

Bill Neukom

From: Paul Maritz
To: David Thacher; Dwayne Walker
Subject: FW: Netware competition
Date: Wednesday, December 23, 1992 9:55AM

From: Jim Allchin
To: Bill Gates; Dwayne Walker; Paul Maritz
Cc: Brad Silverberg; Jonathan Lazarus
Subject: RE: Netware competition
Date: Thursday, December 17, 1992 9:00AM

From: Bill Gates
To: Dwayne Walker; Paul Maritz
Cc: Brad Silverberg; Jim Allchin; Jonathan Lazarus
Subject: Netware competition
Date: Wednesday, December 16, 1992 20:24

I read this document from Novell labeled "Selling Guide Against MS" with interest.

It makes a lot of very interesting attacks on our strategy - some wrong like that we are not enhancing DOS or that their network R&D is the largest in the industry (maybe we should make it clear that this is wrong). They say that the LAN man version of NT will be 4 to 6 months after NT. The quote every negative article written about us.

One part I learned from is this C2 certification issue. They claim they are the only product going for C2 networking certification and that that is a big deal. My understanding was that C2 network is easier to get and that products like UNIX already have it. I want to understand this because it could be a huge marketing problem for us if what they say in their document is correct and we are not getting the same certification that they are. How can they be better than us when they have no preemption and most things run at ring 0.

With respect to security and C2, this document claims:

- that we have either not started the process or are not very far into the process
- this claim is based on the notion that we have not been issued a MOU (memorandum of understanding). In fact, we have a MOU dated June 1991. Novell's evaluation team was just formed. Our evaluation team was formed in July, and has recently doubled in size.
- Novell believes that we are just going for a operating system C2 rating. In fact, we are going for peer-peer, and domain configurations as well. However, our network is homogenous (everything is the same) and will only be scrutinized by the orange book. Whereas Novell is going for a non-homogenous configuration and will have to go through the red book. I don't think Novell is aware that our network configuration can be evaluated via the orange book.... we didn't even know that until recently.

I hadnt realized that Netware 4 supports memory protection including total binary compatibility so that something can be at ring 3 or ring 0. Do they all NLMs to be paged? Did they break the old NLMs?

This document says NLMs like those from Oracle will be dramatically faster than NT based software. Do we have any data on this?

Yes, I expect they will be faster. They have less code -- overhead -- to make an OS call. However, NLMs are very difficult to write. There is no good reason for this, however. They are just hard to test, etc.

Also they say we wont scale well with multiprocessor and I wish we had more data on that.

They are incorrect. I think SQLServer has already shown this. They said the same thing about VINES SMP when it was released. In benchmarks we proved them wrong. They make the claim because they don't have a comparable feature.

What does Oracle think of our mutliprocessor support?

dwayne?

I didnt know that Netware 4 will have disk compression. They brag it is is totally excellent because it doesnt work at the block level - interesting to see how they get fast performance on random writes if they dont work at the block level. This does raise a very interesting issue about NT disk compression. Interestingly it we put disk compression into FAT only then everyone should use FAT for everything to say disk space!!

We will have to wait and see how well they do compression. I must say however that their past record is that they do a great job on storage related operations. I don't expect any change in 4.0. Novell is fast to the disk, but their main strength is short code paths. Once the data (file) is in memory, there are very few instructions to access it. So, now block level compression will not be as much a issue after they load it once.

A must read document for everyone (I got my copy from Brad).

Novell marketing has always been good. It's not a good as it used to be when burton and clarke were there, but MS should prepare for one hell of a battle. They will lie. They will publish and distributed huge volumes of incorrect information that we will have to continually response to. We need to flood customers with documents which cover our products in detail and which cut off Novell's expected claims to a large degree.

We already know that Novell executives are telling large customers they aren't going to provide IPX/etc. support for NT. Whether this is really the truth or not doesn't matter. It is making customers afraid. We must plan on getting self-sufficient to as large degree as possible. AND we must make sure the market place knows that Novell is forcing us to do this. We have not done as good a job as we could in making Novell look bad in customers' eyes. It is possible to do. We simply must continue to say "our customers are asking for better integration"; "we continue to beg Novell, but apparently they

are so concerned about MS they don't want to help customers
regarding xxx"; "we wish Novell wanted to help MS customers more..." ;
etc.

jim