

Microsoft: Microsoft Corp (The Computing Technology Industry Association Inc and Others, intervening) v Commission of the European Communities (Software & Information Industry Association and Others, intervening) (T-201/04), 17 September 2007, [2007] 5 C.M.L.R. 11

(NB. Highlighted sections represent notes/summaries by Val Korah.)

Appeal from decision 2007/53 (COMP/C-3.37.792—Microsoft ([2007] O.J. L32/23, [2005] 4 CMLR 965), where the Commission found that Microsoft Corp. had abused its dominant position contrary to Article 82 EC in two respects: refusal to supply interoperability information for its Windows Workgroup Server (WGS) Operating System (¶24) to competing suppliers, and tying Windows Media Player (WMP) (¶1817) with its Microsoft Windows operating system.

Interoperability

Sun Microsystems, a vendor of work group server products had asked Microsoft to provide information relating to the complete specifications (¶198) for the protocols (¶196) that WGS used to communicate with other machines in a network, and to provide information on file and print services needed by Sun in order to develop competing products on the WGS market. The Commission stated that the information required did not extend to the 'source code', but only to the complete specifications of the protocols, i.e. a detailed description of what the software in question must achieve, in contrast to its implementation (¶¶ 241, 286).

The Commission stressed that Microsoft was extremely dominant in the market for Client PCs, with a market share in excess of 90% reinforced by indirect network effects, and was dominant with a rapidly increasing market share of 60% in the Work Group Server market.

Tying

The Commission found also that Microsoft had made the availability of Windows client PC operating systems conditional on the simultaneous

acquisition of Windows Media Player. First, Microsoft had a dominant position on the client PC operating systems market. Secondly, streaming media players and client PC operating systems constituted separate products. Thirdly, Microsoft did not give consumers the opportunity to buy Windows without Windows Media Player. Finally, the tie restricted competition on the media players market.

Judgment of CFI

22 The Commission first identifies three separate worldwide product markets and considers that Microsoft had a dominant position on two of them. It then finds that Microsoft had engaged in two kinds of abusive conduct. As a result it imposes a fine and a number of remedies on Microsoft. ...

I – Relevant product markets and geographic market ¶23

24 The first market defined in the contested decision is the market for client PC operating systems. Operating systems are defined as ‘system software’ which controls the basic functions of the computer and enables the user to make use of the computer and run application software on it (recital 37 to the contested decision). Client PCs are defined as general-purpose computers designed for use by one person at a time and capable of being connected to a network (recital 45 to the contested decision).

25 As regards the second market, the contested decision defines work group server operating systems as operating systems designed and marketed to deliver collectively ‘basic infrastructure services’ to relatively small numbers of client PCs connected to small or medium-sized networks (recitals 53 and 345 to the contested decision).

26 The contested decision identifies, more particularly, three types of services. These are, first, the sharing of files stored on servers, second, the sharing of printers and, third, the administration of groups and users. ...

27 ... The contested decision characterises those different services as ‘work group services’.

28 The third market identified in the contested decision is the streaming media player market. Media players are defined as software products capable of reading audio and video content in digital form, that is to say, of decoding the corresponding data and translating them into instructions for the hardware (for example, loudspeakers or a display) (recital 60 to the contested decision).

Streaming media players are capable of reading audio and video content ‘streamed’ across the Internet (recital 63 to the contested decision).

29 As regards the relevant geographic market, the Commission finds in the contested decision, as stated at paragraph 22 above, that it has a worldwide dimension for each of the three product markets (recital 427 to the contested decision).

II – Dominant position ¶30

Microsoft did not contest the finding of dominant position in two of the markets. The Commission had found that Microsoft was dominant in both the client PC and WGS markets, citing the following findings:

Client PCs

- Market shares in excess of 90%,
- Enduring and stable market power,
- Significant barriers to entry, owing to indirect network effects,
- The dominant position presented ‘extraordinary features’, in that Windows is not only a dominant product on the market for client PC operating systems but, in addition, is the ‘de facto standard’ for those systems.

Work Group Servers:

- Market shares of at least 60%
- Low market shares of competitors (25% or below)
- Significant barriers to entry, owing to network effects and refusal to disclose information
- Close technological links between WGS and Client PC market

The Commission’s discussion of network effects is helpful:

(438) In industries exhibiting strong network effects, consumer demand depends critically on expectations about future purchases. If consumers expect a firm with a strong reputation in the current (product) generation to succeed in the next generation, this will tend to be self-fulfilling as the consumers direct their purchases to the product that they believe will yield the greatest network gains. ...

(449) The regular daily use of a client PC involves running applications on it. The overall utility that a consumer derives from a client PC

operating system therefore depends on the applications he can use on it and that he expects to be able to use on it in the future. Conversely, Independent Software Vendors ('ISVs') write applications to the client PC operating systems that are most popular among users. In other words, the more popular an operating system is, the more applications will be written to it and the more applications are written to an operating system, the more popular it will be among users.

(450) This mechanism, which can be formalised in terms of indirect network effects, more generally applies to platform software.... ISVs will develop to the platform that enables them to reach the highest possible number of users. The higher the number of users of a given platform, the greater the number of ISVs that write to that platform. In turn, there will be a greater number of applications available for the platform, and the utility derived by computer users who deploy this platform will be higher.

(451) In his testimony before the US District Court on 18 April 2002, Microsoft's Chairman Bill Gates described this network effect dynamic:

"Early on, [Microsoft] recognized that [, as] more products became available and more information could be exchanged, more consumers would be attracted to the platform, which would in turn attract more investment in product development for the platform. Economists call this a 'network effect', but at the time we called it the 'positive feedback Loop'."...

(458) In essence, the dynamic between the Windows client PC operating system and the large body of applications that is written to it is self-reinforcing. In other words, applications developers have a compelling economic incentive to continue writing applications for the dominant client PC operating system platform (that is to say, Windows) because they know that the potential market will be larger.

(459) In conclusion, the 'positive feedback loop' protects Microsoft's high market shares in the client PC operating system market from effective competition from a potential new entrant. ...

The CFI first considered the alleged abuse of not supplying interface information to its competitor for work group services.:-

B – The refusal to supply and to authorise the use of interoperability information

1. First part: the criteria on which an undertaking in a dominant position may be compelled to grant a licence, as defined by the Community judicature, are not satisfied in the present case

a) Introduction ¶101

b) The varying degrees of interoperability and the scope of the remedy prescribed in Article 5 of the contested decisions ¶118

Findings of the Court

151 ... Microsoft raises two main issues: first, the degree of interoperability required by the Commission in the present case; and, second, the scope of the remedy prescribed in Article 5 of the contested decision.

152 Those two issues are intrinsically linked, since, as is apparent in particular from recital 998 to the contested decision, the purpose of the remedy is to require Microsoft to disclose what in the Commission's contention it has abusively refused to disclose, and to disclose it both to Sun and to its other competitors. The scope of the remedy must therefore be assessed in the light of the abusive conduct in which Microsoft is found to have engaged, which depends in particular on the degree of interoperability envisaged by the Commission in the contested decision. ...

– Factual and technical findings ¶154

The Commission required Microsoft to provide full and accurate interoperability information to its competitors downstream.

- The nature of the information referred to in the contested decision...

195 Thus, in Article 1(1) of the contested decision, it defines 'interoperability information' as 'the complete and accurate specifications for all the protocols [that are] implemented in Windows work group server operating systems and that are used by Windows work group servers to deliver file and print services and group and user administration services, including the Windows domain controller services, Active Directory services and Group Policy services, to Windows work group networks'.

196 'Protocols' are described by the Commission as rules of interconnection and interaction between various pieces of software within a network (recital 49

to the contested decision). More specifically, the protocols at issue in the present case are defined as ‘a set of rules of interconnection and interaction between various instances of Windows work group server operating systems and Windows client PC operating systems running on different computers in a Windows work group network’ (Article 1(2) of the contested decision).

197 The Court notes that Microsoft does not contest the Commission’s concept of ‘protocols’. On the contrary, in the application Microsoft itself describes protocols as enabling ‘computers connected via a network to exchange information to accomplish predefined tasks’.

198 ‘Specifications’ are not defined in the operative part of the contested decision. However, it is common ground that specifications take the form of detailed technical documentation, which, indeed, reflects the way in which that concept is generally understood in the computer industry. ...

– **The degree of interoperability required by the Commission in the contested decision**

207 The Commission adopted a two-stage approach in determining whether the information at issue was indispensable. It first examined the degree of interoperability with the Windows domain architecture that the work group server operating systems supplied by Microsoft’s competitors must achieve in order for those competitors to be able to remain viably on the market. It then proceeded to determine whether the interoperability information to which Microsoft refused access was indispensable to the attainment of that degree of interoperability. ...

The CFI noted that the Commission’s definition of interoperability was consistent with that envisaged in Directive 91/250 on the legal protection of computer programs, and that Article 82 EC was a provision of higher rank than the Directive.

228 In the second place, the Court observes that the Commission assessed the degree of interoperability by reference to what, in its view, was necessary in order to enable developers of non-Microsoft work group server operating systems to remain viably on the market (see, in particular, footnote 712 and recital 779 to the contested decision).

229 The correctness of that approach is not open to dispute. Article 82 EC deals with the conduct of one or more economic operators involving the abuse of a position of economic strength which enables the operator concerned to hinder the maintenance of effective competition on the relevant market by allowing it to behave to an appreciable extent independently of its competitors,

its customers and, ultimately, consumers (Joined Cases C-359/96 P and C-396/96 P *Compagnie Maritime Belge transports and Others v Commission* [2000] ECR I-1365, paragraph 34 [CB p.108]). Furthermore, whilst the finding of a dominant position does not in itself imply any criticism of the undertaking concerned, that undertaking has a special responsibility, irrespective of the causes of that position, not to allow its conduct to impair genuine undistorted competition on the common market (Case 322/81 *Michelin v Commission* [1983] ECR 3461, paragraph 57, and Case T-228/97 *Irish Sugar v Commission* [1999] ECR II-2969, paragraph 112). Should it be established in the present case that the existing degree of interoperability does not enable developers of non-Microsoft work group server operating systems to remain viably on the market for those operating systems, it follows that the maintenance of effective competition on that market is being hindered.

230 It follows from the contested decision that, by adopting that approach and taking as its basis a factual and technical analysis of the products and technologies concerned and also of the way in which interoperability is achieved in Windows work group networks, the Commission concluded that, in order to be capable of competing viably with Windows work group server operating systems, competing operating systems had to be able to interoperate with Windows domain architecture on an equal footing with Windows work group server operating systems (see to that effect, in particular, recitals 182 and 282 to the contested decision).

231 The interoperability thus required by the Commission has two indissociable components, namely client/server interoperability and server/server interoperability (recitals 177 to 182 and 689 to the contested decision).

232 The Commission also maintains that when a non-Microsoft work group server operating system is installed on a Windows work group server network, it must be capable not only of delivering all its functionalities to Windows client PCs but also of using all the functionalities offered by those client PCs. ...

234 The Court finds that, contrary to Microsoft's claim, it cannot be inferred from the degree of interoperability thus required by the Commission that the Commission intends in reality that non-Microsoft server operating systems must function in every respect like a Windows server operating system and, accordingly, that Microsoft's competitors must be in a position to 'clone' or 'reproduce' its products or certain features of those products. ...

238 In order for such operations to be practicable, it is not necessary that non-Microsoft work group server operating systems should function internally in exactly the same way as Windows work group server operating systems. ...

240 In the same way Microsoft's assertion that the contested decision intends that its competitors should develop exactly the same products as Windows work group server operating systems must be rejected. As the Court will explain in greater detail at paragraphs 65[0] to 658 below, in its examination of the circumstance relating to the appearance of a new product, the aim pursued by the Commission is to remove the obstacle for Microsoft's competitors represented by the insufficient degree of interoperability with the Windows domain architecture, in order to enable those competitors to offer work group server operating systems which differ from Microsoft's on important parameters such as, in particular, security, reliability, processing speed or the innovative nature of certain functionalities.

241 The Court also notes that, as Microsoft itself expressly acknowledges in its written submissions (see, for example, paragraphs 14 and 48 of the reply), its competitors will not be in a position to develop products which are 'clones' or reproductions of Windows work group server operating systems by having access to the interoperability information at which the contested decision is aimed. ...That information does not relate to Microsoft's source code. In particular, Article 5 of the contested decision does not require Microsoft to disclose implementation details to its competitors. ...

243 Nor can the Court accept Microsoft's claim that it follows from the undertakings' statements which it produced during the administrative procedure that there is already a high degree of interoperability between Windows client PC and server operating systems and non-Microsoft server operating systems, owing to the use of methods already available on the market. ...

c) The assertion that Microsoft's communication protocols are protected by intellectual property rights ¶267 ...

283 Although the parties devoted lengthy argument, both in their written pleadings and at the hearing, to the question of the intellectual property rights which cover Microsoft's communication protocols or the specifications of those protocols, the Court considers that there is no need to decide that question in order to resolve the present case.

284 The arguments which Microsoft derives from the alleged intellectual property rights cannot, as such, affect the lawfulness of the contested decision. The Commission did not take a position on the merits of those arguments but adopted the decision on the assumption that Microsoft was able to rely on such rights in the present case. In other words, it proceeded on the premise that, so far as it relates to the interoperability information, the conduct at issue in the present case might not be a mere refusal to supply a product or a service indispensable to the exercise of a specific activity but a refusal to license

intellectual property rights, and thus chose the strictest legal test and therefore the one most favourable to Microsoft (see paragraphs 312 to 336 below). The Commission did not therefore decide whether or not Microsoft's impugned conduct constituted a refusal to grant a licence or whether or not the remedy prescribed by Article 5 of the contested decision entailed compulsory licensing.

285 Thus, at recital 190 to the contested decision, the Commission states that during the administrative procedure Microsoft relied on the existence of intellectual property rights and the fact that the interoperability information at issue constituted trade secrets. The Commission notes that it is not excluded that Microsoft relied on those rights to prevent Sun from implementing the specifications in question in its own products. It also acknowledges that it is possible that those specifications contain innovations and constitute trade secrets. More generally, the Commission observes that it cannot be excluded that ordering Microsoft to disclose the interoperability information to third parties and to allow them to use it will interfere with the free exercise of its intellectual property rights. It reiterates that last consideration at recital 546 to the contested decision. ...

286 Furthermore, at recitals 1003 and 1004 to the contested decision, the Commission, in describing the scope of the remedy for Microsoft's refusal, states, first, that the remedy applies only to interface specifications and not to the source code and, second, that the intention is that Microsoft's competitors be authorised to implement the disclosed specifications in their work group server operating systems. Thus, it states, inter alia, that 'the specifications should also not be reproduced, adapted, arranged or altered, but should be used by third parties to write their own specification-compliant interfaces' (recital 1004 to the contested decision). The Commission concludes that, '[i]n any event, to the extent that [the contested decision] might require Microsoft to refrain from fully enforcing any of its intellectual property rights, [that] would be justified by the need to put an end to the abuse' (recital 1004 to the contested decision). ...

288 Furthermore, the Commission confirmed, in answer to one of the written questions put by the Court, that the contested decision did not establish that the interoperability information was not covered by a patent or by copyright or, on the contrary, that it was. There was no need to decide that issue since, in any event, 'the conditions for finding an abuse and for imposing the remedy [prescribed by Article 5 of the contested decision] were satisfied whether or not the information is protected by any patent or copyright'.

289 It follows from the foregoing considerations that the appraisal of the merits of the first part of the plea must proceed on the presumption that the protocols in question, or the specifications of those protocols, are covered by

intellectual property rights or constitute trade secrets and that those secrets must be treated as equivalent to intellectual property rights.

290 The central issue to be resolved in this part of the plea therefore is whether, as the Commission claims and Microsoft denies, the conditions on which an undertaking in a dominant position may be required to grant a licence covering its intellectual property rights are satisfied in the present case.

d) The specific arguments invoked in support of the first part of the plea

(i) The circumstances by reference to which the abusive conduct must be analysed...

Findings of the Court

312 It must be borne in mind that Microsoft's argument is that its refusal to supply interoperability information cannot constitute an abuse of a dominant position within the meaning of Article 82 EC because, first, the information is protected by intellectual property rights (or constitutes trade secrets) and, second, the criteria established in the case-law which determine when an undertaking in a dominant position can be required to grant a licence to a third party are not satisfied in this case.

313 It must also be borne in mind that the Commission contends that there is no need to decide whether Microsoft's conduct constitutes a refusal to license intellectual property rights to a third party, or whether trade secrets merit the same degree of protection as intellectual property rights, since the strict criteria against which such a refusal may be found to constitute an abuse of a dominant position within the meaning of Article 82 EC are in any event satisfied in the present case (see paragraphs 284 to 288 above). ...

315 Thus, Microsoft relies, primarily, on the criteria laid down in *Magill* and *IMS Health*, [CB p.198, 217], and, in the alternative, on those laid down in *Bronner*, [CB p.215].

316 The Commission, on the other hand, contends that an 'automatic' application of the criteria laid down in *IMS Health* would be 'problematic' in this case. It maintains that, in order to determine whether such a refusal is abusive, it must take into consideration all the particular circumstances surrounding that refusal, which need not necessarily be the same as those identified in *Magill* and *IMS Health*. Thus it explains at recital 558 to the contested decision, that '[t]he case-law of the European Courts ... suggests that the Commission must analyse the entirety of the circumstances surrounding a

specific instance of a refusal to supply and must take its decision [on the basis of] the results of such a comprehensive examination’.

317 At the hearing, the Commission, questioned on this issue by the Court, confirmed that it had considered in the contested decision that Microsoft’s conduct presented three characteristics which allowed it to be characterised as abusive. The first consists in the fact that the information which Microsoft refuses to disclose to its competitors relates to interoperability in the software industry, a matter to which the Community legislature attaches particular importance. The second characteristic lies in the fact that Microsoft uses its extraordinary power on the client PC operating systems market to eliminate competition on the adjacent work group server operating systems market. The third characteristic is that the conduct in question involves disruption of previous levels of supply.

318 The Commission contends that in any event the criteria recognised by the Court of Justice in *Magill* and *IMS Health* are also satisfied in this case.

319 In response to those various arguments, the Court observes that, as the Commission rightly states at recital 547 to the contested decision, although undertakings are, as a rule, free to choose their business partners, in certain circumstances a refusal to supply on the part of a dominant undertaking may constitute an abuse of a dominant position within the meaning of Article 82 EC unless it is objectively justified. ...

The Court summarised previous case law: *Commercial Solvents*, *Volvo*, *IMS*, *Magill* & *Bronner*

331 It follows from the case-law cited above that the refusal by an undertaking holding a dominant position to license a third party to use a product covered by an intellectual property right cannot in itself constitute an abuse of a dominant position within the meaning of Article 82 EC. It is only in exceptional circumstances that the exercise of the exclusive right by the owner of the intellectual property right may give rise to such an abuse.

332 It also follows from that case-law that the following circumstances, in particular, must be considered to be exceptional:

- In the first place, the refusal relates to a product or service indispensable to the exercise of a particular activity on a neighbouring market;
- In the second place, the refusal is of such a kind as to exclude any effective competition on that neighbouring market;

– In the third place, the refusal prevents the appearance of a new product for which there is potential consumer demand.

333 Once it is established that such circumstances are present, the refusal by the holder of a dominant position to grant a licence may infringe Article 82 EC unless the refusal is objectively justified.

334 The Court notes that the circumstance that the refusal prevents the appearance of a new product for which there is potential consumer demand is found only in the case-law on the exercise of an intellectual property right.

335 Finally, it is appropriate to add that, in order that a refusal to give access to a product or service indispensable to the exercise of a particular activity may be considered abusive, it is necessary to distinguish two markets, namely, a market constituted by that product or service and on which the undertaking refusing to supply holds a dominant position and a neighbouring market on which the product or service is used in the manufacture of another product or for the supply of another service. The fact that the indispensable product or service is not marketed separately does not exclude from the outset the possibility of identifying a separate market (see, to that effect, *IMS Health*, paragraph 43 [CB p.220]). Thus, the Court of Justice held, at paragraph 44 of *IMS Health*, that it was sufficient that a potential market or even a hypothetical market could be identified and that such was the case where the products or services were indispensable to the conduct of a particular business activity and where there was an actual demand for them on the part of undertakings which sought to carry on that business. The Court of Justice concluded at the following paragraph of the judgment that it was decisive that two different stages of production were identified and that they were interconnected in that the upstream product was indispensable for supply of the downstream product.

336 In the light of the foregoing factors, the Court considers that it is appropriate, first of all, to decide whether the circumstances identified in *Magill* and *IMS Health*, as described at paragraphs 332 and 333 above, are also present in this case. Only if it finds that one or more of those circumstances are absent will the Court proceed to assess the particular circumstances invoked by the Commission (see paragraph 317 above).

(ii) The indispensable nature of the interoperability information...

Findings of the Court

369 As already pointed out at paragraph 207 above, the Commission adopted a two-stage approach in determining whether the information at issue was indispensable, in that, first of all, it considered what degree of interoperability

with the Windows domain architecture non-Microsoft work group server operating systems must achieve in order for its competitors to be able to remain viably on the market and, second, it appraised whether the interoperability that Microsoft refused to disclose was indispensable to the attainment of that degree of interoperability. ...

374 The Court has already defined, at paragraphs 207 to 245 above, the degree of interoperability which the Commission required in the contested decision. The Court observed, in particular, that the Commission had concluded that, in order to be able to compete viably with Windows work group server operating systems, competitors' operating systems must be able to interoperate with the Windows domain architecture on an equal footing with those Windows systems (see paragraph 230 above). The Court has held that interoperability, as thus envisaged by the Commission, had two indissociable components, client/server interoperability and server/server interoperability....

381 ... Microsoft has not established that the Commission's finding that 'interoperability with the client PC operating system is of significant competitive importance in the market for work group server operating systems' (recital 586 to the contested decision) is manifestly incorrect.

382 On the contrary, a number of factors confirm the correctness of that finding.

383 ... It is necessary to bear in mind that, by nature, computer programs do not function in isolation, but are designed to communicate and function with other computer programs and hardware, especially in network environments...

384 Furthermore, within the computer networks installed in organisations, the need to be able to function together is particularly pressing in the case of client PC operating systems and work group server operating systems. ... File and print services and group and user administration services are intimately connected to the use of client PCs and are provided to users of client PCs as a set of interconnected tasks. ... In computer networks the relationship between work group servers and client PCs is 'stimulated' or 'provoked' by actions or requests originated by client PC users, such as, in particular, the entry of a name and password, the creation of a file or a request to print a document. ... Last, it must be borne in mind that one of the essential functions of work group server operating systems is specifically the administration of client PCs. ...

386 In the second place, the Court considers that the interoperability of work group server operating systems with client PC operating systems is even more important in the case of Windows client PC operating systems.

387 Microsoft's dominant position on the client PC operating systems market exhibits, as the Commission states at recitals 429 and 472 to the contested decision, 'extraordinary features', since, notably, its market shares on that market are more than 90% (recitals 430 to 435 to the contested decision) and since Windows represents the 'quasi-standard' for those operating systems.

388 As the Windows operating system is thus present on virtually all client PCs installed within organisations, non-Windows work group server operating systems cannot continue to be marketed if they are incapable of achieving a high degree of interoperability with Windows. ...

390 More specifically, the Commission considers that, in order to be able to be viably marketed, non-Windows work group server operating systems must be capable of participating in the Windows domain architecture. ...

391 The Court therefore finds that Microsoft has not established that that assessment is manifestly incorrect.

392 ... [T]he Commission was correct to find, at recital 697 to the contested decision, that Microsoft was able to impose the Windows domain architecture as the '*de facto* standard for work group...

393 Second, as the Commission states at recital 637 to the contested decision, various sources of evidence, such as Microsoft's own marketing documents, reports by industry analysts, evidence obtained during the 2003 market enquiry and the Mercer surveys, show that interoperability with the Windows environment is a factor that plays a key role in the uptake of Windows work group server operating systems. ...

The CFI went on at considerable length to consider the factual evidence used by the Commission to establish the importance of interoperability. ¶¶ 394-435.

436 It follows from all of the foregoing considerations that Microsoft has not demonstrated that the circumstance that the interoperability information was indispensable was not present in this case. ...

Microsoft did not contest the Commission's findings in relation to its dominant position over the Windows OS for client PCs.

(iii) Elimination of competition

Arguments of the parties...

439 Microsoft observes that, at recital 589 to the contested decision, the Commission refers to a mere ‘risk’ of elimination of competition on the market. In cases dealing with compulsory licensing of intellectual property rights, on the other hand, the Court has always ascertained whether the refusal in question was ‘likely to eliminate all competition’ and required, in that regard, ‘something close to certainty’. The Commission therefore ought to have applied a stricter test, namely the test of a ‘high probability’ of eliminating effective competition. Contrary to the Commission’s contention, the words ‘risk’, ‘possibility’ and ‘likelihood’ do not mean the same thing. ...

Findings of the Court

479 The Court will examine in the following order the four categories of arguments which Microsoft puts forward in support of its contention that the circumstance relating to the elimination of competition is not present in this case: first, the definition of the relevant product market; second, the method used to calculate market shares; third, the applicable criterion; and, fourth, the assessment of the market data and the competitive situation.

– The definition of the relevant product market

480 Microsoft’s arguments in respect of the definition of the relevant product market concern the second of the three markets identified by the Commission in the contested decision (see paragraphs 25 to 27 above), namely, the work group server operating systems market. The Commission describes those systems as being designed and marketed to deliver collectively file and print sharing services and group and user services to a relatively small number of client PCs linked together in a small or medium-sized network (recitals 53 and 345 to the contested decision). ...

The CFI examined the Commission’s definition, and the method by which it had been reached. It determined that the Commission had taken into account demand and supply-side substitutability, and appropriate survey evidence concerning the important services in work group server operating systems. It concluded that Microsoft had raised no argument capable of defeating the Commission’s finding that there were no products exercising sufficient competitive pressure on work group server operating systems such that they should be included in the same relevant product market. It found also that the Commission’s method of calculating market shares was not vitiated by manifest error of assessment.

559 Last, as regards the abusive refusal to supply, it must be borne in mind that in the contested decision the Commission takes issue with Microsoft for

having used, by leveraging, its quasi-monopoly on the client PC operating systems market to influence the work group server operating systems market (recitals 533, 538, 539, 764 to 778, 1063, 1065 and 1069). In other words, Microsoft's abusive conduct has its origin in its dominant position on the first product market (recitals 567 and 787 to the contested decision). Even if the Commission were wrongly to have considered that Microsoft was in a dominant position on the second market (see, in particular, recitals 491 to 541, 781 and 788 to the contested decision) that could not therefore of itself suffice to support a finding that the Commission was wrong to conclude that there had been an abuse of a dominant position by Microsoft.

– **The applicable criterion**

560 In the contested decision, the Commission considered whether the refusal at issue gave rise to a 'risk' of the elimination of competition on the work group server operating systems market (recitals 585, 589, 610, 622, 626, 631, 636, 653, 691, 692, 712, 725, 781, 992 and 1070 to the contested decision). Microsoft contends that that criterion is not sufficiently strict, since according to the case-law on the exercise of an intellectual property right the Commission must demonstrate that the refusal to license an intellectual property right to a third party is 'likely to eliminate all competition', or, in other words, that there is a 'high probability' that the conduct in question will have such a result.

561 The Court finds that Microsoft's complaint is purely one of terminology and is wholly irrelevant. The expressions 'risk of elimination of competition' and 'likely to eliminate competition' are used without distinction by the Community judicature to reflect the same idea, namely that Article 82 EC does not apply only from the time when there is no more, or practically no more, competition on the market. If the Commission were required to wait until competitors were eliminated from the market, or until their elimination was sufficiently imminent, before being able to take action under Article 82 EC, that would clearly run counter to the objective of that provision, which is to maintain undistorted competition in the common market and, in particular, to safeguard the competition that still exists on the relevant market.

562 In this case, the Commission had all the more reason to apply Article 82 EC before the elimination of competition on the work group server operating systems market had become a reality because that market is characterised by significant network effects and because the elimination of competition would therefore be difficult to reverse (see recitals 515 to 522 and 533 to the contested decision).

563 Nor is it necessary to demonstrate that all competition on the market would be eliminated. What matters, for the purpose of establishing an

infringement of Article 82 EC, is that the refusal at issue is liable to, or is likely to, eliminate all effective competition on the market. It must be made clear that the fact that the competitors of the dominant undertaking retain a marginal presence in certain niches on the market cannot suffice to substantiate the existence of such competition.

564 Last, it must be borne in mind that it is for the Commission to establish that the refusal to supply gives rise to a risk of the elimination of all effective competition. As already stated... above, the Commission must base its assessment on accurate, reliable and coherent evidence which comprises all the relevant data that must be taken into consideration in order to assess a complex situation and which are capable of substantiating the conclusions drawn from them.

– **The assessment of the market data and the competitive situation**

565 In the contested decision, the Commission analyses together the circumstance that interoperability is indispensable and the fact that the refusal is likely to eliminate competition (recitals 585 to 692 to the contested decision). Its analysis has four parts. In the first place, the Commission examines the evolution of the work group server operating systems market (recitals 590 to 636 to the contested decision). In the second place, it establishes that interoperability is a factor which plays a determining role in the use of Windows work group server operating systems (recitals 637 to 665 to the contested decision). In the third place, it states that there are no substitutes for disclosure by Microsoft of the interoperability information (recitals 666 to 687 to the contested decision). In the fourth place, it makes a number of observations about the CPLC (recitals 688 to 691 to the contested decision).

566 The arguments which Microsoft puts forward in support of the present complaint relate essentially to the first part of the Commission's analysis. Microsoft claims, in effect, that the market data contradict the Commission's argument that competition on the work group server operating systems market is at risk of being eliminated as a consequence of the refusal at issue.

567 In the first part of its analysis, the Commission began by examining the evolution of the market shares of Microsoft and its competitors on the second product market. It established, essentially, that Microsoft's market share had experienced rapid and significant growth and that it continued to increase to the detriment of Novell in particular. The Commission then noted that the market share of UNIX vendors was weak. Last, it considered that Linux products had only a very small presence on the market, that they had made no headway on the market during the years immediately preceding the adoption of the contested decision and that certain forecasts concerning their future growth were not

capable of calling in question its finding that effective competition would be eliminated on the market.

568 The Court considers that those different findings are confirmed by the evidence in the file and that they are not called in question by Microsoft's arguments.

569 First, the file shows that initially Microsoft supplied only client PC operating systems and that it was a relatively late entrant to the server operating systems market... It was only in the early 1990s that Microsoft began to develop a server operating system... and it was only with 'Windows NT 4.0', released in July 1996, that it first encountered real commercial success. ...

Microsoft's market share had expanded rapidly, and the release of Windows 2000 saw a continuously increasing market share. It was with this release that the problems of interoperability became acute for Microsoft's competitors. Thereafter, any increases in market shares of individual competitors was at the expense of each other, not of Microsoft's share.

593 The above factors confirm that Microsoft's refusal has the consequence that its competitors' products are confined to marginal positions or even made unprofitable. The fact that there may be marginal competition between operators on the market cannot therefore invalidate the Commission's argument that all effective competition was at risk of being eliminated on that market.

594 In light of the factors referred to... above, the Court considers that the Commission was correct to find, at recital 603 to the contested decision, that Linux vendors did not represent a significant threat to Microsoft on the work group server operating systems market. ...

613 Last, the Commission concluded the first part of its analysis by rejecting three categories of arguments that Microsoft had put forward during the administrative procedure to dispute the risk of elimination of competition identified by the Commission. Microsoft had referred to certain statements made by its competitors, relied on the fact that the computer networks within undertakings were heterogeneous and claimed that replacement solutions for Windows existed. ...

These arguments were summarily rejected by the CFI.

617 Furthermore, Microsoft's argument that, six years after the alleged refusal to supply, there were still numerous competitors on the work group server operating systems market... must be rejected for the reasons set out... above.

618 It follows from all of the foregoing that the Commission did not make a manifest error of assessment when it concluded that the evolution of the market revealed a risk that competition would be eliminated on the work group server operating systems market.

619 The Commission had even more reason to conclude that there was a risk that competition would be eliminated on that market because the market has certain features which are likely to discourage organisations which have already taken up Windows for their work group servers from migrating to competing operating systems in the future. Thus, as the Commission correctly states at recital 523 to the contested decision, it follows from certain results of the third Mercer survey that the fact of having an ‘established record as proven technology’ is seen as a significant factor by the large majority of IT executives questioned. At the time of the adoption of the contested decision, Microsoft, at a conservative estimate, held a market share of at least 60% on the work group server operating systems market (recital 499 to the contested decision). Likewise, certain results of that survey also establish that the factor ‘available skill-sets and cost/availability of support (in-house or external)’ is important for the majority of the IT executives questioned. As the Commission quite correctly states at recital 520 to the contested decision, ‘[that] means that the easier it is to find technicians skilled in using a given work group server operating system, the more customers are inclined to purchase that work group server operating system’ and, ‘[i]n turn, however, the more popular a work group server operating system is among customers, the easier it is for technicians (and the more willing are technicians) to acquire skills related to that product’. Microsoft’s very high market share on the work group server operating system market has the consequence that a very large number of technicians possess skills which are specific to Windows operating systems.

620 The Court therefore concludes that the circumstance that the refusal at issue entailed the risk of elimination of competition is present in this case.

(iv) The new product...

643 It must be emphasised that the fact that the applicant’s conduct prevents the appearance of a new product on the market falls to be considered under Article 82(b) EC, which prohibits abusive practices which consist in ‘limiting production, markets or technical developments to the... prejudice of consumers’.

644 Thus, at paragraph 54 of *Magill*, ... [CB p. 198], the Court of Justice held that the refusal by the broadcasting companies concerned had to be characterised as abusive within the meaning of that provision because it

prevented the appearance of a new product which the broadcasting companies did not offer and for which there was a potential consumer demand.

645 It is apparent from the decision at issue in that case that the Commission had, more specifically, considered that by their refusal, the broadcasting companies limited production or markets to the prejudice of consumers (see the first paragraph of recital 23 to Commission Decision 89/205/EEC of 21 December 1988 relating to a proceedings under Article [82 EC] (IV/31.851, *Magill TV Guide/ITP, BBC and RTE*) (OJ 1989 L 78, p. 43). ... In finding an abuse of a dominant position by those broadcasting companies, the Commission had emphasised the harm which the absence of a general weekly television guide on the market in Ireland and in Northern Ireland caused to consumers, who, if they wished to know what programmes were being offered in the coming week, had no alternative to buying the weekly guides of each channel and themselves extracting the relevant information in order to make comparisons.

646 In *IMS Health*, [CB p. 217], the Court of Justice, when assessing the circumstance relating to the appearance of a new product, also placed that circumstance in the context of the damage to the interests of consumers. Thus, at paragraph 48 of that judgment, the Court emphasised, with reference to the Opinion of Advocate General Tizzano in that case ([2004] ECR I-5042), that that circumstance related to the consideration that, in the balancing of the interest in protection of the intellectual property right and the economic freedom of its owner against the interest in protection of free competition, the latter can prevail only where refusal to grant a licence prevents the development of the secondary market, to the detriment of consumers.

647 The circumstance relating to the appearance of a new product, as envisaged in *Magill* and *IMS Health*, cannot be the only parameter which determines whether a refusal to license an intellectual property right is capable of causing prejudice to consumers within the meaning of Article 82(b) EC. As that provision states, such prejudice may arise where there is a limitation not only of production or markets, but also of technical development.

648 It was on that last hypothesis that the Commission based its finding in the contested decision. Thus, the Commission considered that Microsoft's refusal to supply the relevant information limited technical development to the prejudice of consumers within the meaning of Article 82(b) EC (recitals 693 to 701 and 782 to the contested decision) and it rejected Microsoft's assertion that it had not been demonstrated that its refusal caused prejudice to consumers (recitals 702 to 708 to the contested decision).

649 The Court finds that the Commission's findings at the recitals referred to in the preceding paragraph are not manifestly incorrect.

650 Thus, in the first place, the Commission was correct to observe, at recital 694 to the contested decision, that '[owing] to the lack of interoperability that competing work group server operating system products can achieve with the Windows domain architecture, an increasing number of consumers are locked into a homogeneous Windows solution at the level of work group server operating systems'. ...

The Court recalled earlier factual findings (¶¶381-393) that the refusal had prevented competitors from developing operating systems with a sufficient degree of interoperability to attract consumers. This had led consumers to purchase Microsoft's products notwithstanding the fact that they considered non-Microsoft products to be superior in various respects. This negatively affected consumers by restricting their access to features they considered important. There was further evidence that the refusal had prevented the development of more advanced features by competitors.

655 The Commission was careful to emphasise, in that context, that there was 'ample scope for differentiation and innovation beyond the design of interface specifications' (recital 698 to the contested decision). In other words, the same specification can be implemented in numerous different and innovative ways by software designers.

656 Thus, the contested decision rests on the concept that, once the obstacle represented for Microsoft's competitors by the insufficient degree of interoperability with the Windows domain architecture has been removed, those competitors will be able to offer work group server operating systems which, far from merely reproducing the Windows systems already on the market, will be distinguished from those systems with respect to parameters which consumers consider important (see, to that effect, recital 699 to the contested decision).

657 It must be borne in mind, in that regard, that Microsoft's competitors would not be able to clone or reproduce its products solely by having access to the interoperability information covered by the contested decision. Apart from the fact that Microsoft itself acknowledges in its pleadings that the remedy prescribed by Article 5 of the contested decision would not allow such a result to be achieved (see paragraph 241 above), it is appropriate to repeat that the information at issue does not extend to implementation details or to other features of Microsoft's source code ... The Court also notes that the protocols whose specifications Microsoft is required to disclose in application of the

contested decision represent only a minimum part of the entire set of protocols implemented in Windows work group server operating systems.

658 Nor would Microsoft's competitors have any interest in merely reproducing Windows work group server operating systems. Once they are able to use the information communicated to them to develop systems that are sufficiently interoperable with the Windows domain architecture, they will have no other choice, if they wish to take advantage of a competitive advantage over Microsoft and maintain a profitable presence on the market, than to differentiate their products from Microsoft's products with respect to certain parameters and certain features. It must be borne in mind that, as the Commission explains at recitals 719 to 721 to the contested decision, the implementation of specifications is a difficult task which requires significant investment in money and time.

659 Last, Microsoft's argument that it will have less incentive to develop a given technology if it is required to make that technology available to its competitors... is of no relevance to the examination of the circumstance relating to the new product, where the issue to be decided is the impact of the refusal to supply on the incentive for Microsoft's competitors to innovate and not on Microsoft's incentives to innovate. That is an issue which will be decided when the Court examines the circumstance relating to the absence of objective justification.

660 In the third place, the Commission is also correct to reject as unfounded Microsoft's assertion during the administrative procedure that it was not demonstrated that its refusal caused prejudice to consumers (recitals 702 to 708 to the contested decision).

661 First of all, ... the results of the third Mercer survey show that, contrary to Microsoft's contention, consumers consider non-Microsoft work group server operating systems to be better than Windows work group server operating systems on a number of features to which they attach great importance.

663 Furthermore, Microsoft's own statements concerning the disclosures made under the United States settlement show that those disclosures had the consequence of offering greater choice to consumers (see recital 703 to the contested decision).

664 Last, it must be borne in mind that it is settled case-law that Article 82 EC covers not only practices which may prejudice consumers directly but also those which indirectly prejudice them by impairing an effective competitive structure (Case 85/76 *Hoffmann-La Roche v Commission* [1979] ECR 461, paragraph 125, and *Irish Sugar v Commission*, paragraph 229 above, paragraph 232). In

this case, Microsoft impaired the effective competitive structure on the work group server operating systems market by acquiring a significant market share on that market.

665 The Court concludes from all of the foregoing considerations that the Commission's finding to the effect that Microsoft's refusal limits technical development to the prejudice of consumers within the meaning of Article 82(b) EC is not manifestly incorrect. The Court therefore finds that the circumstance relating to the appearance of a new product is present in this case.

(v) The absence of objective justification...

Findings of the Court

688 The Court notes, as a preliminary point, that although the burden of proof of the existence of the circumstances that constitute an infringement of Article 82 EC is borne by the Commission, it is for the dominant undertaking concerned, and not for the Commission, before the end of the administrative procedure, to raise any plea of objective justification and to support it with arguments and evidence. It then falls to the Commission, where it proposes to make a finding of an abuse of a dominant position, to show that the arguments and evidence relied on by the undertaking cannot prevail and, accordingly, that the justification put forward cannot be accepted.

689 In the present case, as the Commission found at recital 709 to the contested decision and as Microsoft expressly confirmed in the application, Microsoft relied as justification for its conduct solely on the fact that the technology concerned was covered by intellectual property rights. It made clear that if it were required to grant third parties access to that technology, that 'would ... eliminate future incentives to invest in the creation of more intellectual property' (recital 709 to the contested decision). In the reply, the applicant also relied on that fact that the technology was secret and valuable and that it contained important innovations.

690 The Court considers that, even on the assumption that it is correct, the fact that the communication protocols covered by the contested decision, or the specifications for those protocols, are covered by intellectual property rights cannot constitute objective justification within the meaning of *Magill* and *IMS Health*, [CB p. 198, 217]. Microsoft's argument is inconsistent with the *raison d'être* of the exception which that case-law thus recognises in favour of free competition, since if the mere fact of holding intellectual property rights could in itself constitute objective justification for the refusal to grant a licence, the exception established by the case-law could never apply. In other words, a refusal to license an intellectual property right could never be considered to

constitute an infringement of Article 82 EC even though in *Magill* and *IMS Health...*, the Court of Justice specifically stated the contrary.

691 It must be borne in mind that, as stated... above, the Community judicature considers that the fact that the holder of an intellectual property right can exploit that right solely for his own benefit constitutes the very substance of his exclusive right. Accordingly, a simple refusal, even on the part of an undertaking in a dominant position, to grant a licence to a third party cannot in itself constitute an abuse of a dominant position within the meaning of Article 82 EC. It is only when it is accompanied by exceptional circumstances such as those hitherto envisaged in the case-law that such a refusal can be characterised as abusive and that, accordingly, it is permissible, in the public interest in maintaining effective competition on the market, to encroach upon the exclusive right of the holder of the intellectual property right by requiring him to grant licences to third parties seeking to enter or remain on that market. It must be borne in mind that it has been established above that such exceptional circumstances were present in this case.

692 The argument which Microsoft puts forward in the reply, namely that the technology concerned is secret and of great value to the licensees and contains important innovations, cannot succeed either.

693 First, the fact that the technology concerned is secret is the consequence of a unilateral business decision on Microsoft's part. Furthermore, Microsoft cannot rely on the argument that the interoperability information is secret as a ground for not being required to disclose it unless the exceptional circumstances identified by the Court of Justice in *Magill* and *IMS Health*, are present, and at the same time justify its refusal by what it alleges to be the secret nature of the information. Last, there is no reason why secret technology should enjoy a higher level of protection than, for example, technology which has necessarily been disclosed to the public by its inventor in a patent-application procedure.

694 Second, from the moment at which it is established that – as in this case – the interoperability information is indispensable, that information is necessarily of great value to the competitors who wish to have access to it.

695 Third, it is inherent in the fact that the undertaking concerned holds an intellectual property right that the subject-matter of that right is innovative or original. There can be no patent without an invention and no copyright without an original work.

696 The Court further observes that in the contested decision the Commission did not simply reject Microsoft's assertion that the fact that the technology concerned was covered by intellectual property rights justified its refusal to

disclose the relevant information. The Commission also examined the applicant's argument that if it were required to give third parties access to that technology there would be a negative impact on its incentives to innovate (recitals 709 and 712 to the contested decision).

697 The Court finds that, as the Commission correctly submits, Microsoft, which bore the initial burden of proof (see paragraph 688 above), did not sufficiently establish that if it were required to disclose the interoperability information that would have a significant negative impact on its incentives to innovate.

698 Microsoft merely put forward vague, general and theoretical arguments on that point. Thus, as the Commission observes at recital 709 to the contested decision, in its response of 17 October 2003 to the third statement of objections Microsoft merely stated that '[d]isclosure would ... eliminate future incentives to invest in the creation of more intellectual property', without specifying the technologies or products to which it thus referred.

699 In certain passages in the response referred to in the preceding paragraph, Microsoft envisages a negative impact on its incentives to innovate by reference to its operating systems in general, namely both those for client PCs and those for servers.

700 In that regard, it is sufficient to note that, at recitals 713 to 729 to the contested decision, the Commission quite correctly refuted Microsoft's arguments relating to the fear that its products would be cloned. It must be borne in mind, in particular, that the remedy prescribed in Article 5 of the contested decision does not, and is not designed to, allow Microsoft's competitors to copy its products (see paragraphs 240 to 242 and 656 to 658 above).

701 It follows that it has not been demonstrated that the disclosure of the information to which that remedy relates will significantly reduce – still less eliminate – Microsoft's incentives to innovate.

702 In that context, the Court observes that, as the Commission correctly finds at recitals 730 to 734 to the contested decision, it is normal practice for operators in the industry to disclose to third parties the information which will facilitate interoperability with their products and Microsoft itself had followed that practice until it was sufficiently established on the work group server operating systems market. Such disclosure allows the operators concerned to make their own products more attractive and therefore more valuable. In fact, none of the parties has claimed in the present case that such disclosure had had any negative impact on those operators' incentives to innovate. ...

710 The Commission came to a negative conclusion but not by balancing the negative impact which the imposition of a requirement to supply the information at issue might have on Microsoft's incentives to innovate against the positive impact of that obligation on innovation in the industry as a whole, but after refuting Microsoft's arguments relating to the fear that its products might be cloned (recitals 713 to 729 to the contested decision), establishing that the disclosure of interoperability was widespread in the industry concerned (recitals 730 to 735 to the contested decision) and showing that IBM's commitment to the Commission in 1984 was not substantially different from what Microsoft was ordered to do in the contested decision (recitals 736 to 742 to the contested decision) and that its approach was consistent with Directive 91/250 (recitals 743 to 763 to the contested decision).

711 It follows from all of the foregoing considerations that Microsoft has not demonstrated the existence of any objective justification for its refusal to disclose the interoperability at issue.

712 As the exceptional circumstances identified by the Court of Justice in *Magill* and *IMS Health*, were also present in this case, the first part of the plea must be rejected as wholly unfounded.

The CFI went on to consider at length questions of fact, such as whether Sun had requested the information.

From ¶¶777- 813 It considered whether the TRIPS agreement was relevant.

-The bundling of Windows Media Player with the Windows client PC operating system

Windows Media Player (WMP) is a computer program developed by Microsoft in order to allow a computer user to play audio or video media. In 1998/9, Microsoft incorporated WMP into the software for the Windows operating system that it licensed to the vendors of computer systems (original equipment manufacturers, or OEMs). As a result of the incorporation method, WMP could not be removed or hidden (¶963). Consequently neither the OEMs nor the user of a computer could suppress Microsoft's media player. The Commission thought that the suppliers of media content or other applications would want to format their products using media codecs (a codec is the algorithm by which media is converted into computer data) owned by, and compatible only with, WMP and other Microsoft products. This indirect network effect arising from the tie would foreclose competing suppliers of media players, see ¶¶ 857, 865, 1061.

The Commission found that Microsoft had abused its dominant position contrary to Article 82 by tying WMP to the Windows operating system. The tie was not contractual in nature, but rather by way of incorporation into the tying product.

The Commission's theory was that Microsoft feared that the indirect network effects might disappear if one of its rivals created a platform (middleware) that could be ported to different formats, and which displayed sufficient applications programs interfaces (APIs) for the creators of content or applications to create software for that platform. Then the applications could be ported to other formats with the platform. Microsoft had an incentive to ensure that no such middleware was developed. Since a media player was potential middleware, Microsoft had an incentive to prevent its competitors, actual or potential, from acquiring sufficient APIs. This explains ¶¶1038 – 1046 and 1151-1157, where the CFI deals with the question of ubiquity. Nevertheless, the CFI was more interested in shorter term effects in the following paragraphs up to ¶ 1058. It considers indirect effects only *obiter* from ¶¶1059 – 1070 and does not mention middleware, a factor that was very important in the US litigation at first instance.

— 1. Factual and technical findings...

817 First of all, the Commission defines media players as software products that are able to “play back” audio and video content, that is to say, to decode the corresponding data and translate them into instructions for the hardware, such as loudspeakers or a display (recital 60 to the contested decision). ...

The Commission described the products of Microsoft's competitors (particularly RealPlayer, produced by RealNetworks), ...

—1. First plea, alleging infringement of Art.82 EC

a) The necessary conditions for a finding of abusive tying...

842 Microsoft refers to recital 794 to the contested decision and asserts that the Commission based its finding that there was abusive tying in the present case on the following factors:

- — first, the tying and tied products are two separate products;

- — secondly, the undertaking concerned is dominant in the market for the tying product;
- — thirdly, the undertaking concerned does not give customers a choice to obtain the tying product without the tied product;
- and
- — fourthly, the practice in question forecloses competition.

Findings of the Court ...

854 ...[T]he Commission first observes that Microsoft has a dominant position on the client PC operating systems market (recital 799 to the contested decision). The Court notes that Microsoft does not dispute that fact.

855 Secondly, the Commission says that streaming media players and client PC operating systems are two separate products (recitals 800–825 to the contested decision).

856 Thirdly, the Commission states that Microsoft does not give customers the choice of obtaining Windows without Windows Media Player (recitals 826–834 to the contested decision).

857 Fourthly, the Commission claims that the tying of Windows Media Player forecloses competition in the media players market (recitals 835–954 to the contested decision). It observes, in particular, that in classical tying cases both it and the Community Courts “considered the foreclosure effect for competing vendors to be demonstrated by the bundling of a separate product with the dominant product” (recital 841 to the contested decision). The Commission states, however, that in the present case there are good reasons not to assume without further analysis that tying Windows Media Player constitutes conduct which by its very nature is liable to foreclose competition (ibid.). The Commission considers, in essence, that “tying [Windows Media Player] with the dominant Windows makes [Windows Media Player] the platform of choice for complementary content and applications which in turn [creates a risk of] foreclosing competition in the market for media players” (recital 842 to the contested decision). Furthermore, “[t]his has spillover effects on competition in related products such as media encoding and management software (often server-side), but also in client PC operating systems for which media players compatible with quality content are an important application”.

858 Lastly, the Commission examines the basis on which Microsoft relies in its attempt to demonstrate that the abusive conduct imputed to it is objectively justified (recitals 955–970 to the contested decision).

859 The Court considers that the Commission's analysis of the constituent elements of bundling is correct and that it is consistent both with Art.82 EC and with the case law. ...

860 It must be borne in mind that the list of abusive practices set out in the second paragraph of Art.82 EC is not exhaustive and that the practices mentioned there are merely examples of abuse of a dominant position (see, to that effect, C-333/94 P *Tetra Pak v Commission* [1996] ECR I-5951 (*'Tetra Pak II'*) at [37]). It is settled case law that the list of practices contained in that provision is not an exhaustive enumeration of the abuses of a dominant position prohibited by the EC Treaty (6/72 *Europemballage and Continental Can v Commission* [1973] E.C.R. 215 at [26] , and *Compagnie Maritime Belge transports and Others v Commission*, ... at [112]). ...

861 It follows that bundling by an undertaking in a dominant position may also infringe Art.82 EC where it does not correspond to the example given in Art.82(d) EC. Accordingly, in order to establish the existence of abusive bundling, the Commission was correct to rely in the contested decision on Art.82 EC in its entirety and not exclusively on Art.82(d) EC. ...

864 ... When the Commission states that it is necessary to examine whether the dominant undertaking “does not give customers a choice to obtain the tying product without the tied product”, it is merely expressing in different words the concept that bundling assumes that consumers are compelled, directly or indirectly, to accept “supplementary obligations”, such as those referred to in Art.82(d) EC.

865 In the present case, as the Court will explain in greater detail at [962] and [965] below, that coercion is mainly applied first of all to OEMs, who then pass it on to the end user. The end user is directly exposed to that coercion in the less frequent situation in which, rather than deal through an OEM, he acquires a Windows client PC operating system directly from a retailer.

866 In the second place, it cannot be claimed that the Commission introduced a new condition relating to the foreclosure of competitors from the market in

order to establish the existence of abusive bundling within the meaning of Art.82(d) EC.

867 In that regard, the Court observes that, while it is true that neither that provision nor, more generally, Art.82 EC as a whole contains any reference to the anti-competitive effect of bundling, the fact remains that, in principle, conduct will be regarded as abusive only if it is capable of restricting competition (see, to that effect, T-203/01 *Michelin v Commission* [2003] E.C.R. II-4071 (hereinafter, *Michelin II*) at [237]).

868 Furthermore, as will be made explicit at [1031]–[1058] below, the applicant cannot claim that the Commission relied on a new and highly speculative theory to reach the conclusion that a foreclosure effect exists in the present case. As indicated at recital 841 to the contested decision, the Commission considered that, in light of the specific circumstances of the present case, it could not merely assume, as it normally does in cases of abusive tying, that the tying of a specific product and a dominant product has by its nature a foreclosure effect. The Commission therefore examined more closely the actual effects which the bundling had already had on the streaming media player market and also the way in which that market was likely to evolve.

869 In light of the foregoing, the Court considers that the question of the bundling must be assessed by reference to the four conditions set out at recital 794 to the contested decision (see [842] above) and to the condition relating to the absence of objective justification.

870 The second condition set out at recital 794 to the contested decision must be considered to be met, because it is common ground that Microsoft has a dominant position on the market for what is alleged to be the tying product, namely client PC operating systems. ...

b) The existence of two separate products. ¶872

Findings of the Court

912 Microsoft contends, in substance, that media functionality is not a separate product from the Windows client PC operating system but forms an integral part of that system. As a result, what is at issue is a single product, namely the Windows client PC operating system, which is constantly evolving. In Microsoft's submission, customers expect that any client PC operating system will have the functionalities which they perceive as essential, including audio

and video functionalities, and that those functionalities will be constantly updated.

913 The Court notes, by way of preliminary observation, that the IT and communications industry is an industry in constant and rapid evolution, so that what initially appear to be separate products may subsequently be regarded as forming a single product, both from the technological aspect and from the aspect of the competition rules. ...

917 First of all, it must be observed that, as the Commission correctly states at recital 803 to the contested decision, the distinctness of products for the purpose of an analysis under Art.82 EC has to be assessed by reference to customer demand. Furthermore, Microsoft clearly shares that opinion. ...

918 The Commission was also correct to state, at the same recital, that in the absence of independent demand for the allegedly tied product, there can be no question of separate products and no abusive tying.

919 Microsoft's argument that the Commission thus applied the wrong test and that it ought in reality to have ascertained whether what was alleged to be the tying product was regularly offered without the tied product or whether customers "want[ed] Windows without media functionality" cannot be accepted.

920 In the first place, the Commission's argument finds support in the case law (see, to that effect, C-333/94 P *Tetra Pak II*, cited above at 860 at 36 ; T-30/89 *Hilti v Commission* [1991] E.C.R. II-1439 , upheld in C-53/92 P *Hilti v Commission* [1994] E.C.R. I-667 (both cases being referred to below as ' *Hilti* ') at 67 ; and T-83/91 *Tetra Pak II*, ...cited above at 860 at 82).

921 In the second place, as the Commission correctly observes in its pleadings, Microsoft's argument, based on the concept that there is no demand for a Windows client PC operating system without a streaming media player, amounts to contending that complementary products cannot constitute separate products for the purposes of Art.82 EC , which is contrary to the Community case law on bundling. To take *Hilti* , for example, it may be assumed that there was no demand for a nail gun magazine without nails, since a magazine without nails is useless. However, that did not prevent the Community Courts from concluding that those two products belonged to separate markets.

922 In the case of complementary products, such as client PC operating systems and application software, it is quite possible that customers will wish to obtain the products together, but from different sources. For example, the fact that most client PC users want their client PC operating system to come with word-processing software does not transform those separate products into a single product for the purposes of Art.82 EC.

923 Microsoft's argument ignores the particular intermediary role played by OEMs, who combine hardware and software from different sources in order to offer a ready-to-use PC to the end user. As the Commission very correctly observes at recital 809 to the contested decision, if OEMs and consumers were able to obtain Windows without Windows Media Player, that would not mean that they would choose to obtain Windows without a streaming media player. OEMs follow consumer demand for a pre-installed media player on the operating system and offer a software package including a streaming media player that works with Windows, the difference being that that player would not necessarily be Windows Media Player.

924 In the third place, and in any event, Microsoft's argument cannot succeed because, as the Commission observes at recital 807 to the contested decision, there exists a demand for client PC operating systems without streaming media players, for example by companies afraid that their staff might use them for non-work-related purposes. That fact is not disputed by Microsoft.

925 Next, the Court finds that a series of factors based on the nature and technical features of the products concerned, the facts observed on the market, the history of the development of the products concerned and also Microsoft's commercial practice demonstrate the existence of separate consumer demand for streaming media players. ...

The CFI noted that Windows (an operating system) was different from WMP (application software), and fulfilled different purposes. It also observed that Microsoft makes WMP for other PC operating systems, other vendors independently produced media players for use on Windows PCs, that it is possible to download media players from the internet separately from the OS for PCs, and that Microsoft promotes WMP separately.

932 Lastly, ... in spite of the bundling applied by Microsoft, a not insignificant number of customers continue to acquire media players from Microsoft's

competitors, separately from their client PC operating system, which shows that they regard the two products as separate.

933 The foregoing facts demonstrate to the requisite legal standard that the Commission was correct to conclude that client PC operating systems and streaming media players constituted two separate products for the purposes of Art.82 EC .

934 That conclusion is not undermined by Microsoft's other arguments.

935 In the first place, as regards Microsoft's argument that the integration of Windows Media Player in the Windows operating system from May 1999 constitutes a normal and necessary step in the evolution of that system and is in keeping with the constant improvement of its media functionality, it is sufficient to observe that the fact that tying takes the form of the technical integration of one product in another does not have the consequence that, for the purpose of assessing its impact on the market, that integration cannot be qualified as the bundling of two separate products.

936 As Microsoft itself acknowledged in answer to a question put to it by the Court at the hearing, its decision to supply WMP 6 as a functionality integrated in the Windows operating system from May 1999 was not the consequence of a technical constraint. At that time there was nothing to prevent Microsoft from distributing WMP 6 in the same way as it had distributed its previous player, NetShow, which since June 1998 had been included on the Windows 98 installation CD: and none of the four Windows 98 default installations provided for the installation of NetShow, which had to be installed by users if they wished to use it.

937 Furthermore, Microsoft's argument that the integration of Windows Media Player in the Windows operating system was dictated by technical reasons is scarcely credible in the light of the content of certain of its own internal communications. Thus, it follows from Mr Bay's email of January 3, 1999 to Mr Gates... that the integration of Windows Media Player in Windows was primarily designed to make Windows Media Player more competitive with RealPlayer by presenting it as a constituent part of Windows and not as application software that might be compared with RealPlayer.

938 In the second place, Microsoft cannot claim that the Commission fails to show that media functionality is not linked, by nature or according to commercial usage, to client PC operating systems.

939 First, it follows from the considerations set out... above that client PC operating systems and streaming media players do not, by their nature, constitute indissociable products. While it is true that there is a link between a client PC operating system such as Windows and application software such as Windows Media Player, in the sense that both products are on the same computer from the user's perspective and that a media player will only work when an operating system is present, that does not mean that the two products are not dissociable in economic and commercial terms for the purpose of competition rules.

940 Secondly, as the Commission rightly observes, it is difficult to speak of commercial usage in an industry that is 95 per cent controlled by Microsoft.

941 Thirdly, Microsoft cannot rely on the fact that vendors of competing client PC operating systems also bundle those systems with a streaming media player. On the one hand, Microsoft has not adduced any evidence that such bundling was already carried out by its competitors at the time when the abusive bundling commenced. On the other hand, moreover, it is clear that the commercial conduct of those competitors, far from invalidating the Commission's argument, corroborates it. As may be seen from recitals 822 and 823 to the contested decision and as the Commission observes in its pleadings, some vendors of non-Microsoft operating systems who supply their operating systems with a media player make the installation of the media player optional, or allow it to be uninstalled, or offer a selection of different media players.

942 Fourthly, and in any event, it is settled case law that even when the tying of two products is consistent with commercial usage or when there is a natural link between the two products in question, it may nonetheless constitute abuse within the meaning of Art.82 EC, unless it is objectively justified (C-333/94 P *Tetra Pak II*, cited above at [860] at [37]).

943 Finally, in the third place, the argument which Microsoft put forward at the hearing, that the unbundled version of Windows which it placed on the market pursuant to the remedy had met with no success, must also be rejected. As already stated ... above, the lawfulness of a Community measure must be assessed on the basis of the matters of fact and of law existing at the time when

the measure was adopted. Furthermore, any doubts as to the effectiveness of the remedy ordered by the Commission do not in themselves prove that its finding as to the existence of two separate products is wrong.

944 The Court concludes from all of the foregoing considerations that the Commission was correct to find that client PC operating systems and streaming media players constituted separate products.

b) Consumers are unable to choose to obtain the tying product without the tied product ¶945...

Findings of the Court

960 Microsoft contends, in essence, that the fact that it integrated Windows Media Player in the Windows client PC operating system does not entail any coercion or supplementary obligation within the meaning of Art.82(d) EC. In support of its argument, it emphasises, in the first place, that customers pay nothing extra for the media functionality of Windows; in the second place, that they are not obliged to use that functionality; and, in the third place, that they are not prevented from installing and using competitors' media players.

961 The Court observes that it cannot be disputed that, in consequence of the impugned conduct, consumers are unable to acquire the Windows client PC operating system without simultaneously acquiring Windows Media Player, which means (see [864] above) that the condition that the conclusion of contracts is made subject to acceptance of supplementary obligations must be considered to be satisfied. ...

In most cases the coercion applied to the OEMs was passed on to consumers (¶962).

963 The coercion thus applied to OEMs is not just contractual in nature, but also technical. In effect, it is common ground that it was not technically possible to uninstall Windows Media Player. ...

966 The Court considers that the arguments which Microsoft puts forward must be rejected.

The Court's rejection noted that (i) WMP was not provided free of charge; the cost was included in the total price; (ii) regardless of this, Art. 82(d) does not require the charge of a separate price in order for the agreement to be subject to

supplementary obligations; (iii) the case law on bundling does not require that consumers be forced to use the tied product.

975 It follows from all of the foregoing considerations that the Commission was correct to find that the condition relating to the imposition of supplementary obligations was satisfied in the present case.

b) The foreclosure of competition

—Contested decision ...

977 The Commission's analysis takes as its starting point recital 841 to the contested decision, which is worded as follows:

“There are ... circumstances relating to the tying of [Windows Media Player] which warrant a closer examination of the effects that tying has on competition in this case. While in classical tying cases, the Commission and the Courts considered the foreclosure effect for competing vendors to be demonstrated by the bundling of a separate product with the dominant product, in the case at issue, users can and do to a certain extent obtain third party media players through the internet, sometimes [free of charge]. There are therefore indeed good reasons not to assume without further analysis that tying [Windows Media Player] constitutes conduct which by its very nature is liable to foreclose competition.”...

Findings of the Court

1031 Microsoft claims, in substance, that the Commission has failed to prove that the integration of Windows Media Player in the Windows client PC operating system involved foreclosure of competition, so that the fourth constituent element of abusive tying, as set out at recital 794 to the contested decision, is not fulfilled in this case.

1032 In particular, Microsoft contends that the Commission, recognising that it was not dealing with a classical tying case, had to apply a new and highly speculative theory, relying on a prospective analysis of the possible reactions of third parties, in order to reach the conclusion that the tying at issue was likely to foreclose competition. ...

1034 In fact, it is clear that in the contested decision, the Commission clearly demonstrated, inter alia, that the fact that from May 1999 Microsoft offered

OEMs, for pre-installation on client PCs, only the version of Windows bundled with Windows Media Player had the inevitable consequence of affecting relations on the market between Microsoft, OEMs and suppliers of third-party media players by appreciably altering the balance of competition in favour of Microsoft and to the detriment of the other operators.

1035 As already observed at [868] above, the fact that the Commission examined the actual effects which the bundling had already had on the market and the way in which that market was likely to evolve, rather than merely considering—as it normally does in cases of abusive tying—that the tying has by its nature a foreclosure effect, does not mean that it adopted a new legal theory.

1036 The Commission's analysis of the foreclosure condition begins at recital 841 to the contested decision, where the Commission states that in the present case there are good reasons not to assume without further analysis that the bundling of Windows and Windows Media Player constitutes conduct which by its very nature is liable to foreclose competition (see [977] above). In substance, the conclusion which the Commission reached is based on the finding that the bundling of Windows Media Player with the Windows client PC operating system—the operating system pre-installed on the great majority of client PCs sold throughout the world—without the possibility of removing that media player from the operating system, allows Windows Media Player to benefit from the ubiquity of that operating system on client PCs, which cannot be counterbalanced by the other methods of distributing media players.

1037 The Court considers that that finding, which is the subject-matter of the first stage of the Commission's reasoning..., is entirely well founded.

1038 Thus, in the first place, it is clear that owing to the bundling, Windows Media Player enjoyed an unparalleled presence on client PCs throughout the world, because it thereby automatically achieved a level of market penetration corresponding to that of the Windows client PC operating system and did so without having to compete on the merits with competing products. ...

1039 As will be explained in greater detail below, no third-party media player could achieve such a level of market penetration without having the advantage in terms of distribution that Windows Media Player enjoys as a result of Microsoft's use of its Windows client PC operating system. ...

1041 In the second place, it is clear that, as the Commission correctly states at recital 845 to the contested decision, “[u]sers who find [Windows Media Player] pre-installed on their client PCs are indeed in general less likely to use alternative media players as they already have an application which delivers media streaming and playback functionality”. The Court therefore considers that, in the absence of the bundling, consumers wishing to have a streaming media player would be induced to choose one from among those available on the market. ...

1043 In the third place, the Court considers that the Commission was correct to state, at recital 857 to the contested decision, that the impugned conduct created disincentives for OEMs to ship third-party media players on their client PCs. ...

1045 On the other hand, the presence of several media players on the same client PC creates a risk of confusion on the part of users and an increase in customer support and testing costs (see recital 852 to the contested decision). The Court points out in that regard that during the administrative procedure Microsoft itself emphasised that OEMs generally operate on thin profit margins and that they would therefore prefer to avoid having to bear such costs (see fn.1006 to the contested decision).

1046 Thus, the release of the bundled version of Windows and Windows Media Player as the only version of the Windows operating system capable of being pre-installed by OEMs on new client PCs had the direct and immediate consequence of depriving OEMs of the possibility previously open to them of assembling the products which they deemed most attractive for consumers and, more particularly, of preventing them from choosing one of Windows Media Player's competitors as the only media player. On this last point, it must be borne in mind that at the time RealPlayer had a significant commercial advantage as market leader. As Microsoft itself acknowledges, it was only in 1999 that it succeeded in developing a streaming media player that performed well enough, given that its previous player, NetShow, “was unpopular with customers because it did not work very well” (recital 819 to the contested decision). It must also be borne in mind that between August 1995 and July 1998 it was RealNetworks' products—first RealAudio Player, then RealPlayer—that were distributed with Windows. There is therefore good reason to conclude that if Microsoft had not adopted the impugned conduct

competition between RealPlayer and Windows Media Player would have been decided on the basis of the intrinsic merits of the two products.

1047 Furthermore, even if developers of media players competing with Microsoft succeeded in reaching an agreement with OEMs for the pre-installation of their product, they would still be in a disadvantageous competitive position by comparison with Microsoft. First, as Windows Media Player cannot be removed by OEMs or by users from the package consisting of Windows and Windows Media Player, the third-party media player could never be the only media player on the client PC. In particular, the bundling prevents developers of third-party media players from competing with Microsoft for that purpose on the intrinsic merits of the products. Secondly, as the number of media players that OEMs are prepared to pre-install on client PCs is limited, developers of third-party media players compete with each other in order to have their products pre-installed, while, owing to the bundling, Microsoft evades that competition and the significant additional costs which it entails. ...

1048 It follows from those findings that the Commission was correct to conclude that “the option of entering into agreements with OEMs [was] a less efficient and effective means of obtaining media player distribution in the face of Microsoft's tying” (recital 849 to the contested decision).

1049 In the fourth place, the Court finds that the Commission was also correct to find that methods of distributing media players other than pre-installation by OEMs could not offset Windows Media Player's ubiquity (recitals 858 to 876 to the contested decision). ...

Specifically, the Court highlighted the shortcomings of offering downloads as a means of distribution – notably overcoming end-user's inertia and persuading them to ignore the pre-installed WMP. Many users experience technical difficulties when obtaining software by download.

1054 It follows from the foregoing that in the analysis set out at recitals 843–878 to the contested decision, which is the first stage of its reasoning, the Commission demonstrated to the requisite legal standard that the bundling of Windows and Windows Media Player from May 1999 inevitably had significant consequences for the structure of competition. That practice allowed Microsoft to obtain an unparalleled advantage with respect to the distribution of its product and to ensure the ubiquity of Windows Media Player on client PCs throughout the world, thus providing a disincentive for users to make use of

third-party media players and for OEMs to pre-install such players on client PCs. ...

1057 It follows from information communicated by Microsoft itself during the administrative procedure and referred to at recitals 948–951 to the contested decision that the significant growth in the use of Windows Media Player has not come about because that player is of better quality than competing players or because those media players, and particularly RealPlayer, have certain defects.

...

1058 In the light of all the foregoing considerations, the Court concludes that the Commission's findings in the first stage of its reasoning are in themselves sufficient to establish that the fourth constituent element of abusive bundling is present in this case. Those findings are not based on any new or speculative theory, but on the nature of the impugned conduct, on the conditions of the market and on the essential features of the relevant products. They are based on accurate, reliable and consistent evidence which Microsoft, by merely contending that it is pure conjecture, has not succeeded in showing to be incorrect.

1059 It follows from the foregoing that it is not necessary to examine the arguments which Microsoft puts forward against the findings made by the Commission in the other two stages of its reasoning. Nonetheless, the Court considers that it should examine them briefly.

1060 In the second stage of its reasoning, the Commission seeks to establish that the ubiquity of Windows Media Player as a result of its bundling with Windows is capable of having an appreciable impact on content providers and software designers.

1061 The Commission's theory is based on the fact that the market for streaming media players is characterised by significant indirect network effects or, to use the expression employed by Mr Gates, on the existence of a “positive feedback loop” (recital 882 to the contested decision). That expression describes the phenomenon where, the greater the number of users of a given software platform, the more there will be invested in developing products compatible with that platform, which, in turn reinforces the popularity of that platform with users.

1062 The Court considers that the Commission was correct to find that such a phenomenon existed in the present case and to find that it was on the basis of the percentages of installation and use of media players that content providers and software developers chose the technology for which they would develop their own products (recital 879 to the contested decision). The Commission correctly stated, first, that those operators tended primarily to use Windows Media Player as that allowed them to reach the very large majority of client PC users in the world and, secondly, that the transmission of content and applications compatible with a given media player was in itself a significant competitive factor, since it increased the popularity of that media player, and, in turn, favoured the use of the underlying media technology, including codecs, formats (including DRM) and server software (recitals 880 and 881 to the contested decision). ...

1064 ...[T]he Commission was quite correct to find that the provision of several different technologies gave rise to additional development, infrastructure and administrative costs for content providers, who were therefore inclined to use only one technology for their products if that allowed them to reach a wide audience. ...

1067 It is also apparent from the evidence gathered by the Commission that the more widely distributed a media player is, the more content providers are inclined to create content for the technology implemented in that media player. As the Commission rightly states at recital 885 to the contested decision, by supporting the widely disseminated media player, developers maximise the potential reach of their own products. ...

1069 In view of the foregoing, and of the fact that Windows is present on almost all client PCs in the world, it must be held that the Commission was correct to conclude, at recital 891 to the contested decision, that “[b]y tying [Windows Media Player], Microsoft [could] assure content providers that end-users [would] be able to play back their content, that is to say, that they [would] reach a wide audience”, that “[u]biquity of [Windows Media Player] on Windows PCs therefore [secured] Microsoft a competitive advantage unrelated to the merits of its product” and that, “[once] content based on a given format [was] widespread, the competitive standing of compatible media players [was] reinforced [and] entry for new contenders [was] difficult”.

1070 It must be borne in mind, in that context, that Art.82 EC is intended to prohibit a dominant undertaking from strengthening its position by recourse to means other than those based on competition on the merits (T-229/94 *Deutsche Bahn v Commission* [1997] E.C.R. II-1689 at 78 , and T-65/98 *Van den Bergh Foods v Commission* [2003] E.C.R. II-4653 at 157).

1071 In the second place, the Court considers that the Commission, at recitals 892–896 to the contested decision, correctly assessed the effects of the bundling on software developers.

1072 More particularly, the Commission was correct to observe, at recital 892 to the contested decision, that software developers were inclined to create applications for a single platform if that enabled them to reach virtually all potential users of their products, whereas porting, marketing and supporting other platforms gave rise to additional costs. ...

1076 In the third place, the Court recalls that, at recitals 897–899 to the contested decision, the Commission states that the ubiquity which Windows Media Player enjoys by virtue of the bundling also has effects on adjacent markets, such as media players on wireless information devices, set-top boxes, DRM solutions and on-line music delivery. On that point, it is sufficient to state that Microsoft has put forward no argument capable of vitiating that assessment.

1077 In light of the foregoing considerations, the Court concludes that the second stage of the Commission's reasoning is well founded. ...

The CFI went on to consider stage III of the Commission's argument relating to the development of the market, taking advantage of various market surveys.

1089 The Commission therefore had ground to state, at recital 984 to the contested decision, that there was a reasonable likelihood, ('risque significative' in the original French) that tying Windows and Windows Media Player would lead to a lessening of competition so that the maintenance of an effective competition structure would not be ensured in the foreseeable future. It must be made clear that the Commission did not state that the tying would lead to the elimination of all competition on the market for streaming media players. Microsoft's argument that, several years after the beginning of the abuse at issue, a number of third-party media players are still present on the market therefore does not invalidate the Commission's argument.

1090 It follows from all of the foregoing considerations that Microsoft has put forward no argument capable of vitiating the merits of the findings made by the Commission in the contested decision concerning the condition relating to the foreclosure of competition. The Court must therefore conclude that the Commission has demonstrated to the requisite legal standard that the condition was satisfied in the present case.

e) The absence of objective justification ¶1091...

Arguments of the parties ¶1102

1122 Secondly, Microsoft asserts that if the contested decision were to apply as precedent against future integration in its Windows operating system, it would quickly become impossible to design, develop and test that operating system. For each block of software code that had to be made removable, Microsoft would face an exponential increase in the amount of work required. Thus, for example, if the Commission decided to apply to a second block of software codes the same principles as those established in the contested decision, it would have to offer four different versions of Windows. Such “fragmentation” would have the effect that it would be impossible to know whether any given copy of the operating systems contained functionality on which software developers, manufacturers of peripherals or users wished to rely. ...

Findings of the Court

1144 It must be borne in mind, as a preliminary point, that although the burden of proof of the existence of the circumstances that constitute an infringement of Art.82 EC is borne by the Commission, it is for the dominant undertaking concerned, and not for the Commission, before the end of the administrative procedure, to raise any plea of objective justification and to support it with arguments and evidence. It then falls to the Commission, where it proposes to make a finding of an abuse of a dominant position, to show that the arguments and evidence relied on by the undertaking cannot prevail and, accordingly, that the justification put forward cannot be accepted. ...

1146 First, Microsoft takes issue with the Commission for having ignored the benefits flowing from its business model, which entails the ongoing integration of new functionality into Windows. In that context, it claims, more particularly,

that the integration of media functionality in Windows is indispensable in order for software developers and internet site creators to be able to continue to benefit from the significant advantages offered by the “stable and well-defined” Windows platform.

1147 Secondly, Microsoft claims that the removal of media functionality from the system consisting of Windows and Windows Media Player would create a series of problems to the detriment of consumers, software developers and internet site creators. It refers, in particular, to the fact that its Windows operating system relies on the method known as “componentisation”... and that the withdrawal of media functionality would result in the degrading and “fragmentation” of that system. ...

1149 The circumstance to which the Commission takes exception in the contested decision is not that Microsoft integrates Windows Media Player in Windows, but that it offers on the market only a version of Windows in which Windows Media Player is integrated, that is to say, that it does not allow OEMs or consumers to obtain Windows without Windows Media Player or, at least, to remove Windows Media Player from the system consisting of Windows and Windows Media Player. Thus, while Art.6(a) of the contested decision requires Microsoft to offer a “full-functioning version of the Windows Client PC Operating System which does not incorporate Windows Media Player”, it expressly states that “Microsoft ... retains the right to offer a bundle of the Windows Client PC Operating System and Windows Media Player” (see, to the same effect, recitals 1011 and 1023 to the contested decision). ...

1151 Next, the Court considers that Microsoft is not entitled to rely on the fact that the bundling ensures the uniform presence of media functionality in Windows, which enables software developers and internet site creators to avoid the need to include in their products mechanisms which make it possible to ascertain what media player is present on a particular client PC and where necessary to install the necessary functionality.... The fact that that tying enables software developers and internet site creators to be sure that Windows Media Player is present on virtually all client PCs in the world is precisely one of the main reasons why the Commission correctly took the view that the bundling led to the foreclosure of competing media players from the market. Although the uniform presence to which Microsoft refers may have advantages for those operators, that cannot suffice to offset the anti-competitive effects of the tying at issue.

1152 As the Commission correctly observes,... by such an argument Microsoft is in fact claiming that the integration of Windows Media Player in Windows and the marketing of Windows in that form alone lead to the de facto standardisation of the Windows Media Player platform, which has beneficial effects on the market. Although, generally, standardisation may effectively present certain advantages, it cannot be allowed to be imposed unilaterally by an undertaking in a dominant position by means of tying.

1153 The Court further notes that it cannot be ruled out that third parties will not want the de facto standardisation advocated by Microsoft but will prefer it if different platforms continue to compete, on the ground that that will stimulate innovation between the various platforms.

1154 Furthermore, as the Commission and SIIA rightly submit, the other benefits on which Microsoft relies could just as easily be obtained in the absence of the impugned conduct.

1155 Thus, consumer demand for an “out-of-the-box” client PC incorporating a streaming media player can be fully satisfied by OEMs, who are in the business of assembling such PCs and combining, inter alia, a client PC operating system with the applications desired by consumers (recitals 68 and 119 to the contested decision). Nor does the contested decision prevent Microsoft from continuing to offer the bundled version of Windows and Windows Media Player to consumers who prefer that solution.

1156 Similarly, Microsoft cannot rely on the fact that OEMs ‘depend on the addition of functionality to Windows to create PCs that will appeal to customers and that will support the creation of interesting new applications’. OEMs are capable of offering client PCs with such features by pre-installing on them applications obtained from software developers. In the same way, the functionalities offered by Windows Media Player may be supplied by Microsoft on an independent basis, that is to say, without that media player being tied to the Windows operating system.

1157 Nor can Microsoft claim that the integration of media functionality in Windows is essential in order to enable software developers and internet site creators to use the Windows platform effectively and that it enables those operators to avoid having to develop the requisite software code themselves. ...

1159 Lastly, the Court notes that, as the Commission observes both in the contested decision and in its pleadings, Microsoft does not show that the integration of Windows Media Player in Windows creates technical efficiencies or, in other words, that it “lead[s] to superior technical product performance” (recital 962 to the contested decision). ...

1162 The second series of arguments on which Microsoft relies must also be rejected.

1163 First of all, as regards Microsoft's claim that applications “that are already in broad use” will no longer work correctly when they are implemented on the version of Windows without Windows Media Player, it is sufficient to state that this has not been demonstrated to the requisite legal standard.

1164 Next, the Court finds that Microsoft's assertion that the removal of media functionality from the system consisting of Windows and Windows Media Player will affect the functioning of parts of the Windows operating system itself is unfounded. ...

1166 Lastly, the Court also rejects Microsoft's argument based on the risk of “fragmentation” of its Windows operating system... As the Commission states in the defence, that argument is hypothetical and speculative. ...

1167 It follows from all of the foregoing considerations that Microsoft has not demonstrated the existence of any objective justification for the abusive bundling of Windows Media Player with the Windows client PC operating system.

From ¶¶ 1168 – 1193, the CFI held that Article 13 of TRIPS did not affect the position.

From ¶¶ 1193 – 1229, it decided that the scope of the remedy did not infringe the principle of proportionality.

From ¶¶ 1230 - 279, the CFI considered that the appointment of a monitoring trustee to be paid by Microsoft to ensure compliance with the Commission’s order amounted to improper delegation of the Commission’s powers. It therefore annulled article 7 of the operative part of the decision.

1280 For the two types of abuse identified in the contested decision, a single fine of €497,196,304 is imposed (Art.3 of the contested decision).

Findings of the Court

1326 The present submissions call upon the Court to examine the legality of Art.3 of the contested decision and, if appropriate, to exercise its unlimited jurisdiction and annul or reduce the fine imposed on Microsoft by that article.

1327 The Commission imposed a single fine on Microsoft for the two abuses found in Art.2 of the contested decision. It is apparent from recitals 1061–1068 to that decision that the Commission, while recognising the existence of two separate abuses, nonetheless considered that Microsoft committed a single infringement, namely the application of a strategy consisting in leveraging its dominant position on the client PC operating systems market (see, in particular, recital 1063 to the contested decision).

1328 It follows from recitals 1054–1080 to the contested decision that, even though the decision does not expressly say so, the Commission calculated the amount of the fines according to the method set out in the Guidelines. ...

After referring to the precedent in *Magill*, [CB p.198], the CFI held that:

1338 It follows that the Commission was correct to conclude that Microsoft ought to have been aware that its refusal might infringe the competition rules.

1339 The same applies as regards, secondly, the abuse found in Art.2(b) of the contested decision, as the arguments alleging the application of a new theory have already been rejected during the examination of the bundling issue (see, in particular, 859 and 863–868 above). The Court therefore finds that the Commission was correct to state, at recital 1057 to the contested decision, that its examination of the tying at issue and its conclusion that Microsoft's conduct was abusive were based on a practice that was well established, notably in *Hilti* and *Tetra Pak II*. ...

1341 Nor can the assertion that the contested decision is the first decision in which the Commission has characterised as abusive the improvement of a product consisting in the integration of an “improved” functionality in that product be upheld. As stated at 936, 937 and 1221 above, the integration of that product was not dictated by technical grounds. Furthermore, for the reasons stated at 935 above, that assertion does not invalidate the Commission's finding that there were two separate products, which constitutes one of the criteria on which it is possible to identify abusive tying, according to the case law cited at 859 above. ...

1343 In the second place, Microsoft's argument that the amount of the fine is excessive must also be rejected. The Court finds that the Commission made a correct assessment of the gravity and duration of the infringement. ...

1344 First, as regards the gravity of the infringement, it must be borne in mind at the outset that the two abuses at issue form part of a leveraging infringement, consisting in Microsoft's use of its dominant position on the client PC operating systems market to extend that dominant position to two adjacent markets, namely the market for work-group server operating systems and the market for streaming media players.

1345 First of all, as regards the abuse found in Art.2(a) of the contested decision, the Commission evaluated the gravity of that abuse by taking into consideration its nature (recitals 1064 and 1065 to the contested decision), its actual impact on the market (recitals 1069 and 1070 to the contested decision) and the size of the relevant geographic market (recital 1073 to the contested decision). The Commission characterised the infringement of which that abuse formed part as “very serious” and therefore likely to incur a fine of over €20 million.

1346 The Court finds that the matters taken into consideration by the Commission in the recitals mentioned in the preceding paragraph justify the description of the infringement as “very serious”. That assessment is not called in question by Microsoft's arguments.

The CFI referred at ¶¶1347-13529 to internal Microsoft documents confirming that Microsoft intended to leverage its dominant position on OS for Client PCs to strengthen its position in other markets.

It confirmed that €165 million was an appropriate starting point for a serious infringement and went on to say:

1363 Furthermore, the Court finds that the Commission was correct to apply a weighting of two to that amount to ensure that the fine was sufficiently deterrent and to reflect Microsoft's significant economic capacity. ...

1365 Thirdly, the Court finds that the Commission was correct to take the view that no aggravating or attenuating circumstances were to be taken into account in the present case.

1366 It follows from all of the foregoing considerations that Microsoft's argument that the fine is excessive and disproportionate must be rejected.

The CFI annulled the provisions in the order relating to the monitoring trustee and confirmed the rest.

Operative part of the Commission's decision

Articles 2, 3, 4

Microsoft Corporation was held to have infringed Article 82 by refusal to supply interoperability information, and the tying of Windows Media Player to Windows Operating System. A fine of €97, 196, 304 was imposed, and Microsoft was ordered to cease the behaviour in accordance with Articles 5 & 6 of the decision.

Article 5

As regards the abuse referred to in Article 2 (a): refusal to supply interoperability information, defined in Article 1 as 'the complete and accurate specifications for all the protocols implemented in the Windows Group Server Operating Systems . . .'

(a) Microsoft Corporation shall, within 120 days of the date of notification of this Decision, make the *Interoperability Information* available to any undertaking having an interest in developing and distributing work group server operating system products and shall, on reasonable and non-discriminatory terms, allow the use of the *Interoperability Information* by such undertakings for the purpose of developing and distributing work group server operating system products;

(b) Microsoft Corporation shall ensure that the *Interoperability Information* made available is kept updated on an ongoing basis and in a *Timely Manner*;

(c) Microsoft Corporation shall, within 120 days of the date of notification of this Decision, set up an evaluation mechanism that will give interested undertakings a workable possibility of informing themselves about the scope and terms of use of the *Interoperability Information*; as regards this evaluation mechanism, Microsoft Corporation may impose reasonable and non-discriminatory conditions to ensure that access to the *Interoperability Information* is granted for evaluation purposes only;

(d) Microsoft Corporation shall, within 60 days of the date of notification of this Decision,

communicate to the Commission all the measures that it intends to take under points (a), (b) and (c); that communication shall be sufficiently detailed to enable the Commission to make a preliminary assessment as to whether the said measures will ensure effective compliance with the Decision; in particular, Microsoft Corporation shall outline in detail the terms under which it will allow the use of the *Interoperability Information*;

(e) Microsoft Corporation shall, within 120 days of the date of notification of this Decision, communicate to the Commission all the measures that it has taken under points (a), (b) and (c).

Article 6

As regards the abuse referred to in Article 2 (b):

(a) Microsoft Corporation shall, within 90 days of the date of notification of this Decision, offer a full-functioning version of the *Windows Client PC Operating System* which does not incorporate *Windows Media Player*; Microsoft Corporation retains the right to offer a bundle of the *Windows Client PC Operating System* and *Windows Media Player*;

(b) Microsoft Corporation shall within 90 days of the date of notification of this Decision communicate to the Commission all the measures it has taken to implement point (a).

Article 7

Within 30 days of the date of notification of this Decision, Microsoft Corporation shall submit a proposal to the Commission for the establishment of a suitable mechanism assisting the Commission in monitoring Microsoft Corporation's compliance with this Decision. That mechanism shall include a monitoring trustee who shall be independent from Microsoft Corporation. In case the Commission considers Microsoft Corporation's proposed monitoring mechanism not suitable it retains the right to impose such a mechanism by way of a decision.

Notes and questions on Microsoft (Mainly in CFI)

1. (Point 25). WGS defined also at ¶196

2. (Commission's decision points 438-459). Are you concerned about network effects? In many network markets suppliers compete vigorously for the next generation of technology and customers want a single seller. What is the disadvantage?
3. (Commission's decision point 458). The CFI did not spell out network effects; Microsoft conceded that it was dominant over client OSs for PCs
4. (CFI at Point 152, not reproduced here). Are the cases on refusal to licence part of the same doctrine as refusal to supply services? In which earlier cases was access already being given to more than one undertaking? Did that case relate to IPRs?
5. (Point 195). Note the extent of the Commission's remedy (Articles 5 & 6 of the operative part of the decision, appended to the Court's judgment). See also ¶207
6. (Points 207, 229, 243 & 374). Are the extent of the viability of Microsoft's competitors and the specification of the information required to achieve this sufficiently precise for an order, breach of which resulted in a heavy fine? Does point 207 consist?
7. (Point 229). The Court mentions the notion of special responsibility of Domco in many Article 82 cases. The Discussion Paper of the Commission on Article 82 does not mention any special responsibility, but the. **Communication from the Commission - Guidance on the Commission's Enforcement Priorities in Applying Article 82 EC Treaty to Abusive Exclusionary Conduct by Dominant Undertakings, OJ 2009, C-45/7. Does in prominent places, at points 1 and 9.**
Should the Commission ignore consistent jurisprudence of the Court? Does the Discussion Paper merely indicate the Commission's enforcement priorities? What are the consequences of Domco's special responsibility? Is it required to hold an umbrella over its competitors if they are less efficient than it is?
<http://ec.europa.eu/comm/competition/antitrust/art82/discpaper2005.pdf>
8. (Point 232). Do you think that access to all functionality of both Windows and its competitors is necessary?
9. (Point 241). In some jurisdictions, computer programs are protected by patents as well as copyright. Sometimes the ideas contained in software are of greater value than the construction of the implementing source code. In dismissing Microsoft's 'functional clone' argument, was the CFI correctly ascertaining where the value in Microsoft's products lies?
10. (Points 284 & 288). Does the Commission recognise here that refusal to supply and refusal to license are separate areas of analysis under Article 82?
11. (Points 285 & 313). The Commission used to believe that more contractual protection was needed in a knowhow licence than one of patents, because knowhow was more vulnerable. This was made particularly clear in recital 7 to Regulation 556/89 (on knowhow licensing agreements) 1990 ECLR 135. Do you think that it should have changed its mind?
12. (Points 283 – 331). Judge Vesterdorf, President of the CFI at the time of the judgment and a member of the Grand Chamber that gave judgment, said in GAR (<http://www.icc.qmul.ac.uk/GAR/Vesterdorf.pdf>), head 2, that

'competition law is not meant to be used to abolish the very subject matter of the right(s) created . . . it should only be used to the extent necessary to avoid an abuse of the right(s) by the holder. The difficult question is, however, when is the use or exercise of IPRs abusive? This is a very delicate question, which during the last 20 years has probably not become easier to answer, let alone answer in a clear manner; indeed some might even argue that this question is simply unanswerable. . . .

At least until the judgment in *Microsoft*, it seems to be the general understanding that relatively strict conditions had to be present in order to find an abuse in case of a refusal by the holder of an IPR to grant a license of that right to another person’

He went on to explain *Volvo*, *Magill* and *IMS*.’

Do you think that the judgment in *Microsoft* made it easier for competitors to obtain a compulsory licence?

13. (Points 317, 387 & 392). Does this judgment apply only to very dominant firms, exhibiting such ‘extraordinary power’?
14. (Points 332 & 563). Did the earlier cases refer to ‘effective competition’? Can Sun’s workgroup server operating system, which had been on the market for several years be described as ‘new’? Was the CFI referring to the possibility of improvements that Sun might make? Older cases stressed that the circumstances were exceptional. Did *Microsoft* go further?
15. (Point 335). An example of a potential market is the refusal of Domco to supply an essential ingredient or component to a would-be competitor which would like to enter the market for the completed product. Where no competitor has tried to enter that market, possible competition from a new entrant might be hypothetical.
16. (Point 369). Is the extent of viability required or the amount of information needed knowable? Note that these are separate questions.
17. (Points 381, 391 & 436). On whom is the burden of proof? See ¶¶688 and 1144.
18. (Point 387). Does this limit the precedent to super dominant firms?
19. (Points 387 & 392). Why is it important that Windows domain architecture was a de facto industry standard? Is refusal to license an industry standard always abusive, or is the fact that the copyright covers a national standard one of the relevant circumstances? Compare the Commission decision in *IMS* (COMP D3/38.044, OJ 2002 L059), ¶¶88-92, 185.
20. (Point 480). Note the narrow definition of WGSs: MS had a lower market share of more sophisticated servers.
21. (Points 561 & 563). At various parts of the judgment of the CFI, the words ‘capable of,’ ‘significant risk of’, and ‘likely to’ are confused and the English translation does not match the French text that must have been approved in the judges’ deliberations. Do these phrases seem similar to you, and do they suggest differing standards? The French text of ¶561 reads: Le Tribunal considère que le grief formulé par Microsoft est d’ordre purement terminologique et est dénué de toute pertinence. Les expressions « *risque d’élimination de la concurrence* » et « *de nature à éliminer toute concurrence* » sont, en effet, indistinctement utilisées par le juge communautaire en vue de refléter la même idée, à savoir celle selon laquelle l’article 82 CE ne s’applique pas uniquement à partir du moment où il n’existe plus, ou presque plus, de concurrence sur le marché. Si la Commission devait être obligée d’attendre que les concurrents soient éliminés du marché, ou qu’une telle élimination soit suffisamment imminente, avant de pouvoir intervenir en vertu de cette disposition, cela irait manifestement à l’encontre de l’objectif de celle-ci qui est de préserver une concurrence non faussée dans le marché commun et, notamment, de protéger la concurrence encore existante sur le marché en cause.
Is ‘likely to eliminate’ in the English text the same as ‘capable of eliminating’ in the French text? Para 563 in French, reads:- Il convient d’ajouter qu’il n’est pas

nécessaire de démontrer l'élimination de toute présence concurrentielle sur le marché. Ce qui importe, en effet, aux fins de l'établissement d'une violation de l'article 82 CE, c'est que le refus en cause *risque de, ou soit de nature à*, éliminer toute concurrence effective sur le marché. Il y a lieu de préciser, à cet égard, que le fait que les concurrents de l'entreprise en position dominante restent présents de manière marginale sur certaines « niches » du marché ne saurait suffire pour conclure à l'existence d'une telle concurrence. Compare this with the English text. In later paras, however, the French and English texts both seem to use the term '*risk of elimination.*'

22. (Point 563). Does the reference to 'effective competition' makes it easier to obtain a compulsory license than the earlier cases which referred to 'all competition' in cases involving IPRs. See B. Vesterdorf in GAR, cited question 12 above. Is this the same language as the court has used previously? See *Commercial Solvents* [CB. p. 189]
23. (Point 567). Is this really a result of Microsoft's anticompetitive behaviour, or may they just have a better product? How would the Commission determine this? Is it determined formally by considering who bears the burden of proof?
24. (Points 593-613 & 619). Is this an extension of the earlier case law which referred to essential facilities? Cost might be an element in deciding whether the facility could be duplicated.
25. (Point 619). Ability to find skilled technicians is another network effect. See the part of the Commission's decision quoted after ¶29 above.
26. (Point 664). Is this an example of Ordo Liberal ideas?
- 27. (Point 647). What impact does this have on the tests to be applied when examining refusal to licence? List the IMS criteria as modified by this judgment.**
28. (Point 648). On whom does the burden of proof fall to establish this? ¶688 & 1144
29. (Point 655 - 659). Compare discouragement of innovation by competitors with the earlier case law.
30. (Point 658). Could they not compete on price, free riding on the investment that Microsoft has made in developing the specifications?
31. (Point 659). Is an incentive to innovate the same as the more concrete concept of a new good or service?
32. (Point 661). Should the Commission and Court try to decide which system is best for consumers?
33. (Point 664). Is this a return to Ordo-Liberal ideas?
34. (Point 688). See also ¶1144. The Commission has long stated that objective justification is a defence, and that the burden is on the person alleging it. Does the CFI leave only the evidentiary burden of proof on the person alleging a justification? On whom does the burden fall when deciding whether the harm to competition exceeds the benefit of the efficiency to consumers? Which view do you think is better policy wise? What approaches do the Discussion Paper on Article 82 suggest? Is the question resolved by the Commission's Guidance on enforcement priorities?
35. (Point 691). Would it be better to consider any relevant circumstances when considering whether they are exceptional, rather than the *IMS/Magill* type tests?
36. (Point 691). See the Commission's decision quoted immediately below ¶29; did the Commission stress Microsoft's very dominant position? Did the CFI?
37. (Point 693). Last sentence; since knowhow is not protected in the way that patents are, it is far more vulnerable than patented technology in the absence of contractual protection. This is what motivated the less restrictive attitude to knowhow than to patents in the earlier group exemptions. Is the CFI's view that knowhow should have no greater protection fair? Does it benefit consumers?

38. (Point 694). If the interoperability information is important for entry to a small and insignificant market, should there be a duty to supply it?
39. (Point 695) The inventive step that must be established to obtain a patent varies from one MS to another. The test may not be very strict. The originality required for copyright protection is even less. Should the doctrine of essential facilities be based on the lowest minimum level of inventiveness? Give reasons.
40. (Point 698). What could Microsoft have urged other than vague, general and theoretical arguments?
41. (Point 698). If we accept the idea that the specific basis for the award of IPRs is to create an incentive to innovate through the protection of intellectual property, does the removal of the protection not lead to a conclusion that the incentive to innovate will be reduced? If not, then do we need to come up with a different justification for the award of IPRs in the first place?
42. (Point 712). Were the exceptional circumstances in this case sufficiently analogous to those in *IMS* and *Magill* for this to be a fair summation?
43. (Points 842, 869). Did the CFI accept the four conditions suggested by Microsoft as necessary before abusive tying or bundling could be found.
44. (Points 856, 912-913, 935, 1036 & 1144 - 1162). Do you think that incorporation should be treated in the same way as a tie?
45. (Points 857 & 977- 1058). How can the Commission demonstrate foreclosure? If rivals have lost market share, it may be because they are less efficient. Should the Commission look to whether it would pay the monopolist to foreclose? If consumers do not want the tied product, they may buy less of the tying product so Domco has to balance increased sales of the tied product against reduced sales of the tying product. If profit from a unit of the tied product is far less than from a unit of the tying product, foreclosure is unlikely. The CFI considers foreclosure of competing media players at ¶¶1035 – 1090. At the end of paragraph 857, note the reference to indirect network effects. Consider the Commission's theory of harm.
46. (Points 859 & 920-921). Which other cases have dealt with the issue of tying and bundling?
47. (Point 867). Note that the CFI accepts that tying and bundling are abusive only when there is consumer harm. Is it necessary to rely on Article 82(b) to ensure that consumer harm will result from the practices?
48. (Point 868). Note that the CFI approves of the Commission treating incorporation of improvements and additions with less hostility than traditional tying. Compare points ¶¶1035-1036, ¶1122 and ¶¶1146-1149.
Do you think that the Commission should usually treat tying by Domco as being illegal per se?
49. (Point 869). Is this consistent with the idea of applying Article 82 as a whole? Do you think that the four criteria suggested are necessary, or even the best possible test?
50. (Point 913). For the nature of the IT industry as a market, see Some Economic Aspects of Antitrust Analysis in Dynamically Competitive Industries (Evans & Schmalensee) National Bureau of Economic Research, Working Paper No. W8268, http://papers.ssrn.com/sol3/papers.cfm?abstract_id=268877.
51. (Point 920). Hilti conceded that it had abused its dominant position if the relevant market was as found by the Commission. Do the EC courts accept the distinction between *ratio decidendi* which is binding and *obiter dicta*, which are not?
52. (Point 923). The overwhelming majority of consumers purchase computers assembled by OEMs.

53. (Points 933, 1054, 1090 & 1163). The CFI, which is the final jurisdiction on matters of fact, frequently uses the phrase ‘requisite legal standard’, but seldom says what it is. The ECJ in *Impala* (¶¶144 – 147, [2008] 5 C.M.L.R. 17) confirmed *Tetra-Laval*, which required that the Community judicature establish ‘whether the evidence relied on is factually accurate, reliable and consistent but also whether that evidence contains all the information which must be taken into account in order to assess a complex situation and whether it is capable of substantiating the conclusions drawn from it’.
54. (Point 935). Is the requirement for two separate products formalistic and difficult to understand in the context of integrated products like software? Does the finding of two separate products and an analysis based on tying address the question: is that type of behaviour causing consumer detriment?
55. (Points 936 & 963). These points discussed ‘technical integration’. Discussion of this factor in greater detail would have been interesting. An operating system is an assemblage of various different components. How far can we go in calling different parts of the operating system separate components? Do you think the Court gave sufficient emphasis to this argument?
56. (Point 937). Integration of improvements takes place all the time. Many features of products that are now standard were first marketed as extras. Remember, however, that the Commission was concerned by the ubiquity of Windows operating systems for which applications software could be marketed. Integration might have prolonged the dominance of MS to the detriment of consumers.
Mr Bay had proposed to “reposition [the] streaming media battle from NetShow vs. Real to Windows vs. Real”. Does this show that Microsoft viewed WMP as an integral part of Windows, rather than a separate application? Even if it does, to what extent should evidence of the intent of the company be relevant to a finding of separate products, when (as observed at ¶917 above) distinctness should be found by reference to consumer demand?
57. (Points 963, & 983-987). Was coercion important when considering ubiquity and the indirect network effects?
58. (Point 1031). See question 44.
59. (Point 1034). Does this imply a consumer welfare orientated approach, or more ordoliberal based thinking?
60. (Point 1036) is this the best argument against the tie?
61. (Point 1048). Does this mean that the Commission and the CFI are trying to find an efficiency based offence? Microsoft, by having a more efficient distribution method appears to have committed an offence. Or was the Commission concerned about preventing middleware from being developed (see ¶¶ 979-987, 1070)
62. (Point 1057). The Commission in many of its cases recognises many other factors under which products compete. “Quality” is a subjective criterion. List some other ways in which products compete.
63. (Points 1051 – 1090). Is this important as a precedent, or merely *obiter*?
64. (Point 1070). Note the use of the term ‘competition on the merits,’ ‘concurrance par les mérites.’ Does it help us to understand the ECJ’s phrase ‘through recourse to methods different from those which condition *normal competition in products or services on the basis of the transactions of commercial operators*, has the effect of hindering the maintenance of the degree of competition still existing in the market or the growth of that competition.’ in *Hoffmann La Roche*, CB 141, ¶ 91?
65. (Point 1089) This was a case on intellectual property. Was the earlier case law based on the elimination of all competition or only from some?

66. (Point 1144). The Commission is still urging that the full burden of proof is on the person trying to justify conduct otherwise abusive. Is its view correct?
67. (Points 1147 - 49) Think of the cost of developing the OS for PCs without WMP (Window XP). Virtually no-one bought it. It makes sense only on the Commission's theory about delaying the development of middleware.
68. (Point 1153). This speculative argument runs contrary to evidence seen earlier in the judgment (see ¶1064). The tie might have prolonged Microsoft's dominance if the Commission's theory about middleware is correct.
69. (Point 1155). On the basis that as has been noted earlier (see ¶1045) OEMs will prefer to keep their costs as low as possible, is there any hope that the OEMs will choose the path of greater resistance and create a PC from a WMP-less Windows and a separate player of their choice?
70. (Point 1166). Is it really hypothetical and speculative? Is this decision the first step in the process of legally requiring Microsoft to break up a complete product into a large number of separate components?
71. (1280, Article 3). This was a very large fine – the largest at that time imposed in any case on a single firm, even on the ringleader of a cartel. Was it clear in 1998 that Microsoft's practices would amount to infringement of Article 82? Usually when the Commission extends its competence, it imposes a lower fine initially.
72. (Point 1326). The CFI has unlimited jurisdiction over fines: it can increase or decrease them without referring the matter back to the Commission.
73. (Point 1338). In what ways did the judgment in *Microsoft* go further than that in *Magill*?
74. (Point 1341) Had the Commission or Community courts ever condemned incorporation of new products at the time Microsoft first incorporated the WMP? It is one thing for a court to extend the existing law when the law was uncertain; it is different to approve a huge fine when an undertaking misapplied law that was uncertain.
75. (Point 1363). Do the Guidelines on fines refer to doubling the basic amount?
76. (Article 5 (a)). The Commission's definition of Interoperability Information is recalled in ¶195 of the CFI's judgment. Does this definition, when combined with ¶207 *et seq* provide Microsoft with sufficient clarity as to what the Commission's order required? The Commission's website recites several rejected attempts by Microsoft to discover what the standard was and imposed massive daily penalties for inadequate compliance.
<http://ec.europa.eu/comm/competition/antitrust/cases/microsoft/implementation.html>
77. (Article 5 (b)). Timely Manner is defined in Article 1(3) of the operative part of the decision: 'as soon as Microsoft Corporation has developed a working and sufficiently stable implementation of these specifications'. Given the time and cost associated with preparing details of specifications for communication to 3rd parties, is this a reasonable timeframe?
78. (Article 5 (c)). What exactly does this provision mean? Does it respond to Microsoft's fear that the interoperability information could be used to create 'functional clones' of Windows products? See ¶234-241.
79. (Article 6 (a)). The cost of producing such an operating system was very high, and ultimately very few people purchased it. Why do you think this was? Given the importance of network effects in this market, does the low adoption rate further damage the success of the remedy? Was the remedy intended to foster the development of 3rd party middleware? Consider ¶943.

80. (Article 7). The parties to a merger often arrange for a monitoring trustee to ensure that some asset is sold to an undertaking which could exploit it well. Are these provisions also improper? Give reasons.