System Strategy Overview” presentation, March 1993, showing release of MS-DOS 7.0 in 1994); Exhibit 342 (presentation independent software vendors, January 1993, “*Chicago is the code name for the successors to MS-DOS 6.0, Windows 3.1... that we plan to release early in 1994...*”); Exhibit 347 (*InfoWorld*, March 15, 1993, “*Chicago will actually result in two separate systems offerings—DOS 7 and the next version of Windows, which will not need DOS to run*, Maritz said. . . . Officials repeatedly said the two projects would emerge from Microsoft’s development teams in 1994”).

41. At the launch of MS-DOS 6.0 on March 30, 1993, Bill Gates said Chicago would be released in early 1994:

MS-DOS 7.0—code named “Chicago” internally at MICROSOFT—will be out in a year. . . . Gates said DOS 7.0 will be “Windows for DOS and DOS itself.”

Exhibit 351.

42. Throughout 1993, Microsoft continued to say publicly that Chicago would be released in 1994 and would not need DOS to run. On June 15, 1993, U.S. News and World

Report reported:

... some details about next year’s DOS and Windows releases are beginning to emerge.

MS-DOS will continue to be improved ... says Brad Chase, general manager, MS-DOS. . . . In addition, he says, “We may put things in MS-DOS that will help Windows apps run faster.”

Code-named Chicago, the next version of Windows will not need DOS in order to run.

Exhibit 364 (emphasis added).

43. In January 1994, Microsoft invited “key technical press” to attend its professional developers conference and, moreover, sent a letter to “all press” to continue to disclose that “Chicago is scheduled to ship in the second half of 1994.” Exhibit 404.

44. After Gates, Ballmer and Maritz decided not to release a standalone MS-DOS 7.x sometime in early 1994, Microsoft increased its public efforts to create the illusion that DOS was nowhere within Chicago. In a letter sent to “all press explaining ... Chicago,” Microsoft stated:

Chicago will be a complete, integrated protect-mode operating system *that does not require or use a separate version of MS-DOS,*
....

Exhibit 404 (emphasis added).

45. In April 1994, Goldman, Sachs, Microsoft’s leading financial analyst reported publicly:

We met with the product manager of Chicago (upcoming new version of DOS and Windows) who indicated *the product is still on schedule to ship later this calendar year.*

Exhibit 421 (emphasis added)

46. In May 1994, Brad Silverberg publicly disclosed at a “Reviewers Workshop”:

Schedule and Packaging for Windows “Chicago”
Ship: 2H 1994
Exact packaging decision are not yet final

Exhibit 422.

47. Silverberg’s public promise that Chicago would ship in the second half of 1994 was knowingly false. Microsoft’s “post mortem” memorandum on the Reviewers’ Workshop, states that Microsoft could look forward to several cover stories on “Chicago” that Summer of 1994—*fully one year before the launch of Windows 95.* See Exhibit 423.

48. In April 1994, Ray Noorda retired and turned over the day-to-day management of Novell to the new president and CEO, Bob Frankenberg, a Hewlett-Packard executive hired as Noorda's successor. Noorda retired from Novell's Board of Directors in November 1994; Frankenberg replaced him as Chairman; and the transition was complete. Exhibit 434.

49. By July 1994, Microsoft was flooding the market with information about Chicago:

During last month we put a number of electronic information distribution networks in place to distribute Chicago information. The goal is to achieve near simultaneous distribution of Chicago information worldwide.

The material we're distributing consists of whitepapers, press releases, guides, speeches, powerpoint slides, and Q&As. The information we have sent out so far includes: [lengthly list of documents attached].

Exhibit 425. *See* Exhibit 426 & 429.

50. Throughout the Spring and Summer of 1994, Frankenberg reviewed Novell's product lines and business plans to determine the course he would chart for the company's future. He decided to focus on Novell's strengths – networking and the Netware product line—and to concede the DOS business to Microsoft. *See* Deposition of Robert Frankenberg (“Frankenberg Dep.”) at 239, Record Support, v. 3 to Consolidated Statement of Facts.

51. With his experience as an OEM executive, Frankenberg knew Microsoft's predatory practices – including knowingly false product announcements, predatory licensing practices, creation of real and perceived incompatibilities between DR DOS and Windows, and tying of MS-DOS and Windows – had effectively destroyed DR DOS' ability to achieve sales to OEMs, thereby eliminating the revenue stream that was necessary to justify Novell's expenses of

continuing to develop and market DR DOS. *See* Frankenberg Dep. at 299, Record Support, v. 3 to Consolidated Statement of Facts

52. Further, Microsoft's public relations campaign had convinced the market that the forthcoming release of Chicago would end the DOS market altogether. Seeing little chance of breaking Microsoft's iron grip on the desktop operating system market, Frankenberg determined in August 1994 that Novell should discontinue development and active marketing of Novell DOS 7. Frankenberg Dep. at 264, Record Support, v. 3 to Consolidated Statement of Facts; Exhibits 400 & 430.

53. A Novell August 1994 memorandum documents the reasons Novell stopped development and active marketing of DR DOS:

Due to the lock-out Microsoft has achieved in the OEM market and the imminent combining of DOS and Windows in Chicago no significant revenue can be expected from the OEM Channel.

Exhibit 430.

54. With the pressure from Novell finally off, Microsoft issued this statement on December 20, 1994:

Microsoft Corporation today announced that Windows 95 may not be available until August 1995. The company made this announcement based on its continued commitment to deliver a vigorously tested product of the highest quality.

Exhibit 435.

55. Microsoft reaped the rewards of maintaining its unlawful monopoly. Windows 95 brought in gross revenue of "approximately 3 to \$4 billion" in Microsoft's 1997 fiscal year. Maritz Dep. at 78, Record Support, v. 2 to Consolidated Statement of Facts.

D. Microsoft’s Engineers Admit the Falsity of Microsoft’s Claim That the Windows 95 package Is an “Integrated” Operating System.

56. Microsoft claims in its summary judgment motion that the Windows 95 package is a technologically integrated operating system. Senior Microsoft business and marketing executives made the same claim in their depositions. Deposition of David Cole (“Cole Dep.”) at 112 & 115, Record Support, v. 1 to Consolidated Statement of Facts; Deposition of Brad Chase (“Chase Dep.”) at 236, Record Support, v. 1 to Consolidated Statement of Facts.

57. In sharp contrast, Microsoft’s software engineers who developed Windows 95 were more candid. The most candid testimony was given by two key individuals on the Windows 95 project: Richard Freedman, the MS-DOS 6.0 and Windows 95 Product Manager, and Phil Barrett, a lead developer on MS-DOS 5.0, Windows 3.1 and, until his departure in October 1994, Windows 95. Barrett’s testimony is devastating to Microsoft’s defense:

Q. I think when you and I talked about it before, you described Windows 95 as DOS and Windows stuck together with baling wire and bubble gum?

A. That is a fair if colloquial representation of it, yes.

Q. And what do you mean by that?

A. That basically, yes, *there is DOS on the underlying—under the hood there is DOS*. There is a form of DOS, a version of DOS that was—and I don’t know all of the details of what developed. I don’t understand all they did there, but you can actually produce a bootable DOS diskette. There is still 16-bit code inside.

Q. *And when you said they were tied together with baling wire and bubble gum, you were referring to the amount of integration between DOS and Windows in Windows 95?*

....

A. *Yes.*

Barrett Dep. at 60-61, Record Support, v. 1 to Consolidated Statement of Facts (emphasis added).

58. Barrett was perfectly clear that it was *not* required for there to be a single product to take advantage of any technical advances in Windows 95, and to the contrary, “[i]t could have been done as two separate products.” *Id.* at 63. The only “technical” advantage of having a single product was to have a single installation. *Id.* at 63-64. But, as shown above, Ballmer admitted that a common installation *program was not a technical benefit*. See Statement of Additional Materials Facts ¶ 27, above. When pressed, Barrett also admitted that the actual design challenge was the same whether it was a single combined installation program, or a separate DOS-then-Windows installation. *Id.* at 66-67. A combined install is feasible even with separate products. See Barrett Dep. at 46-47, Record Support, v. 1 to Consolidated Statement of Facts.

59. Yet Paul Maritz, the Senior Vice President in charge of the Windows 95, could not recall seeking *any* input from either OEMs or ISVs as to whether single or multiple products were preferred. Maritz Dep. at 20, Record Support, v. 2 to Consolidated Statement of Facts.

60. Freedman admitted that “MS-DOS functionality certainly became part of Windows 95”; that “Windows 95 actually has enhanced MS-DOS functionality in it that is not in MS-DOS 6.2”; and that “the continuing enhancement of MS-DOS was going to take place under the umbrella of Windows 95.” Freedman Dep. at 129, 137 & 140, Record Support, v. 1 to Consolidated Statement of Facts.

61. Freedman also admitted that it was feasible to separate out the DOS component to ship separately: “Again, anything is feasible. The question is, is it worthwhile.” Freedman Dep. at 178, Record Support, v. 1 to Consolidated Statement of Facts; *see also* Maritz Dep. at 15-16,

Record Support, v. 2 to Consolidated Statement of Facts; Silverberg Dep. at 278-279, Record Support, v. 2 to Consolidated Statement of Facts; Lipe Dep. at 108, Record Support, v. 1 to Consolidated Statement of Facts; Deposition of Aaron Reynolds (“Reynolds Dep.”) at 151, Record Support, v. 2 to Consolidated Statement of Facts.

E. Consumer Demand Would Have Existed for Separate DOS and Windows 4 Products.

62. Microsoft almost, but not completely, eliminated the market for standalone DOS and Windows products. To this day Microsoft continues to sell the old MS-DOS 6.22 and Windows 3.11 as separate products. Deposition of Joachim Kempin (“Kempin Dep.”) at 29-32 & 165-168, Record Support, v. 1 to Consolidated Statement of Facts; Maritz Dep. at 41, Record Support, v. 2 to Consolidated Statement of Facts.

There’s still a certain number of people who buy today from us MS-DOS without Windows, as far as we can determine, but the number is getting smaller and smaller every month.

Kempin Dep. at 170, Record Support, v. 1 to Consolidated Statement of Facts.

63. Thus, even today there is consumer demand for a four to five year-old version of standalone DOS. Clearly, had Microsoft offered Windows 4.x and MS-DOS 7.x as separate products, Novell and subsequently Caldera not only would have sold DR DOS as a standalone DOS product, they would have sold DR as an alternative real-mode operating system that could be used in conjunction with Windows 4.³

³ And, of course, if DR DOS revenues had not been destroyed by Microsoft’s predatory acts, Novell would have had reason to continue active development and marketing of DR DOS.

V. ARGUMENT

A. Windows 95 Is an Illegal Tie.

1. Two Products: Separate Consumer Demand Test Governs.

A tying claim has three elements: (1) two separate products must be tied together; (2) the defendant must have “appreciable economic power” in the tying market; and (3) the tie must affect a “substantial volume of commerce” in the tied market. *Eastman Kodak Co. v. Image Technical Services, Inc.*, 504 U.S. 451, 461 (1992). Although Microsoft asserts that “technological tying” cases always fail, it does not explain what element of a tying claim is always found lacking. Microsoft’s evasiveness on this crucial point is understandable: both the Supreme Court and the Tenth Circuit have rejected the argument that product “integration” or functional improvement is a defense to a *per se* Section 1 tying offense.

a. *Jefferson Parish and Eastman Kodak*: Consumer demand test.

The Supreme Court held in *Jefferson Parish Hospital Dist. v. Hyde*, 466 U.S. 2 (1984), and reiterated in *Eastman Kodak*, that something sold by the defendant as a single package or bundle actually consists of two or more products if there is consumer demand for each of the products separately (apart from the package) and there is sufficient consumer demand to make separate distribution economically efficient. *See Jefferson Parrish*, 466 U.S. at 21-22 (two products exist if there is “sufficient demand for the purchase of [the tied product] separate from [the tying product] to identify a distinct product market in which it is efficient to offer [the tied product] separately from [the tying product]”); *Eastman Kodak*, 504 U.S. at 462 (separate products exist when there is “sufficient consumer demand so that it is efficient for a firm to provide” the product separately). It is irrelevant that the two products might function better

when joined together.⁴ See *Jefferson Parish*, 466 U.S. at 18-19 (rejecting defendant’s claim that it was “providing a functionally integrated package of services” instead of a tie).

The “consumer demand” test makes perfect sense in light of the conduct that the *per se* ban on tying is designed to prohibit. The antitrust law sensibly looks to consumer demand at the outset of any tying claim because offering consumers the option to buy two products together is not prohibited; *forcing* consumers to buy two products together is prohibited. As a result, tying law does not forbid a manufacturer from upgrading separate products or even forbid a manufacturer from selling the upgraded products together. Rather, tying law simply prohibits a manufacturer from eliminating a consumer’s meaningful option to buy the products separately.⁵

b. *Multistate Legal Services: Product improvement does not make two products one for tying purposes.*

The Tenth Circuit has soundly rejected Microsoft’s argument, explaining that the Supreme Court’s consumer demand test is based on economics, not technology or product design. In *Multistate Legal Studies, Inc. v. Harcourt Brace Jovanovich Legal & Professionals Pubs., Inc.*, 63 F.3d 1540 (10th Cir. 1995), the plaintiff alleged that the defendant created an illegal tie by “integrating” a specialized bar review course covering only the multistate portion of the exam with a more exhaustive course to form a single, comprehensive course. The district court found the new course constituted a single product, apparently concluding “that any effort to improve the full-service course by adding elements to it could not possibly constitute the bundling of a second product.” *Id.* at 1547. The Tenth Circuit reversed, holding that the

⁴ Which, in any event, is not true here. See *supra*, Statement of Additional Material Facts and Response to Microsoft’s Statement of Undisputed Facts, above.

⁵ Of course, a monopolist might also run afoul of Section 2 if in “upgrading” the separate products or in providing an “option” to buy the products together, it engaged in anti-competitive conduct, such as using vaporware, “FUD,” or per processor licenses. See *In re IBM Peripheral EDP Devices Antitrust Litig.*, 481 F. Supp. 965, 1002-1003 (N.D. Cal. 1979) (observing that if product “changes had no purpose and effect other than the preclusion of [competition], this Court would not hesitate to find that such conduct was predatory” under Section 2). See also Section V.D., below.

Supreme Court’s “consumer demand” test was applicable even where there was a claim that integration brought improved functionality. *Id.* (“The Supreme Court has made clear that the test for determining whether two components are separate products turns not on their function, but on the nature of any consumer demand for them.”). Because consumers wanted the option to buy the products from separate vendors, the Tenth Circuit concluded two products were involved. As the Tenth Circuit observed: “Product improvements may be the cause and/or effect of changes in consumer demand, but the nature of that demand is what counts.” *Id.* at 1546 n.4.

The Tenth Circuit noted that claimed efficiencies of joint distribution could be relevant to the two-product inquiry—*i.e.*, there could be insufficient consumer demand to justify separate distribution—but it explained that this inquiry is different from a product improvement defense, such as Microsoft urges here. More specifically, the court observed that product improvement claims are irrelevant to evaluation of a Section 1 tying claim. *Id.* at 1551 n.9 (“[A] product improvement motivation—at least without something more, such as demonstrated efficiencies—will not save an otherwise illegal tying arrangement under section 1. . . .”). The court did note that product improvement might be relevant under a Section 2 analysis, where concerns about interfering with product design decisions and chilling innovation might play a role. *Id.* The court nevertheless dismissed such concerns in the case before it: “Where . . . the claimed product improvement takes the form of a marketing change, rather than some complex technological integration of previously separate functions, our degree of deference to product designs is reduced.” *Id.* at 1552 n.10. Likewise, even were this Court to review Caldera’s claim under the stricter Section 2 rubric (*i.e.*, no *per se* ban), it should reject Microsoft’s request for summary judgment because Caldera has demonstrated that the combination of products in the Windows 95

package was “a marketing change, rather than some complex technological integration.”⁶ *See* Statement of Additional Material Facts, above.

2. “Technological Tying” Jurisprudence Is Inapplicable Here.

Microsoft may claim that *Multistate Legal Services* is not a “technological tie” case, and therefore does not control the issues here. Although Microsoft conspicuously makes no mention of *Multistate Legal Services* in its summary judgment motion before this Court, Microsoft was not so cavalier about the opinion in moving for summary judgment last fall in the on-going DOJ action. There, Microsoft struggled to distinguish *Multistate Legal Services* claiming it was not a “technological tying” case. *See* Defendant Microsoft Corporation’s Memorandum in Support of Its Motion for Summary Judgment at 32, Engel Decl., Ex. 7. This attempted distinction—should Microsoft offer it in this case—raises the question of what constitutes a “technological tie” case, a question Microsoft never attempts to answer.

The answer is that a technological tie case is one where the alleged tie takes the form of product development such that two products are compatible only with each other and there are no available substitutes for the tying product. *See* 10 P. Areeda & H. Hovenkamp, ANTITRUST LAW ¶ 1757a at 335. These cases are irrelevant to Caldera’s claim. Of course, this class of cases is not the only type of case where courts have been reluctant to entertain tying claims; courts have also hesitated in rare cases where the two products are so tightly integrated that separation, particularly physical separation, is almost impossible. Microsoft slaps the “technological tie” label on the latter type of case in the hope that this Court will think these “separation difficulty”

⁶Microsoft may attempt to infer from the Tenth Circuit’s statement that it did not confront a case of “complex technological integration” and that the court would adopt a deferential standard of review in a “technological tying” case. However, the Tenth Circuit’s comment about “complex technological integration” cannot be taken out of context; the court is clearly stating that the existence of technological integration only matters for the degree of deference afforded a tying claim under Section 2. This comment cannot be the basis for any doubt about the Tenth Circuit’s express rejection of Microsoft’s argument in the Section 1 context.

cases have some relevance to Caldera’s claim. But Caldera’s claim, which admittedly involves a technological product, raises no problematic issues of technological separation, since MS-DOS 7.x and Windows 4.x continue as separate programs inside the Windows 95 box.

a. “Technological tying” cases involve “compatibility tying.”

Multistate Legal Services did not involve a high technology industry, but this fact does not rule out the possibility that it raised a “technological tying” claim. In so-called “technological tying” or “compatibility tying” cases, the plaintiff complains that the defendant had made technological advances to the “tying” product so that it became compatible only with the defendant’s version of the “tied” product and no longer worked with the plaintiff’s version of the tied product. For example, perhaps the preeminent “technological tying” case—which did not involve a particularly “high tech” product—arose from Kodak’s introduction of the “110” instamatic photographic system. This new format worked only with Kodak’s new cameras, film, and processing equipment. The Ninth Circuit rejected a tying challenge to this innovation:

As a general rule, therefore, we hold that the development and introduction of a system of technologically interrelated products is not sufficient alone to establish a *per se* unlawful tying arrangement even if new products are incompatible with the products then offered by the competition. . . . Any other conclusion would unjustifiably deter the development and introduction of those new technologies so essential to the continued progress of our economy.

Foremost Pro Color v. Eastman Kodak Co., 703 F.2d 534 (1983). Innovation indeed might be stifled if such a claim, without more, were permitted to trigger the *per se* ban on tying. In such a case, the plaintiff is unwilling (or unable due to lawful intellectual property rights) to upgrade its version of the tied product to become compatible with the defendant’s new tying product. For example, the *Foremost Pro Color* plaintiff did not and could not make a camera that worked with the 110 system. Forcing Kodak to sell 110 film separately from the camera would have

provided plaintiff with no relief. The only relief for such a plaintiff, therefore, would be to force the defendant to restore the tying product to its old, perhaps inferior, form.

The other “technological tying” cases fall into this same category, although in most of these cases the plaintiff was unwilling to make (although not prevented by intellectual property rights from making) a compatible tied product. *See, e.g., ILC Peripherals Leasing Corp. v. IBM*, 458 F. Supp. 423, 440-441 (N.D. Cal. 1978); *Response of Carolina, Inc. v. Leasco Response, Inc.*, 537 F.2d 1307 (5th Cir. 1976). Although these courts noted the difficulty of evaluating product design and expressed fears about stifling innovation, they ultimately threw out the claims because the plaintiff could not show that the defendant coerced buyers to purchase both products together. *See Telex Corp. v. IBM Corp.*, 367 F. Supp. 258, 347 (N.D. Okla. 1973), *rev’d on other grounds*, 510 F.2d 894 (10th Cir. 1975) (the bundle was “wholly optional” and “customers remain free to lease . . . from IBM, Telex, or whomsoever they choose”); *Innovation Data Processing, Inc. v. IBM Corp.*, 585 F. Supp. 1470, 1475 (D.N.J. 1984) (“I conclude that here IBM customers are for the purposes of the Sherman and Clayton Acts free to take either [program] by itself and that on this basi[s] alone there is no illegal tying arrangement.”); *see also Response of Carolina, Inc. v. Leasco Response, Inc.*, 537 F.2d 1307 (5th Cir. 1976) (no tie of software program and hardware because “the decision of the franchisees to sign the hardware lease was completely voluntary on their part, motivated by business reasons, not by coercion on the part of Leasco”).⁷ In other words, the plaintiffs actually lost not because of some deferential

⁷ Significantly, the IBM Peripheral Litigation arose during the late 1970s in the Ninth Circuit, which at the time used a “function of the aggregation” test to determine whether a product was one product or two for tying purposes. *See ICL Peripherals Leasing Corp. v. IBM*, 448 F. Supp. 228, 230 (N.D. Cal. 1978) (quoting *Siegel v. Chicken Delight, Inc.*, 448 F.2d 43, 48 (9th Cir. 1970) (“In determining whether an aggregation of separable items should be regarded as one or more items for tie purposes . . . the courts must look to the *function of the aggregation*.”) (emphasis added)). Understandably, a court applying a “function of the aggregation” test would consider highly relevant the defendant’s claim that the tie was designed to bring product improvement. This “function of the aggregation” test, however, was expressly overruled in 1984 by *Jefferson Parish*, and thus the IBM peripheral “technological tying” jurisprudence is a dead letter.

standard of review but because the plaintiffs failed to prove a fundamental element of a tying claim: coercion.

Indeed, Microsoft would be correct to argue that *Multistate Legal Services* is not a “technological tying” case to the extent that term means “compatibility tying.” But Caldera’s claim is not a “technological tying” claim in that sense either. The plaintiff in *Multistate Legal Services* did not claim its review course had been rendered incompatible with defendant’s tying product. Likewise, Caldera’s claim does not rest on the fact Windows 4.x was not compatible with then-existing versions of DR DOS. Rather, Caldera objects to the fact that consumers could not buy Windows 4.x alone. The fundamental premise of Caldera’s tying claim is that it would have, and could have, made a version of DR DOS compatible with Windows 4.x. Microsoft could have made all sorts of legitimate changes to Windows, so long as it offered consumers the option to buy the product separately from MS-DOS. As a result, the success of Caldera’s claim will not chill Microsoft’s ability or incentive to innovate, but it will chill Microsoft’s ability to use tying as a means of destroying a competitor’s incentive to match or exceed innovations to remain competitive.

b. Tying of inseparable products.

There is a second category of cases where courts have been reluctant to entertain tying claims; these cases involve products that are so tightly integrated that separation is difficult. The primary example of such a case is the D.C. Circuit’s opinion in the Consent Decree action, where the DOJ claimed that Microsoft had violated the 1994 Consent Decree. Although the DOJ was focused primarily on Microsoft’s per processor licenses and minimum commitments practices in negotiating the Decree, a provision was inserted to prohibit Microsoft from conditioning the license of one “covered product” on the agreement to license any “other product.” Yet, so-called

“integrated” products were permitted. *See* Consolidated Statement of Facts ¶ 423. The DOJ claimed that Microsoft violated this provision by bundling Windows 95, a “covered product,” with its Internet Explorer browser. Microsoft responded by arguing that this combination fell within the “integrated” product exception.

The D.C. Circuit found it hard to determine whether the Windows 95/Internet Explorer combination was an “integrated” product because Microsoft had intricately “knitted” together the software code for Windows 95 and Internet Explorer. Only four lines of code were unique to Internet Explorer and ostensibly neither product would work if separated. *Id.* at 951-952 & n.17. As a result, the D.C. Circuit felt compelled to endorse in *dicta* a broad definition of the word “integrated,” which encompassed any product combination that created a “plausible claim” of consumer benefit, lest the court be forced to delve into the complexity of product design. In so ruling, the D.C. Circuit observed that its understanding of the word “integrated” in the Consent Decree was “consistent with tying law,” although in the very next paragraph, the Court expressed doubt “[w]hether or not this is the appropriate test for antitrust law generally.” *Id.* at 950.⁸

Regardless of whether the D.C. Circuit’s opinion is correct as a matter of antitrust law, the fundamental premise of the opinion is that antitrust law *may* apply a more lenient standard of review to tying claims involving inseparable products. In fact, in moving for summary judgment in the current DOJ case, Microsoft attempted to distinguish *Jefferson Parish, Eastman Kodak*, and *Multistate Legal Services* as cases that did not involve “physically integrated products.” *See* Defendant Microsoft Corp.’s Reply in Support of its Motion for Summary Judgment at 5-6, Engel Decl., Ex. 6. In particular, Microsoft distinguished *Multistate Legal Services* on the

⁸ The latter comment can be attributed to Microsoft’s vehement insistence before the D.C. Circuit that the Consent Decree’s tying prohibition was intended to be “much narrower than that of the Sherman Act.” *See* Brief for Respondent-Appellant Microsoft Corp., in *Microsoft v. United States*, No. 97-5343 (Jan. 29, 1998) at 26, Engel Decl., Ex. 8.

ground that it did not involve inseparable products, like Windows 95 and Internet Explorer. *See* Defendant Microsoft Corporation’s Memorandum in Support of its Motion for Summary Judgment at 21, Engel Decl., Ex. 7. (“Here, it is the exact same software that provides web browsing functionality [Internet Explorer] also provides critical functionality such as the new user interface in Windows 95.”)

To the extent Microsoft intends for the label “technological tying” to apply to cases where separation of two constituent products is difficult, it must confront two problems: Caldera’s claim does not raise separation problems, and contrary to Microsoft’s characterization in the DOJ case, *Multistate Legal Services* rejected this exact argument.

First, in contrast to the Windows 95/Internet Explorer product combination, the product combination at issue here—Windows and MS-DOS—poses no technological separability problem. There is no shared software code between Windows 4.x and MS-DOS 7.x, and the two products not only can be easily separated but they work properly once separated. *See* Hollaar Report at 20-23, Record Support, v. 6 to Consolidated Statement of Facts. There are no issues of intermingled code here—MS-DOS and Windows packaged as Windows 95 remain as separate products, easily separable. *See* Hollaar Report at 15-23, Record Support, v. 6 to Consolidated Statement of Facts. Although the D.C. Circuit may have felt a need to adopt a forgiving standard of review in interpreting the Consent Decree because it was difficult to separate Windows 95 and Internet Explorer, this Court is in a very different position.

Second, the plaintiff’s claim in *Multistate Legal Services* raised the exact separation problem posed by the combination of Windows 95 and Internet Explorer. Unlike the D.C. Circuit, which dodged the problem by crafting a standard tantamount to judicial abdication, the Tenth Circuit adhered to Supreme Court case law and applied the consumer demand test. In

Multistate Legal Services, the more exhaustive bar review course already contained a one-day multistate review course before being “integrated” with the three-day specialized multistate course. As a result, the plaintiff’s claim potentially posed difficult questions of product overlap, definition, and separation. For example, if all the multistate review material were extracted from the exhaustive course, the exhaustive course would be degraded because it would no longer include a one-day multistate review course. The defendant seized on this difficulty, urging a special rule for cases involving what the defendant labeled “overlap markets.” The Tenth Circuit rejected this effort to avoid traditional tying analysis in difficult cases through the use of fancy labels:

[W]e are not persuaded either that the “overlap markets” characterization does anything more than restate the problem, or that, if it does, the Supreme Court’s *Kodak/Jefferson Parish* test is somehow less controlling in such cases than in any others.

Multistate Legal Studies, Inc. v. Harcourt Brace Jovanovich Legal & Professionals Pubs., Inc., 63 F.3d 1540, 1547 (10th Cir. 1995). The exact same logic applies to Microsoft’s repeated invocation of the “technological tying” label.

c. New product rationale.

Professor Areeda’s treatise proposes a special test for tying cases involving “new product” design. *See* 10 P. Areeda & H. Hovenkamp, *ANTITRUST LAW* ¶¶ 1746 & 1746b. Both Microsoft and the D.C. Circuit cite this portion of the treatise. *See* Microsoft’s Tech. Tying Memo. at 11; *United States v. Microsoft Corp.*, 147 F.3d 935, 949 (D.C. Cir. 1998). To the extent Microsoft believes the Areeda treatise supports the application of a lenient standard of review to Caldera’s claim, it is mistaken.

The treatise expressly advocates application of a special rule to cases where a manufacturer introduces a new product that consists “product bundles that others have not

significantly marketed” or “integrate[s] previously unbundled inputs.” 10 P. Areeda & H. Hovenkamp, *ANTITRUST LAW* ¶¶ 1746 & 1746b at 224, 225-26. Most important, the treatise notes that such new products might be exempt from tying scrutiny under the consumer demand test because there would be no pre-existing market in which to gauge consumer demand. *Id.*, at 224 (“Thus they cannot be found a single product under the market practices test.”). Nevertheless, the treatise proposes that such product combinations should be subject to tying scrutiny, but only through a very forgiving lens, focusing on whether the “newly bundled items operate better when bundled by the defendant.” *Id.* In other words, the test is designed to strengthen tying law, albeit incrementally, by providing some review for product combinations that otherwise would be immune.

Whatever the merits of this novel test, it cannot possibly be applicable to Windows 95 because the GUI and DOS products had a long history of being bundled together by Microsoft before Windows 95 was ever introduced. It is relatively easy to determine that separate consumer demand exists for these two inputs by looking to the pre-existing market for the Windows 3.x and DOS bundle. Windows 95 is simply not the sort of “new product” combination envisioned by the Areeda treatise.⁹

d. Separate consumer demand for GUI and DOS products exists.

The question whether consumer demand exists for separate purchases of the allegedly tied products is an empirical inquiry that focuses on past and present conduct by consumers. Specifically, the inquiry turns on whether the products were sold separately in the past and whether the products are still sold separately. See *Eastman Kodak*, 504 U.S. at 462; *Multistate*

⁹ While Caldera expresses no opinion on whether the Windows 95/Internet Explorer bundle was the sort of “new product” envisioned by the Areeda treatise, it is worth noting that the author of the relevant portion of the treatise believes the D.C. Circuit erroneously relied on his work. See *infra* Section V.B.1.b.

Legal Services, supra, 63 F.3d at 1547. Courts acknowledge, however, that current demand for the products may be deceptive, for the monopolist's success at eliminating a separate product market through a tying arrangement should not be used to demonstrate that separate products do not exist. *PSI Repair Services, Inc. v. Honeywell, Inc.*, 104 F.3d 811, 816-17 (6th Cir.) (“Honeywell’s own actions have essentially limited the existence of a separate market for components. . . . Honeywell cannot point to its one component parts customer as evidence of a lack of a market for components, when it was Honeywell’s own restrictive policy that assured the absence of a component market.”), cert. denied, 520 U.S. 1265 (1997); *Allen-Myland, Inc. v. International Business Machines Corp.*, 33 F.3d 194, 214 (3d Cir.), cert. denied, 513 U.S. 1066 (1994). In certain circumstances, courts may consider other factors such as whether there are separate charges for the components of the tied products, whether efficiencies are gained by combining the sale of the products, and whether the products are sold in fixed proportions.¹⁰

Courts also look to whether competitors have sold the tied product separately as proof that separate demand exists. *See, e.g., Thompson v. Metropolitan Multi-List, Inc.*, 934 F.2d 1566, 1575-76 (11th Cir. 1991) (existence of competitor who only offered tied product suggests separate products).

Prior to the introduction of Windows 95, it is undisputed that consumers bought DOS and Windows separately and from separate manufacturers. Microsoft sold MS-DOS and Windows as both a bundle and separate products for ten years before it tied them together in Windows 95. Some users bought MS-DOS, some users bought Windows, some users bought both—and some

¹⁰ To the extent courts in the past considered whether the tied products are sold and used in fixed proportions, that factor is of diminished importance following the *Jefferson Parish* holding that prohibited tying can occur even where the products are “functionally linked.” *See, e.g., Digital Equipment Corp. v. System Industries, Inc.*, 1990-92 Trade Cas. (CCH) ¶ 68,901 at 62,837 (D. Mass. 1990) (denying defendant’s motion to dismiss a tying claim because “Digital’s argument that the two products are technologically interrelated is not determinative . . . there can be ‘prohibited tying devices’ even where products are ‘functionally linked.’” (quoting *Jefferson Parish*)).

users bought DR DOS or DR DOS and Windows. Even in the face of Microsoft's other anticompetitive practices, DR DOS achieved an 11.5 percent market share of the combined sales of MS-DOS and DR DOS. *See* Report of William Wecker ("Wecker Report") at Tab 4, Table 1. Although Caldera has not calculated the exact number of DR DOS purchasers who separately bought Windows from Microsoft, it is obvious that the vast majority of these customers bought some version of Windows 3.x to run with their DR DOS. The most persuasive evidence that DR DOS buyers were also separate purchasers of Windows 3.x comes from the AARD code episode: Microsoft inserted this error message precisely because it knew a substantial number of Windows 3.x users would have purchased the DR DOS operating system. *See* Caldera's Consolidated Response, Section V.D.

Perhaps the most persuasive evidence that separate demand exists for DOS and GUI products comes from the fact that Microsoft claims to continue to sell separate versions of Windows 3.1 and MS DOS 6.x. *See* Kempin Dep. at 170. While these sales may be relatively small and relate to largely obsolete products, they illustrate the persistence of separate consumer demand even after the introduction of Windows 95. *See* Exhibits 354, 358, 377, 384, 388 & 389. The fact that the separate sales are comparatively small cannot be used by Microsoft to prove insignificant consumer demand because Microsoft's tying in Windows 95 assured the absence of robust separate demand. In addition, Microsoft has every incentive to hide from consumers the possibility of unbundled purchases. *See, e.g., PSI Repair Services, Inc.*, 104 F.3d at 816-17; *Allen-Myland, Inc.*, 33 F.3d at 214 (fact that only a handful of computer upgrades were sold separately from installation services "does not prove that there was no separate market for installation services, particularly considering that IBM had every economic incentive to protect its [installation] revenues and avoid widely publicizing" the unbundled sales).

Interestingly, Microsoft's own sales figures for Windows 3.x and MS-DOS demonstrate that the products are not purchased in fixed proportions, which is further evidence that two products exist. In fiscal year 1994, Microsoft sold 31 million units of MS-DOS compared to 26 million units of Windows. *See* Exhibits 2 & 3. In fiscal year 1997, after the release of Windows 95, Microsoft sold over 1 million more copies of Windows 3.x than MS-DOS. *See* Exhibits 2 & 6.

Although the introduction of Windows 95 eventually destroyed the separate DOS and Windows markets, Microsoft's pre-release pricing strategy of Windows 95 betrays the fact it is merely a tie of two products. Well before the product was released, Microsoft had decided that the price of Windows 95 would reflect the total of its component parts—Windows and MS-DOS. *See* Consolidated Statement of Facts ¶¶ 393-395.

Moreover, the question whether separate products exist is a proper subject for expert testimony. *See, e.g., Multistate Legal Services*, 63 F.3d at 1548; *PSI*, 104 F.3d at 816. Professor Kearl, Caldera's expert economist, submitted ample evidence in his two reports that Windows and DOS are separate products and sufficient consumer demand exists such that software manufacturers can and did produce the two products separately and efficiently. According to Dr. Kearl, these two products are: (1) graphical user interface products that run on Intel x86 or compatible CPUs; and (2) the operating systems, but not GUIs, that run on Intel x86 CPUs. Kearl Report at 3 & 27-30, Record Support, v. 6 to Consolidated Statement of Facts. Dr. Kearl points out that from the early 1980s, multiple software manufacturers produced and sold GUI products that were not part of any operating system. Rather, these GUI products were sold and used as applications programs for personal computers. Among the products that competed in the relevant GUI market, Dr. Kearl identifies the following products: VisiON, Quarterdeck's

DesqView, Norton's Desktop, IBM's TopView, Gem Desktop, and Microsoft Windows. *Id.* at 27; *see also* Expert Rebuttal Report of James R. Kearl ("Kearl Rebuttal Report") at 10, Engel Decl, Ex. 9. During the same period, Dr. Kearl identifies an entirely different set of products that competed in the operating system market: OS/2, PC-UNIX, and three DOS products, PC-DOS, MS-DOS, and DR DOS. Kearl Report at 4. On this point Dr. Kearl is unambiguous: the markets for operating systems and GUIs were distinct and different. Although each market had a variety of competing products and manufacturers, by the early 1990s Microsoft had dominated the OS and GUI markets with MS-DOS and Windows, respectively.

Caldera's evidence establishes that separate consumer demand exists for GUI and DOS products. Those markets would continue to exist but for Microsoft's tying.

B. The D.C. Circuit's Erroneous *Dicta*.

1. The D.C. Circuit's Opinion Is Wrong.

Microsoft relies extensively on one opinion: The D.C. Circuit's decision in *United States v. Microsoft*, 147 F.3d 935 (D.C. Cir. 1998). Although not binding on this Court and irrelevant for reasons explained above, *see, supra*, Section V.A.2.b. Caldera is compelled to scrutinize the D.C. Circuit's opinion in light of Microsoft's heavy reliance on the decision. The opinion should carry no persuasive authority because it is inconsistent with Supreme Court and Tenth Circuit precedent, is *dicta*, is based on a barren factual record, and is simply wrong.

a. The D.C. Circuit's analysis has previously been rejected by the Supreme Court and the Tenth Circuit.

Before criticizing the D.C. Circuit for failing to attend carefully to substantive antitrust principles, one should note, in fairness, that the court realized it was merely interpreting the Consent Decree and, as Microsoft recognizes, "the decree does not embody either the entirety of the Sherman Act or even all 'tying' law." *Id.* at 946. After the D.C. Circuit's opinion came

down, however, Microsoft began singing a slightly different tune, seizing on the court’s observation that its view was “consistent with tying law.” *Id.* at 950.¹¹ To the degree the D.C. Circuit’s opinion does touch upon substantive and relevant issues of antitrust law, its approach has been rejected by both the Supreme Court and the Tenth Circuit.

The D.C. Circuit suggested that the consumer demand test should not be applied to some types of tying claims, without specifying which types of claims were exempt. Instead, the D.C. Circuit held that the question is “merely whether there is a plausible claim that [bundling] brings some advantage” and, if so, that ends the inquiry. 147 F.3d at 950. This standard is wrong in two ways. First, it makes improved product functionality an absolute defense to a *per se* Section 1 tying claim. Second, it abdicates judicial review, thereby permitting a monopolist to avoid *per se* liability by making any “plausible” claim of product improvement.

The Supreme Court has rejected the “improved product functionality” argument. In *Jefferson Parish*, the East Jefferson Parish Hospital forced patients who wanted to buy its operative services to buy also anesthesiology services from Parish Hospital’s own doctors. The hospital claimed that “the package does not involve a tying arrangement at all”; rather it was “merely providing a functionally integrated package of services.” *Jefferson Parish Hospital Dist. v. Hyde*, 466 U.S. 2, 18-19 (1984). The Supreme Court rejected the argument and applied the separate consumer demand test to find two products. As explained above, the Tenth Circuit has also confronted and rejected the argument that product improvement is a defense to a *per se* Section 1 tying claim. *See Multistate Legal Studies, Inc. v. Harcourt Brace Jovanovich Legal &*

¹¹ For example, Microsoft incorrectly states: “[T]he D.C. Circuit held that Windows 95—both its integration of Internet Explorer technologies and in its integration of a real-mode DOS component—was *not* an illegal tying arrangement.” Microsoft Tech. Tying Memo at 11 n.4. This plainly is not true. The D.C. Circuit expressly reserved judgment on the legality of the Windows 95 and Internet Explorer bundle, which is currently being litigated in Washington, and had absolutely no reason or basis on which to opine on the legality of “integrating” MS-DOS into Windows 95. *See* 147 F.3d at 950 n.14.

Professionals Pubs., Inc., 63 F.3d 1540, 1551 n.9 (10th Cir. 1995) (“product improvement . . . will not save an otherwise illegal tying arrangement under section 1”).

As proof that its interpretation of the 1994 Consent Decree was generally “consistent” with antitrust law, the D.C. Circuit cited the Supreme Court’s recent decision in *Eastman Kodak*, in which the Court applied the consumer demand test to a high-tech industry and found copier repair parts and repair service to be separate products. *See Eastman Kodak Co. v. Image Technical Services, Inc.*, 504 U.S. 451 (1992). The D.C. Circuit offered the following statement to reconcile its understanding of the Consent Decree with the Supreme Court’s case law: “[W]e doubt the Court would have subjected a self-repairing copier to the same analysis; *i.e.*, the separate markets for products and service would not suggest that such an innovation was really a tie-in.” 147 F.3d at 950. The point of this example was to illustrate that the consumer demand test should not be applied to products that are impracticable to separate, *e.g.*, how could the *self repair function* be separated from the copier itself? Whether or not the Supreme Court would abandon the consumer demand test with an inseparable product, the D.C. Circuit’s observation does not apply to Windows 95: Windows 4.x and MS-DOS 7.x can be easily separated, and consumers clearly saw MS-DOS and DR DOS as substitutes and demonstrated a strong desire to buy DOS separately from Windows. *See* Additional Statement of Material Facts ¶¶ 1-3.

b. Even the authority cited by the D.C. Circuit does not support its position.

In support of its decision, the D.C. Circuit cited a few snippets of *dicta* from readily distinguishable pre-*Jefferson Parish* cases and quoted Professor Areeda’s *Antitrust Law* treatise. Caldera has explained above that the supposed “technological tying” cases upon which Microsoft and the D.C. Circuit rely deal with a unique and inapposite aspect of tying law. *See, supra*, pgs. Section V.A.2.b. Moreover, those cases pre-date the Supreme Court’s decision in *Jefferson*

Parish in which it made clear that functional improvement is not a defense to a Section 1 tying claim. As Judge Jackson recently noted in rejecting Microsoft’s motion for summary judgment in the current DOJ case, these cases surely do not compel a “more lenient standard than the one articulated by the Supreme Court.” *See United States v. Microsoft Corp.*, 1998 WL 614485 at *8-10 (D.D.C. 1998).

Although the Areeda treatise has not been revised since the D.C. Circuit’s opinion was released, the most recent supplement was written after the District Court found that Windows 95 and Internet Explorer constituted an illegal tie, and the supplement endorses the District Court’s opinion, which ironically was reversed by the D.C. Circuit based on its reading of the treatise. *See* 1998 Supplement, 10 P. Areeda & H. Hovenkamp, ANTITRUST LAW ¶1741b, at 469, 467-469. Additionally, after the D.C. Circuit opinion was released, the author of the sections of the treatise cited by the D.C. Circuit (Professor Einer Elhauge of Harvard Law School) publicly criticized the D.C. Circuit for misapplying his standard. *See* Einer Elhauge, *Microsoft Gets an Undeserved Break*, *New York Times*, op-ed (June 29, 1998), Engel Decl., Ex. 10. The D.C. Circuit’s hodgepodge of *dicta*, misquotes, and misapplications is a weak basis upon which to craft a broad immunity for so-called “technological tying” claims from the longstanding *per se* prohibition of all tying arrangements. *See State Oil Co. v. Khan*, 522 U.S. 3, 118 S. Ct. 275, 285 (1997) (in altering *per se* antitrust prohibitions, courts should not “lightly assume that economic realities underlying earlier decisions have changed”) (*quoting Business Electronics v. Sharp Electronic Corp.*, 485 U.S. 717, 731 (1988)).

c. The cornerstone of the D.C. Circuit’s opinion is a doubt about the institutional competence of judges to decide matters involving the software industry and product design.

The second part of the D.C. Circuit’s standard is its almost complete deference to defendants who can postulate any “plausible” justification for an otherwise illegal tie. For unexplained reasons, the D.C. Circuit doubts the competence of judges to decide matters involving innovation and product design. This concern is unfounded.

For this proposition, the D.C. Circuit and Microsoft cite a handful of judicial decisions during the 1970s in which courts expressed doubts about their ability to evaluate technological changes in the computer industry. In fact, it appears the seeds of this judicial doubt were sown by a single decision in 1973, *Telex Corp. v. IBM Corp.*, 367 F. Supp. 258, 347 (N.D. Okla. 1973), *rev’d on other grounds*, 510 F.2d 894 (10th Cir. 1975). *See Response of Carolina, Inc. v. Leasco Response, Inc.*, 537 F.2d 1307 (5th Cir. 1976) (*citing Telex*, 367 F. Supp. at 347); *ICL Peripherals Leasing Corp. v. IBM*, 458 F. Supp. 423, 440-441 (N.D. Cal. 1978) (*citing Response of Carolina*, 537 F.2d 1307); *United States v. Microsoft*, 147 F.3d 935, 950 (D.C. Cir. 1998) (*citing Response of Carolina*, 537 F.2d 1037 and *ICL Peripherals*, 458 F. Supp 423).

As Judge Wald noted in her concurrence/dissent from the D.C. Circuit opinion, the “post *Jefferson-Parish* trend is to apply [traditional tying law] even in the technological realm.” *United States v. Microsoft*, 147 F.3d 935, 960 (D.C. Cir. 1998) (Wald, J. concurring and dissenting) (*citing Allen-Myland v. IBM Corp.*, 33 F.3d 194, 200-16 (3d Cir. 1994) (reversing judgment for defendant on alleged tie of large-scale mainframe computers and labor to install upgrades to mainframes)); *Service & Training, Inc. v. Data Gen. Corp.*, 963 F.2d 680, 683-85 (4th Cir. 1992) (reversing grant of summary judgment to defendant on claim of tie between ADEX and repair services); *Digidyne Corp. v. Data General Corp.*, 734 F.2d 1336, 1339 (9th

Cir. 1984) (holding tie of NOVA computer system to NOVA operating system unlawful); *Data General v. Grumman Systems Support*, 36 F.3d 1147, 1178-81 (1st Cir. 1994) (alleged tie of ADEX software and services).

The explanation for this trend is simple. First, courts have become more accustomed to dealing with complicated technological issues, whether in adjudicating patent and copyright disputes or in determining the admissibility of scientific expert evidence. As well, courts have become accustomed to making decisions about product design, as they have done in numerous products liability, environmental, and engineering malpractice cases. Second, the Supreme Court has disapproved the creation of special tying rules for specific industries. *See, e.g., Jefferson Parish*, 466 U.S. at 25 n.42 (“In the past, we have refused to tolerate manifestly anticompetitive conduct simply because the health care industry is involved”). Third, courts have recognized that a deferential standard of review for alleged “product improvement” cases is simply unnecessary and dangerous. As one prophetic judge noted about his colleagues’ reluctance to adjudicate tying claims involving IBM:

One court has even suggested that where there is a valid engineering dispute over a product’s superiority the inquiry should end; the product is innovative and the design is legal. [citing *ILC Peripherals*]. That view, probably the result of a concern for the creativity that has characterized the history of computers, is overprotective. It ignores the possibility that a superior product might be used as a vehicle for tying sales of other products, and would pronounce other products superior even where the predominant evidence indicated they were not.

In re IBM Peripheral EDP Devices Antitrust Litig., 481 F. Supp. 965, 1003 (N.D. Cal. 1979).

These doubts about judicial competence, therefore, are likely merely the product of judicial unfamiliarity with computers during the 1970s and early 1980s. Finally, if courts shied away from potentially complex inquiries into the legalities of competition, antitrust jurisprudence

would have died long ago, rather than evolving into the robust guarantor of fairness and economic health that it is today.

d. The D.C. Circuit opinion is entirely *dicta*.

Only after the Circuit Court determined that the District Court had entered a procedurally improper preliminary injunction against Microsoft, did the Circuit Court proceed to opine—absent a mature factual record—about the meaning of the Consent Decree and, in the process, make its sweeping statements about tying law. *United States v. Microsoft Corp.*, 147 F.3d 935, 944-945 (D.C. Cir. 1998). Thus, because the Circuit Court overturned the injunction on procedural grounds, its statements about tying are *dicta* and have no precedential weight. *See, e.g., Lowry Federal Credit Union v. West*, 882 F.2d 1543, 1546 n.7 (10th Cir. 1989) (“to the extent the . . . court’s analysis goes beyond the issue it resolved, we conclude it is *dicta* and we reject it out of hand.”).

e. The D.C. Circuit Had No Factual Record Before It, Especially Regarding the “Integration” of Windows and MS-DOS, an Issue Not Even Litigated by the Parties.

Because the D.C. Circuit had no factual record before it, the court made a number of statements that are simply wrong as a factual matter, such as:

Windows 95 is integrated in the sense that the two functionalities—DOS and graphical interface—do not exist separately: the code that is required to produce one also produces the other.

United States v. Microsoft, Corp., 147 F.3d 935, 949 (D.C. Cir. 1998).

Looking to the language of the 1994 Consent Decree (to which Novell and Caldera were not parties), the D.C. Circuit determined that inclusion of Windows 95 in the definition of “covered products” was an “explicit acceptance of Windows 95” as a permissible product:

The decree's evident embrace of Windows 95 as a permissible single product can be taken as manifesting the parties' agreement that it met this test.

Id. at 949.

As shown above, at the time the United States negotiated the Consent Decree with Microsoft in 1994, Microsoft was making false public statements that:
Chicago will be a complete, integrated protect-mode operating system that does not require or use a separate version of MS-DOS. . . .

Exhibit 404.

Since Microsoft did not release Windows 95 until August 1995, the Justice Department could not independently evaluate Microsoft's characterization of what Windows 95 would be. It had no choice but to take Microsoft at its word. *See* Consolidated Statement of Facts ¶¶ 423 & Exhibit 442. To put it starkly, Microsoft's statements leading up to the 1994 Consent Decree's apparent acceptance of Windows 95 as a "permissible product" raise serious questions about Microsoft's candor in its negotiations with the United States.

Having put Windows 95 behind it with the 1994 Consent Decree, the Justice Department did not re-evaluate Windows 95 when it brought its case challenging the integration of Microsoft's Internet browser and Windows 95. Instead, the Justice Department continued to accept Microsoft's false assertion that:

Windows 95 was a next-generation operating system that began with parts of the existing MS-DOS and Windows 3.1 products but went far beyond them to become a fundamentally new system—one that Microsoft has never claimed to be, and that it could not plausibly claim to be, simply a package of MS-DOS and Windows 3.1.

Reply Brief of Petitioner United States at 7, Engel Decl., Ex. 5.

Again, the United States did not base its statement on an expert’s evaluation of Windows 95. Rather, the Justice Department relied on a paralegal’s reading of a Microsoft Windows 95 manual. The paralegal states:

I have reviewed a Microsoft manual. . . . The manual provides an overview of the features, functionality, and components of the *not-yet-released* Windows 95. . . . it states, ‘When you first boot Windows 95 it is immediately apparent that the old world of Windows running on top of MS-DOS is no more. . . .’

See Reply Brief of Petitioner United States at 7, citing Declaration of Mark Gaspar at ¶ 22, Engel Decl., Ex. 5 (emphasis added).

Thus, there were *no facts* before either the Justice Department or the D.C. Circuit as to the true nature of Windows 95—only Microsoft’s assertions. Significantly, even Microsoft’s own engineers dispute these assertions. See Barrett Dep. at 60, Record Support, v. 1 to Consolidated Statement of Facts (MS-DOS and Windows are put together in Windows 95 with “bubble gum and bailing wire”). Indeed, after examining the Windows 95 source code and undertaking an extensive review of Windows 95 itself, Professor Hollaar has concluded:

[The D.C. Circuit’s] statements about Windows 95 and the description of Windows 95 set forth in the opinion is factually incorrect. As I have stated, there are two separate products in Windows 95. They are just as separate as MS-DOS 6.x and Win 3.x were. Furthermore, the description of code “integration” set forth in the footnote in the opinion does not apply to Windows 95. Windows 95 does not commingle code between the DOS and Windows included as part of Windows 95. The DOS modules exist separately from the Windows modules. The relationship between DOS and Windows in Windows 95 is the same as it was before Windows 95. And no one can dispute that prior versions of DOS and Windows were separate products.

Hollaar Rebuttal Report at 13, Engel Decl., Ex. 1.

The dimly lit factual parchment upon which the D.C. Circuit wrote was fundamentally flawed. The D.C. Circuit’s misinformed and incorrect statements do not provide a sound basis

for making any determination as to whether Windows 95 is an unlawful tie. In contrast, the admissible evidence offered by Caldera in this case demonstrates that, in fact, Windows 95 is not a “fundamentally new system;” it is a package of MS-DOS and Windows designed to eliminate a competitor.¹²

2. Even Under D.C. Circuit’s Standard, Caldera Is Entitled to a Jury Trial.

The D.C. Circuit did not have before it any of the admissible evidence Caldera has introduced with respect to the true nature of Windows 95. In light of that evidence, even under the D.C. Court’s standard (which the Supreme Court has heard before and rejected), Caldera would be entitled to try its case to the jury. The D.C. Circuit defines “integrated product” as:

. . . a product that combines the functionalities (which may also be marketed separately and operated together) in a way that offers advantages unavailable if the functionalities are bought separately and combined by the purchaser. . . . If an OEM or user . . . could buy separate products and combine them himself to produce the “integrated product,” then the integration looks like a sham.

147 F.3d at 948.

Caldera’s evidence proves that, but for Microsoft’s refusal to offer the Windows 4.x and MS-DOS 7.x as separate products, OEMs could easily combine the products to produce Windows 95. *See* Statement of Additional Material Facts. Caldera has demonstrated that Windows 4.x and MS-DOS 7.x can be pulled apart, and both products operate independently of the other. *See* Hollaar Report at 15-26, Record Support, v. 6 to Consolidated Statement of Facts. Moreover, Caldera has demonstrated that Windows 4.x can be combined with an enhanced version of DR DOS to produce essentially the same features and functionality provided by

¹² Even if there had been evidence regarding Windows 95 in the Justice Department case, Caldera would still have the right to re-litigate the issue since it is not collaterally estopped by a decision in that case. *See, e.g., In re Lombard*, 739 F.2d 499, 502 (10th Cir. 1984) (collateral estoppel requires: identical issues; final judgment on the merits; privity; and complete, full and fair adjudication).

Windows 95. Thus, under the D.C. Circuit's standard, Windows 95 is "a sham." As the D.C. Circuit states:

The concept of integration should exclude the case where the manufacturer has done nothing more than to metaphorically "bolt" two products together. . . .

Id. at 149.

Even if Windows 95 were determined to be an "integrated product" as defined by the D.C. Circuit (which it cannot be), Caldera would still be entitled to go to trial on its Windows 95 tying claim. Under the standard announced by the D.C. Circuit, the determination that a product is "integrated" does not end the tying inquiry. Microsoft would still have to demonstrate that the integrated product is "better in some respect; there should be some technological value to integration." 147 F.3d 949. Microsoft has not even attempted to make such a showing.

Although Microsoft claims that the features and functionalities of Windows 95 are improved, it has offered no evidence whatsoever that those improvements require or are related to the combination of MS-DOS and Windows. To the contrary, Microsoft's software engineers have testified that Windows 4.x and MS-DOS 7.x "could have been done as two separate products"; the only difference is that Windows 95 provides a common installation program, and common installation is *not a technical benefit*, nor does it require that the two products be packaged together. See Statement of Additional Material Facts.

Moreover, Caldera has offered admissible evidence that: (1) there are no features or functionalities in Windows 95 which require, or otherwise rely on, packaging MS-DOS and Windows as a single product; (2) OEMs and PC users could combine MS-DOS 7.x and Windows 4.x in the same way Microsoft has to produce Windows 95; (3) enhanced DR DOS and Windows 4.x could be combined to produce a product with essentially the same features and

functionalities as Windows 95, and (4) there would even be *user benefits* from the DR DOS/Windows 4.x combination that do not exist in Windows 95. Microsoft has offered no facts to controvert Caldera's evidence. Even if it attempted to do so, Caldera's proffer of evidence creates a factual dispute that must be resolved by the jury.

Microsoft relies heavily on language in the D.C. Circuit opinion that it deems favorable. But Microsoft neglects to acknowledge that, taking into account the legal standard announced by its own Circuit, the District Court still permitted the United States to go to trial against Microsoft in the Windows 95/Internet Explorer case. Thus, if anything, that case supports the fact that Microsoft's motion for summary judgment must be denied.

C. Caldera Has Standing to Bring Its Section 1 Claim.

A competitor has "clear standing to challenge the conduct of rival(s) that is illegal precisely because it tends to exclude rivals from the market. Predatory pricing is the classic example, along with illegal 'foreclosures' of the plaintiff from the market." 2 P. Areeda & H. Hovenkamp, ANTITRUST LAW ¶ 373a at 275. Microsoft suggests, citing the Areeda treatise, that this Court should view Caldera's tying claim with skepticism. In fact, according to Areeda, Caldera falls squarely within the category of those competitors whose standing to bring suit under the antitrust laws is clear: "The rival supplier harmed by an illegal foreclosure clearly has standing. . . ." *Id.* ¶ 373d at 278. When "[t]he defendant illegally forecloses possible customers from patronizing plaintiff . . . [t]he plaintiff generally has standing." *Id.* ¶ 375 at 296. Here, Caldera's claim focuses on Microsoft's foreclosure of competition in the DOS market through its tying together in Windows 95 of two functionally distinct products, Windows 4.x and MS-DOS 7.x through this tie, Microsoft used its monopoly power in the Windows market to effectively

preclude further competition in the DOS market. As a rival supplier of DOS, Caldera's standing to pursue its claim against Microsoft for illegally tying Windows and DOS is evident.

Microsoft disputes that Caldera qualifies as a "rival supplier" of the tied product. By labeling the product at issue "the real-mode DOS component of Windows 95," rather than DOS, and arguing that neither Caldera nor its predecessors ever produced a substitute product for "the real-mode DOS component of Windows 95," Microsoft obfuscates Caldera's claim that Microsoft effectively foreclosed access to the DOS market by tying its DOS product together with its functionally distinct Windows product to create the Windows 95 package. Microsoft next argues that neither Novell nor Caldera had the capacity or interest to compete in the market for "the real-mode DOS component of Windows 95," which shows, according to Microsoft, that Caldera was never an actual or potential competitor in the market for a "real-mode DOS component of Windows 95." Microsoft thus contends that Caldera lacks standing to pursue its technological tying claim.

1. Caldera Has Standing as an Actual Competitor.

Microsoft's transparent obfuscations, however, merely ignore the material facts that establish Caldera's standing as an actual competitor: (1) Microsoft developed, produced and sold Windows and DOS as separate products for ten years before it packaged the products together; (2) the DOS and Windows products included in Windows 95 were developed separately based on these prior versions of MS-DOS and Windows, *see* Statement of Additional Material Facts, above; (3) the DOS and GUI elements of Windows 95 remained functionally distinct, held together by no more than "baling wire and bubble gum," *see, supra*, Statement of Additional Material Facts; (4) any improvements in Windows 95 (as compared with the combination of the previous versions of DOS and Windows) were *in no way* dependent on the

DOS and Windows components being packaged and sold together, but were instead, upgrades made to MS-DOS 6.22 and Windows 3.11, which were then packaged, marketed and sold together as Windows 95, *see* Response to Microsoft's Facts ¶ 6; and (5) prior to Microsoft's campaign to destroy its DOS competition by tying together its distinct DOS and Windows products, Caldera, through its predecessors, had managed to compete successfully in the DOS market for years, even in the face of Microsoft's other anticompetitive tactics.

Based on these facts, Caldera has standing as an actual competitor in the DOS market. Caldera suffered a concrete injury that is directly attributable to Microsoft's conduct—Caldera's predecessor Novell was driven out of the market completely. Microsoft claims that Novell's decision to "exit" the DOS market evidences Novell's lack of intent or desire to compete in the DOS market. *See* Microsoft's Tech. Tying Memo. at 6. In fact, Novell decided to discontinue active development and marketing of DR-DOS expressly because of Microsoft's announced intention to tie the DOS and Windows in Windows 95. A Novell planning document from August 1994 outlines the thought process that went into the decision to cut marketing and development of DR-DOS:

Due to the lock-out Microsoft has achieved in the OEM market and *the imminent combining of DOS and Windows in Chicago* no significant revenue can be expected from the OEM channel.

Exhibit 430 (emphasis added). In making this decision, Novell effectively disabled a business for which it had paid \$123 million three years before and in which it had invested millions in research, development, and marketing. Deposition of Ray Noorda ("Noorda Dep.") at 183-84, Record Support, v. 3 to Consolidated Statement of Facts. Caldera, through Novell, suffered an injury in fact that was directly caused by Microsoft's anticompetitive conduct. The law requires no more to confer antitrust standing.

Whether or not Caldera and its predecessors could have made a version of DR DOS that was perfectly compatible with Windows 4.x is a question of causation and damages, not standing. *See Huron Valley Hospital, Inc. v. City of Pontiac*, 666 F.2d 1029, 1033 (6th Cir. 1981) (“A plaintiff may . . . have standing to bring an unmeritorious claim.”). The latter questions, however, depend on the highly disputed factual issue of whether DR-DOS would work well enough with the Windows 4.x to satisfy customers whose business Caldera claims to have lost, and thus should be left to the jury.

2. Caldera Has Standing as a Potential Competitor.

Furthermore, even if Microsoft was correct that standing as an actual competitor would have required that Caldera actually produce and market a virtual clone of Microsoft’s “real-mode DOS component of Windows 95,” Caldera would still have standing as a potential competitor.¹³ Courts are, in fact, reluctant to deny standing to potential competitors because otherwise “competition could be frustrated with impunity by established companies through the simple expedient of picking off and eliminating potential competition.” *Utah Gas Pipelines Corp. v. El Paso National Gas Co.*, 233 F. Supp. 955, 965 (D. Utah 1964).

According to Microsoft, Caldera must show: (1) it had the ability to finance the development of a Windows 95 compatible version of DR DOS; (2) took affirmative action to enter this market; and (3) had the relevant background and experience. *See* Microsoft’s Tech. Tying Memo. at 7-8. As one court has put it, the question therefore is “[d]id [the plaintiff] have a substantial prospect of creating an enterprise to market its . . . product, or *did it have only an*

¹³ Caldera’s situation is distinguishable from the “potential competitor” cases cited by Microsoft. In those cases, the plaintiff either had never competed in the market before or had been inactive for years and yet sought to complain about a hypothetical injury. *See, e.g., Pastor v. American Tel. & Tel. Co.*, 76 F. Supp. 781, 789 (S.D.N.Y. 1940) (standing denied plaintiff that claimed AT&T restrained his distribution of a device even though he had never manufactured a device of any sort, much less the device at issue); *Curtis v. Campbell-Taggart, Inc.*, 687 F.2d 336 (10th Cir. 1982) (standing denied a plaintiff claiming competitor’s purchase of a bakery he was interested in buying was anticompetitive even though plaintiff had not owned a bakery in almost a decade).

expectancy or hope of entering into a new business which was never realized only because of its own shortcomings?” Laurie Visual Etudes, Inc. v. Chesebrough-Ponds, Inc., 473 F. Supp. 951, 956 (S.D.N.Y. 1979) (emphasis added). The evidence shows that Caldera and its predecessors had much more than an expectancy or hope of selling a version of DR DOS that was compatible with Windows 4.x. DRI and Novell had already developed and sold DR DOS versions that were compatible with prior versions of Windows. Novell was the largest seller of network operating system software. Even applying this test, Novell—and therefore Caldera—clearly has standing as a potential competitor.

a. Ability to finance.

While Microsoft makes much of Caldera’s relatively modest finances, Microsoft overlooks the inconvenient fact that Novell had tremendous resources in 1994 and 1995. Surely, if a small company like Caldera can create a piece of software (“WinBolt”) that allows DR DOS to run Windows 4.x, Novell could have done the same with little effort. As Caldera’s technical expert has explained, it would have taken very little effort to enhance Novell DOS 7 so that it would work with Windows 4.x because Windows 4.x is merely an upgrade of Windows 3.x. *See Hollaar Report*, at 22, *Record Support*, v. 6 to Consolidated Statement of Facts (“[I]t is clear that if Caldera had decided to enhance DR DOS to work with Windows 4 at the time beta test versions of Windows 95 were first available, they would have had their enhanced DR DOS available at the time Windows 95 was released.”).

b. Affirmative action.

Although Novell did not attempt to enter the narrow market of the DOS 7.x that was included in Windows 95, Novell and its predecessor, DRI, took numerous affirmative steps to enter the market for a Windows-compatible DOS. Novell could have produced an identical

product with little effort, especially given its past history of making DR DOS compatible with Windows. This fact cannot be discounted in determining whether Novell would have taken such steps but for Microsoft's illegal tie. *See Fine v. Barry & Enright Productions*, 731 F.2d 1394, 1397 (9th Cir. 1984) (plaintiff challenging restrictions on game show contestants was found to have standing because he "made six attempts to compete in four years and has been successful on three occasions *Fleer Corp. v. Topps Chewing Gum, Inc.*, 415 F. Supp. 176, 180 (E.D. Penn. 1976) ("It is significant, however, that there are alleged repeated attempts to enter over a number of years.").

Moreover, the plaintiff does not have to continue attempting to enter the tied market after it becomes apparent that such attempts are futile given the monopolist's illegal conduct. In other words, Novell did not have to keep developing and marketing DR DOS in the face of Microsoft's announced intention to destroy competition by tying. To do so would have been an exercise in futility. According to Novell's former CEO, Robert Frankenberg, Novell could have maintained DR DOS as a business only if it received a "miracle . . . like Microsoft deciding to get out of the business. . . . [or] more money than God." Frankenberg Dep. at 238, Record Support, v. 3 to Consolidated Statement of Facts. Significantly, Frankenberg never mentions that making DR DOS compatible with Windows 4.x was an obstacle to competing with Microsoft; the insurmountable obstacle was overcoming Microsoft's anti-competitive conduct. Forcing Novell to spend further resources on Novell DOS in order to have standing to bring its tying claim would be precisely the waste of resources that the antitrust laws are designed to prevent. As one court has noted:

We cannot find that [plaintiff's] steps toward entry were insubstantial if it is true that the taking of any further steps would have been a sheer waste of resources. It would be inconsistent with one purpose of the Clayton Act—to protect the business

interests of the victims of monopolistic practices to require an antitrust plaintiff to pay a courtroom entrance fee in the form of an expenditure of substantial resources in a clearly futile competitive gesture.

Fleer Corp. v. Topps Chewing Gum, Inc., 415 F. Supp. 176, 180 (E.D. Penn. 1976).

c. Background and experience.

It is undisputed that Novell and its predecessor DRI had a wealth of background and experience in developing DR DOS. Indeed, from 1989 to 1993 Novell and DRI demonstrated a particular aptitude for making innovations in DR DOS which Microsoft struggled to match. *See* Exhibit 350. Microsoft's announced intention to tie MS-DOS with its GUI in Windows 95 ended this cycle of innovation.

In potential competitor cases, "it may be hard to say exactly where the line falls between an idea for entry into a business, insufficient to confer standing, and 'significant demonstrable steps,' sufficient for standing." *In re Dual-Deck Video Cassette Recorder Antitrust Litig.*, 11 F.3d 1460, 1466 (9th Cir. 1993). Nevertheless, Caldera, through its predecessors DRI and Novell, clearly took "significant demonstrable steps" to enter the market for the DOS component of Windows 95. Thus, there is no question that Caldera has standing to bring its Windows 95 tying claim either as an actual competitor in the PC operating system market or as a potential competitor in the market for the DOS 7.x component of Windows 95.

D. Caldera's Section 2 Claim.

Microsoft's motion is directed *solely* to Caldera's claims under Section 1 of the Sherman Act and Section 3 of the Clayton Act. This point is made explicitly in the preamble to the "Argument" Section of Microsoft's brief: "Microsoft is entitled to summary judgment dismissing Caldera's claim that the development and marketing of Windows 95 constitutes an illegal tie because Caldera cannot establish one or more essential elements of its claims. As a

result, Caldera’s claims under both Section 1 of the Sherman Act and Section 3 of the Clayton Act fail, regardless of whether Microsoft possesses monopoly power in any product or geographic market.” Microsoft Tech. Tying Memo at 2. Microsoft makes no mention of Caldera’s monopolization claim under Section 2 of the Sherman Act. However, based on statements in its recent motion for leave to file a “clarification” of its summary judgment motions, Microsoft apparently intends to take the position that the relevant standards under Sections 1 and 2 of the Sherman Act are the same, and therefore its arguments for summary judgment under Section 1 would necessarily dispose of the Section 2 claim.

Microsoft is wrong. The legal standards for judging whether the development, marketing and packaging of Windows 95 constitutes exclusionary conduct in aid of monopolization under Section 2 are different. The Section 2 standards apply irrespective of whether Windows 95 is a “tie” of two products under Section 1. Microsoft has made no attempt to discuss the Section 2 standards, much less explain why in applying them the Court should grant summary judgment. Any effort by Microsoft to do so for the first time in its reply brief, at a time when Caldera has no further opportunity to respond, would be improper.

The offense of monopolization under Section 2, of course, requires proof of monopoly power in a relevant market. At least for purposes of the pending motion, Microsoft expressly does not contest Caldera’s ability to prove that element. Monopolization also requires proof that the defendant acquired or maintained that power by means that can be “fairly characterized as ‘exclusionary’ or ‘anticompetitive’ . . . or ‘predatory,’ to use a word that scholars seem to favor.” *Aspen Skiing Co. v. Aspen Highlands Skiing Corp.*, 472 U.S. 585, 602 (1985). In analyzing that question, the Supreme Court in *Aspen Skiing* underscored the importance of four factors:

- the relevance of the defendant’s intent in engaging in the challenged practice (*id.* at 602-03);

- whether the practice in question is supported by “valid” business justifications relating to enhanced efficiency (*id.* at 605, 608);
- whether the challenged practice “does not further competition on the merits” (*id.* at 605 n.32 (quoting 3 P. Areeda & D. Turner, *ANTITRUST LAW* 78 (1978)), or put differently, whether the defendant has “attempt[ed] to exclude rivals on some basis other than efficiency” (*id.* at 605); and,
- whether the behavior in question “has impaired competition in an unnecessarily restrictive way” (*id.* at 605).

In short, the Supreme Court has held that even where the defendant offers business justifications for its behavior—even facially plausible justifications—the courts must still closely scrutinize the evidence of the defendant’s actual intent, the extent to which competition has been impaired, and whether the defendant could have served its legitimate business objectives through means that were less restrictive on competition.

The *Aspen Skiing* framework applies equally when the alleged exclusionary conduct takes the form of product development, marketing, or packaging. The so-called “technological tying” cases recognize a distinct Section 2 analysis, focusing on whether the defendant designed the product at issue for anti-competitive reasons. For example, the court in *In re IBM Peripheral EDP Devices*, 481 F. Supp. 965 (N.D. Cal. 1979), explained the analysis as follows:

If the design choice is unreasonably restrictive of competition, the monopolist’s conduct violates the Sherman Act. This standard will allow the factfinder to consider the effects of design on competitors; the effects of the design on consumers; the degree to which the design was the product of desirable technological creativity; and the monopolist’s intent, since a contemporaneous evaluation by the actor should be helpful to the factfinder in determining the effects of a technological change.

Id. at 1003.

Likewise, the court in *Innovation Data Processing v. IBM*, 585 F. Supp. 1470 (D. N.J. 1984), granted summary judgment against the plaintiff’s Section 1 tying claim in part because it

found a single integrated product—a ruling the court revisited after *Jefferson Parish*. *See, supra*, Section V.A.2.a. at n.8. But the court refused to grant summary judgment under “the general standards” of the Sherman Act because material issues of fact existed as to “IBM’s intent, motive or purpose in linking the [products]” and “its practical effect both beneficial and detrimental.” *Id.* at 1477. The Tenth Circuit clearly endorses a Section 2 analysis which focuses on the anti-competitive purpose and effect of the product change rather than merely whether the change constitutes a “tie.” *See Multistate Legal Studies v. Harcourt Brace Publ.*, 63 F. 3d 1540, 1551 (10th Cir. 1995) (In Section 2 analysis, “[b]oth the purpose and results of a product change, including customer’s reception of the change, are relevant to whether a claimed product improvement is pro- or anti-competitive.”).

Microsoft has made no effort to analyze the facts of this case as they relate to Windows 95 according to the framework set out in *Aspen Skiing*.¹⁴ Certainly, it is not enough to lean on the D.C. Circuit’s opinion in *United States v. Microsoft*, because that opinion makes no effort to reconcile its interpretation of the Consent Decree with the Supreme Court’s standards for monopolization under Section 2 of the Sherman Act. And, in fact, neither the D.C. Circuit’s opinion nor the legal arguments made by Microsoft can be squared with *Aspen Skiing*. According to Microsoft, even though it is a monopolist, it is entitled to immunity under “the antitrust laws” (and Microsoft now claims that it means both Section 1 and Section 2) as long as it can make a plausible claim of technological benefit from the development and marketing of its product or service. If it can, then its actual intent in creating the product is “irrelevant,” and it is equally irrelevant whether there were means available to it to produce the alleged benefits that

¹⁴ The D.C. Circuit appears to condone an inquiry into the purpose and effect of the change. *See United States v. Microsoft*, 147 F. 3d 935, 949 (D.C. Cir. 1998) (“the concept of integration” should exclude cases where defendant has “bolted” the product together for anti-competitive purposes). The D.C. Circuit, in yet another apparent misstep,

were less restrictive of competition. *See* Microsoft Memo. at 14. It is simply not possible to square those legal assertions with *Aspen Skiing*.

Caldera is not obligated under Rule 56 to respond to a summary judgment argument that Microsoft has not made. Microsoft has not attempted to explain why it is entitled to summary judgment on Caldera's Windows 95 claim under Section 2 of the Sherman Act. As shown above, its arguments under Section 1 simply do not apply because the standards under the two statutes are different. Nevertheless, Caldera submits that the evidence discussed at the outset of this memorandum amply demonstrates that Microsoft's development of Windows 95 can be "fairly characterized as exclusionary" under binding Supreme Court precedent. Any attempt by Microsoft in its reply to foreclose Caldera from pursuing a Section 2 claim should be rejected.

DATED this ____ day of October, 1999.

SNOW, CHRISTENSEN & MARTINEAU

By _____
Stephen J. Hill
Ryan E. Tibbitts
Attorneys for Plaintiff, Caldera, Inc.

fails to explain how such scrutiny of the defendant's purpose can be squared with the court's desire to defer to the defendant's product design decisions.

CERTIFICATE OF SERVICE

I hereby certify that on this _____ day of April, 1999, true and correct copies of the above and foregoing instrument (Case No. 2:96CV0645B, U.S. District Court, District of Utah, Central Division) were sent as indicated:

James S. Jardine
Mark M. Bettilyon
RAY, QUINNEY & NEBEKER
79 South Main, Ste. 500 (84111)
Post Office Box 45385
Salt Lake City, UT 84142
(Via Facsimile & Federal Express)

Richard J. Urowsky
Steven L. Holley
Richard C. Pepperman II
SULLIVAN & CROMWELL
125 Broad Street
New York, NY 10004
(Via Federal Express)

Michael H. Steinberg
SULLIVAN & CROMWELL
1888 Century Park East
Los Angeles, CA 90067
(Via Federal Express)

James R. Weiss
PRESTON GARES ELLIS & ROUVELS
MEEDS
1735 New York Avenue N.W.
Washington, DC 20006
(Via Federal Express)

William H. Neukom
Thomas W. Burt
David A. Heiner, Jr.
MICROSOFT CORPORATION
One Microsoft Way, Building 8
Redmond, WA 98052
(Via Federal Express)

Celine Beard