IN THE UNITED STATES DISTRICT COURT
FOR THE EASTERN DISTRICT OF TEXAS
MARSHALL DIVISION

NETLIST, INC.,	(	CAUSE NO. 2:21-CV-463-JRG
Plaintiff,	)	
vs.	)	
SAMSUNG ELECTRONICS CO., LTD., et al.,	)	MARSHALL, TEXAS
Defendants.	)	APRIL 18, 2023
	)	8:30 A.M.

VOLUME 3

TRIAL ON THE MERITS

BEFORE THE HONORABLE RODNEY GILSTRAP
UNITED STATES CHIEF DISTRICT JUDGE
and a jury

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Netlist EX2039
Samsung v. Netlist
IPR2025-01402

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MR. CORDELL: This is a problem. Your Honor will recall the last witness we had a dispute over.

THE COURT: You know, Counsel, it doesn't -- it doesn't reflect well on either of you to squabble up here.

If you've got the copies, let's proceed. Okay?

(The following was had in the presence and hearing of the jury.)

THE COURT: All right. Ms. Glasser, you may proceed with direct examination.

MS. GLASSER: Thank you, Your Honor.

Good morning, ladies and gentlemen of the jury.

DAVID KENNEDY, SWORN,

testified under oath as follows:

DIRECT EXAMINATION

BY MS. GLASSER:

Q. And good morning, Mr. Kennedy.

A. Good morning.

Q. Could you please introduce yourself?

A. Yes. My name is David Kennedy. I'm a managing director at Berkeley Research Group. It's an international consulting firm, economic consulting firm.

Q. Where are you from, Mr. Kennedy?

A. Well, from June to October, my wife and I live in a small town in Western Montana where we train -- raise and train horses. And then before the snow gets too deep, we get them

out of the mountains and we come down here. We have a little place about 45 minutes north of town.

Q. And what is your specific role in this case?

A. I'm here to determine what a fair royalty should be for Samsung to pay for Netlist technology in this case.

Q. Is there a specific word or term that refers to the payment that is made for the right to use a patent?

A. Yes, a royalty or a license.

Q. And what is a patent license?

A. It's -- it's a license that gives you the right to use somebody else's technology. It's like a hunting lease that my son and I have, and we pay that lease to get use of the land. If we're not paying, we're trespassing. And in technology, if you don't pay a license fee, you're infringing.

Q. Mr. Kennedy, can you tell us about some of the professional experience with licensing that you bring to this case, starting with your educational background?

A. Sure. About 40 years ago, I graduated from the University of Georgia with a degree in accounting, and I've been a CPA for almost that whole time. And probably about 30 years ago, I started specializing in valuing patents and technology, and also helping companies negotiate license agreements around technology.

Q. Your slide has a reference to IAM Strategy 300. What is that?

A. So IAM stands for intellectual asset management, and I've been honored for the last 12 years to be named as one of the world's leading IP strategists by that international organization.

Q. Now, you've listed on your slide work for the Navy, the Marines, and the Air Force. We've had a number of folks in the courtroom here who have actually have served. You are not enlisted. Correct?

A. Right.

Q. And what type of work have you done for the armed forces relating to patents?

A. So I've been hired to value patented technology that -- that our armed forces uses in national defense and also have testified for the U.S. government about what the reasonable royalty should be for using that technology.

Q. Now, we're going to be talking about folks sitting across the table conducting a license negotiation. Do you have any real-world experience specifically with that?

A. Yes, I do.

Q. And can you tell us about that experience and how it relates to the type of analysis you're going to be doing in this case?

A. So I've negotiated over 200 license agreements in the real world over the last 30-plus years, and I think that helps me do something very important, is to put myself in the shoes

of the parties when they're trying to figure out what a reasonable royalty should be and agree on what should be paid.
Q. And what types of companies -- you said 200. Can you give us a few examples of the types of companies?
A. Yes. These are a few examples of companies that are in the general computing, semiconductor, and memory space that I've negotiated with.
Q. In addition to those hundreds of real-world negotiations, have you also previously testified in court to evaluate patent infringement damages?
A. I have a number of times for both plaintiffs and defendants.
Q. In fact, have you ever had an occasion in the past where an innovator like Netlist hired the law firm that Mr. Sheasby and I work for to analyze the legal issues and then ended up hiring you to analyze some of the financial issues?
A. Yes, that has happened.
Q. Does your firm get paid by the hour for that type of work or how do you get compensated?
A. So my company bills for my time based on hours and the time of people that work with me based on rates that they set that are supposed to reflect experience and specialization.
Q. And does the amount that either you or your firm or anyone on your team get paid, does any of that get influenced by what the outcome of the case is or what type of testimony

you give?

A. No, not at all.

MS. GLASSER: Your Honor, at this time Netlist would offer Mr. Kennedy as an expert in the negotiation of patent agreements and calculation of patent damages.

THE COURT: Is there objection?

MR. CORDELL: No objection, Your Honor.

THE COURT: Without objection, the Court will recognize this witness as an expert in those designated fields.

Please continue.

Q. (BY MS. GLASSER) Mr. Kennedy, what materials did you evaluate to perform your expert analysis?

A. So there was a massive amount of data that we received from Samsung, tens of millions of units of their U.S. sales that we had to analyze.

I also looked at deposition testimony and confidential Samsung documents and emails, analyst reports, financial statements of the parties, and also referred to a regression analysis of that sales data to help determine part of the value of Netlist's technology to Samsung.

And then I also relied on the technical expertise of Doctor Mangione and Doctor Brogioli.

Q. And are all the sales that you analyzed for this case, are those sales that Samsung acknowledged as having a U.S.

customer?
A. Yes.
Q. Did you do all of this work yourself -- actually, you mentioned a moment ago that you had some help from a team. Could you tell us a little bit more about the team?
A. Sure. I've got a team that consists generally on -- on big matters like this of six key people with a number of staff that work on those six sub-teams and that all have specialized experience in particular areas of patent valuation and economic analysis.
Q. And can you give us an example of why you call upon your colleagues for some of the advanced work involving software?
A. Sure. One example is we'll talk about a regression analysis later of the massive amount of sales data, and there's an economist that works with me, that that's what he does for a living.

And so I worked with him or -- and he worked with me to analyze the sales data that Samsung had produced in this matter, because we had to determine what was sold, how much it was sold for, and the relationship between the sales prices and the speed, which we'll talk about later.
Q. Okay. Before we get into the details of your analysis, is there a United States law that you followed for your work in this case?
A. Yes, patent damages statute.

Q. We have that on the screen. Could you explain for us how that influences your analysis?
A. The important aspect of this is that Samsung should pay in no event less than a reasonable royalty for the use made of the invention. That's what I'm determining, the value of that use, how much they used it, and what they made off of that use.
Q. Is there a framework that damages experts such as yourself typically use to evaluate royalties?
A. Yes. It's called a hypothetical negotiation.
Q. What are the rules that apply to this hypothetical negotiation that we do in -- in litigation?
A. So there's three important rules. The first one there is that the parties have to reach an agreement. They can't walk away like you can do in the real world.

And, second, you have both parties have access to all -- each other's information, even confidential top secret information that you don't get in the real world negotiating.

And then the third important factor is that in this hypothetical negotiation, Samsung knows that Netlist's patents are valid and infringed.
Q. When does the hypothetical negotiation take place for this case?
A. It's at the date of first infringement. And for the HBM products, that's July of 2020 after the JDLA ended. And for

DDR4 and DDR5, it was March and May of 2021.

Q. And just to level-set on that, you were here in Court, Mr. Kennedy, when Judge Gilstrap explained to the jury that it had been determined that Samsung no longer had a license after July of 2020. Is that where that date is coming from?

A. Yes, that's correct.

Q. Now, is there a set of factors that courts have laid out to aid experts like yourself in performing this analysis?

A. Yes. They're called the *Georgia-Pacific* factors, named after a well-known patent case years ago, and it outlines 15 factors that experts need to consider to determine damages.

Q. What are the first three factors that you focused on for your work?

A. So 1 and 2 relate to any licensing history that the parties might have that might be relevant to the hypothetical negotiation.

And factor No. 5 is something where we have to consider the commercial relationship between the licensor and licensee at the time of this hypothetical negotiation.

Q. Mr. Kennedy, when you reviewed all of the facts and documents in the case, what did you find to be the most significant facts regarding the parties' licensing history and their relationship?

A. Well, Netlist has never licensed its patents outside of a strategic agreement, and that's really important because in

the hypothetical negotiation there is no strategic agreement. Samsung needs a license to the patents, and they are not giving anything in return for that except royalties.

Q. And could you go on and describe what other additional significant facts you found?

A. So the JDLA included a cross license, and that means that Netlist got a license to all of Samsung's patents, and they also got this highly valuable supply agreement.

Q. And -- I'm sorry. Go on, Mr. Kennedy.

A. Sure. And one other factor that I considered was the fact that Samsung entered into a license in a very similar situation as this situation, and it involved memory patents and they agreed to pay up to $1.1 billion plus give a cross license to Rambus to their patents.

Q. So at a high level, what was the impact of these on how you're thinking about the parties approaching a hypothetical negotiation?

A. So these are all important factors that place upward adjustment on the royalty rate, significant upward adjustment.

Q. So let's turn to each of them in turn. You mentioned that Netlist never previously has licensed or never in the real world has licensed its patents outside of a strategic relationship. What was significant to you in particular about the JDLA relationship?

A. So this is some deposition testimony from Samsung's

president of memory, and he was told to look into any feasibility of a technological collaboration with Netlist. And that's significant because Samsung is the largest memory company in the world, and they're coming to Netlist for help to this technology. So that would definitely have a significant upward adjustment to the royalty rate at the hypothetical negotiation. Samsung really needs Netlist technology.

Q. Now, did you see evidence that Samsung was aware that Netlist had important patents?

A. Yes, I did.

Q. Now, I know the jury has seen these a number of times. Are these some of the examples on the screen here of the evidence that Samsung was aware of the Netlist patents and pending applications?

A. Yes.

Q. Now, you mentioned that the JDLA included, I think you used the phrase, a highly valuable supply obligation. Is that right?

A. Yes.

Q. And were you able to review the records of the parties to understand the quantities of supply that were exchanged when the JDLA was first put in place?

A. Yes, I was.

Q. And what is the particular example that we're looking at

on the screen?
A. This is an email from Netlist to Samsung. And after the JDLA was entered into, about a year later, they were requesting $15 million for a quarter, and that was in June of 2017.
Q. So we're talking about greater than a 60 million pace at that point in time at about a year after the agreement was implemented?
A. Yes.
Q. Now, again, the Court instructed the jury that the JDLA terminated back in 2020. What did Netlist do at that point?
A. So they went to find another source of supply and entered into another strategic agreement with SK hynix.
Q. And is this the second time you were referring to earlier that Netlist agreed to license its patent portfolio?
A. Yes.
Q. What were the key terms of those hynix agreements that were executed together?
A. So based on my review, the most important aspect of the agreement was that Netlist was able to replace the supply commitment that they no longer had with a $600 million supply commitment from SK hynix for a five-year period of time.
And SK hynix also paid Netlist $40 million, and there was a cross license to Netlist and SK hynix's patents.
Q. Now, based on your analysis, was the value of the supply

component of the Samsung JDLA higher or lower than the hynix agreement?

A. It was much higher.

Q. Can we use any of these specific dollar figures that we've seen so far as the royalty rate for the infringement in this case?

A. No. We're trying to determine a royalty, and these are payments that were made as part of a strategic relationship. They do indicate what the position of the parties would be at the hypothetical, but it -- they're not comparable licenses like we're required to consider where Samsung doesn't get to use the supply agreement or any other consideration; they just have to pay a reasonable royalty for the infringing sales.

Q. Now, during the opening argument, did you hear Samsung's lawyer say that they would be presenting argument that that $8 million non-recurring engineering fee should be the damages -- the reasonable damages?

A. I heard that, yes.

Q. Would it make any sense to you as a licensing negotiator to use an engineering payment as a royalty?

A. No, of course not.

Q. And could you elaborate a little bit on that?

A. Well, it was a payment for engineering services, not a royalty. And, in fact, Netlist ended up spending much more than that on engineering fees with Samsung.

Q. You mentioned that you also had access to Samsung's confidential license files. Did you identify any Samsung licenses that inform the amount of damages here?
A. Yes, I did--a license between Samsung and Rambus.
Q. You've got a picture of Doctor Mangione on the screen. What did Doctor Mangione convey to you and as well to the jury yesterday regarding the technology comparability?
A. Yes. So I asked him if the -- if it was comparable. And he, as we heard yesterday, testified, yes, it included DDR SDRAM, and it was about memory modules, and it was -- the technology related to speed and capacity.
Q. Now, once you knew that the technology had some comparability, how did you go about identifying the relevant economic aspects of that Samsung/Rambus license?
A. So looking -- I looked at the situation, looked at the license agreement, and it was interesting to me that it was a very similar circumstance where Rambus and Samsung had a business agreement and that terminated in 2006.

And then Rambus asserted Samsung was infringing 10 patents, and then they entered into a cross license where Samsung agreed to pay $1.1 billion and give Rambus a license to its patents. And this all related to the same type of technology as I just mentioned.
Q. Now, you mentioned that, even though the parties were each giving each other access to their full patent portfolios,

there was a focus on 10 patents. Is that typical in your experience that there will be a small number of patents that are driving the value of the negotiation?

A. Yes. In my experience, oftentimes a small number of patents make up the majority of the value within a portfolio. And it's those patents that are usually used when people are talking about infringement.

Q. So the 1.1 billion, did you convert that into today's dollars, or is that from back in 2010?

A. Those are 2010 dollars, so it would be worth more today.

Q. So summarize for us then, before we get into the calculations, what is sort of the big picture framework that we're looking at in valuing Samsung's use of the Netlist patents?

A. So, first, the negotiators would know that Netlist has never entered into a bare patent license agreement without having a strategic relationship. So we know that those first two strategic relationships that they entered into should not be used to determine what the royalty should be.

And we also know that the JDLA included a cross license and highly valuable supply obligation.

And then, as we just talked about, we also know that Samsung licensed Rambus memory patents based on Doctor Mangione said that they were comparable patents to the patents here and agreed to pay up to $1.1 billion, plus they gave a

license to their patents.

So all of that, factors 1, 2, and 5, would have significant value in the negotiations and upward pressure on what the royalty should be.

Q. Let's turn to factors 9 and 10. Are these factors regarding Samsung's actual use important to the calculation?

A. Yes. They're very important. This is where we look at the value of -- that Samsung obtained from using the technology that's above and beyond other ways of doing it for older technology.

Q. And just remind us again, why are we focused -- laser like focused on this specific use by Samsung of the inventions?

A. That's what the statute requires.

Q. So starting then with those '918 and '054 Patents, the DDR5 patents, what are the key considerations that the negotiators focus on?

A. So, first, they would look to see just how much Samsung had sold during -- just during the damages period, and they would understand based on the documents that would be there that both of them would have access to, that Samsung's DDR5 sales during the damages period alone were $681.7 million.

And they would also know, as we heard earlier from Doctor Mangione-Smith, that Samsung needed a 30 percent increase in power efficiency to make those sales.

And then they would also know that the alternative to achieving that efficiency requires significantly reducing speed and other actions and adjustments.

Q. Could you briefly remind us, how do we know that the infringing products have 30 percent greater power efficiency?

A. Yes. We heard from Doctor Mangione and saw this document. It comes from Samsung's own documents. You see the 30 percent increase in power efficiency that would be needed with DDR5.

Q. And for calculating a royalty, why would that technical benefit be particularly important to Samsung?

A. So this is a Samsung internal document that we get access to as part of the hypothetical negotiation, and you see that Samsung on the top line there is recognizing that they're behind their competitor's schedule already with DDR5.

And the other two important points is, one, they know that power and thermal is a critical challenge for DDR5. And then, last, they say that they need to address these increased temperatures associated with that increased DDR5 power.

Q. Did Samsung identify any way that it believed it could reach that same benefit without using the Netlist patents?

A. No.

Q. And were you in the courtroom when the deposition videos were being played?

A. Yes.

Q. I think we all saw then this video of Mr. Park, the corporate representative on topic 17. What do you understand that to mean? What is an official corporate representative on a topic in litigation?
A. He was asked about a non-infringing alternative, and he didn't know of one, did not perform that investigation.
Q. In terms of who he is, it says technical leader. But do you have an understanding, what does it mean that he was Samsung's corporate representative on the topic?
A. Well, Samsung identified him as the person who should be most knowledgeable about this topic. If anybody knew, then he should know.
Q. So if Samsung is right and there is no actual alternative for these two patents, the '918 and the '054, what's the benefit to Samsung?
A. Well, without Netlist's technology, they would lose the sale. They wouldn't be able to sell the product.
Q. Did Doctor Mangione conduct an analysis giving Samsung the benefit of the doubt that maybe there was a way they could have at least tried to get the same benefit through an alternative technology?
A. Yes, he did.
Q. And what was -- he testified to that yesterday on the stand, an alternative configuration that he thought Samsung could have tried. Is that right?

A. Yes, that's correct.
Q. And what was the down side that he identified to Samsung of trying to implement that alternative?
A. So there is -- based on Samsung's own documents, there is a -- a problem when you're -- you're reducing speed by one percent reduces power by 1.5 percent. So you have to reduce the speed to get that power reduction to make it possible.

And this is one of their documents where we see the ratio between speed and power, and this document tells us, based on my analysis and calculations, that reducing the speed by one percent reduces power by 1.5 percent.
Q. So let's just walk through the math on that. And to level-set a little bit, we're talking about if Samsung went out and tried the alternative that Doctor Mangione identified and they needed to still bring the power down -- I'm sorry, the power efficiency up, what's the math on how much they would have had to adjust the speed?
A. Yes. So we look at the 30 percent reduction necessary power efficiency that Samsung identified. And if you divide that by the 1.5 percent, you get that -- you get the amount of reduction in speed that you would have to get to get that 30 percent power efficiency. And that's 20 percent.
Q. So could Samsung have just gone out and sold a 20 percent slower version of the same product at the same price?
A. No, probably not. These products all are very technical

and -- and valuable or like commodities in some way like oil. There's competition, and I think of it -- we raise and train horses. And if I've got a trail horse that I'm trying to sell to an outfitter that's 20 percent slower than somebody else's horse is, he's just going to go somewhere else, or certainly he's not going to buy it at the same price.

Q. And so you're using this 20 percent number. Did Doctor Mangione actually identify some documents in Samsung's files that supported that difference is even larger?

A. Yes, he did.

Q. Are you conservatively using the smaller 20 percent number from the particular Samsung document we're looking at here?

A. Yes. There -- there are other documents that indicate that the number could be 33 percent.

Q. So once you have that 20 percent number in mind, how do you go about then translating that to a specific financial value?

A. So this -- this is where I turn to an economist on my team who specializes in analyzing large volumes of data and running what's called a regression analysis that compares over time the sales price to the speed to determine what the overall ratio or relationship is.

Q. Is that something that you can do with sales files using just a calculator?

A. No. It takes a specialized software to do that that's run.
Q. And so with this regression software, was your colleague able to control for the variables in play and determine the approximate relationship between price and speed for Samsung's products?
A. Yes, he was.
Q. And do you know what set of data he evaluated to do that?
A. Yes. It was the -- Samsung's U.S. sales data for DDR4.
Q. Why did he use that particular set?
A. Well, DDR4 had a sales history where you could look at the price and speed differences, and it was the previous generation right before DDR5. And DDR5 at -- now is just at one speed, so you can't do a calculation on speed to price differences on DDR5. But you can on DDR4, and DDR5 is just the next generation.
Q. So once you have the price-to-speed relationship, how did you go about applying that to the accused DDR5 products?
A. So this is an example, just one example of one of Samsung's products, 128 gigabyte DDR5 DIMM. So the price with Netlist's patents is $1,236.32. And the price without Netlist's patents, that's the 20 percent slower and adjusted for the factor that came out of the regression analysis, the 1.4 number that we saw on the previous slide, they would have to sell it at $879.92. So Samsung's benefits from the patents

on this particular product is $356.40.

And if you look across all of their products and do this same type of analysis, some are priced higher, lower, but in aggregate Samsung's benefit gain from using Netlist technology is $196.3 million just during the damages period.

Q. And that's for the '918 and the '054 Patents. Is that correct?

A. That's right.

Q. Now, does that amount that you calculated, does that include anything -- does the 196 million include any benefits that Samsung or any other party contributes to the product?

A. No. It apportions them out. The calculation only focuses on the benefits that are provided by Netlist's patents. And all the other benefits that anyone has provided to that product is part of the portion that Samsung keeps out of that $681.7 million.

Q. Have you seen any evidence suggesting that your analysis understates the value to Samsung of using the '918 and '054 Patents?

A. Yes.

Q. Can you walk us through what you've seen?

A. So speed is critical for this product. Samsung understood that, understands that, and tells their customers that. Their customers understand that. So with that in mind how important speed is, just trying to sell the same thing for

less, more than likely somebody's just going to go somewhere else.

So this is important for Samsung to retain its market position in this product is to use the technology and not try to sell a slower product.

Q. So let's turn to the second category of products, those DDR4 patents with respect to the '339 Patent. Can you walk us through what are the key considerations there?

A. Sure. Again, the hypothetical negotiation, both parties have access to this financial information, and they would know that Samsung has sold $312.1 million worth of DDR4 infringing products just during the damages period.

And they would also know, as we heard from Doctor Mangione, that without Netlist technology, the product sold wouldn't be usable in this two DIMMs per channel configuration and that the next best alternative would be to try to sell a bigger DPC LRDIMM at a lower price.

Q. Did you calculate out how much of a price difference there would be if Samsung had to present its customers with this alternative of the only allowing one per channel rather than presenting them as they do now with the accused product?

A. I did. So I looked at the two DIMM per channel products prices and compared that to without Netlist technology, a one DIMM per channel but with a larger capacity, a bigger chip, and that was more expensive.

So, in general, you can see that through my calculations, that Samsung would have to reduce its prices by about 15 percent to be able to sell the non-infringing alternative.

Q. When we apply the effect of that approximately 15 percent across the infringing DDR4 products, what's the total benefit to Samsung?

A. 44.2 million.

Q. And similar to what I asked before, can you clarify, does that include any unpatented features of Samsung's accused products?

A. No, it doesn't. They're apportioned out. This is just the value related to the Netlist technology. The rest of any other value associated with that product is the portion that Samsung keeps out of the $312.1 million.

Q. Let's turn then to the third category of accused products, the HBM products. What are the important royalty factors here?

A. So as we heard from Doctor Brogioli, that Netlist technology allows Samsung to sell eight high or higher DIMMs, and they wouldn't be able to do that without Netlist technology. They'd have to try to sell four high HBM to replace that. And they would also know, seeing the financial records, that Samsung's sales during -- just during the damages period that we're talking about of these HBM products was $903.4 million.

Q. Did you see evidence that Samsung would be particularly focused on the value of that benefit?
A. Yes. This is a document that is a Samsung document, and it's talking about the competition is requiring higher stacks. So if they want to keep up with marketplace and their competitors, they need to be off -- be able to offer the eight high or higher HBM products.
Q. And this is JTX 27, sir?
A. Yes.
Q. Now, how did you go about calculating the value to Samsung in monetary terms of being able to sell the higher than four stacks?
A. So I looked at the product pricing information from Samsung for the eight high products, and then compared that to an equal number selling the four high products, and looked at that difference of what just the value is that relates to that ability to go from four high to eight high. And that total value is $163.7 million just related to Netlist's patents.
Q. And just to clarify a point there, did you find that typically Samsung was able to charge a much higher price when they were selling the eight high as compared to the four?
A. Yes.
Q. Now, same question I asked you as for the others. Have you included in the $163 million any of the allegedly unpatented features of Samsung's products?

A. No. I've apportioned them out and just focused on the Netlist piece of that value allowing them to sell that alternative and Samsung keeps the rest.
Q. Is there additional evidence you've seen that this also may understate the value to Samsung?
A. Yes. This is a Samsung document looking at the HBM marketplace, and they were expecting tremendous growth, and there was also an expectation that they were ramping up to go up to 12 high, not just eight high.
Q. And why is that so important to Samsung from a business perspective?
A. Well, they don't want to be cut out of a huge marketplace like this.
Q. Mr. Kennedy, what's the next factor that you analyzed?
A. It's factor 13. It refers to apportionment.
Q. And you've already spoken a bit about how you apportioned out the value of the patents versus other parts of the patents. Can you remind us how you went about doing that?
A. Yes. So by the way I did my analysis, I'm looking at just what's called the footprint of the patented technology that's in the claims. Just what Netlist is adding in value through those claims.
Q. And the way you do that is to compare it to an alleged non-infringing alternative. Is that right?
A. That's correct. That's what I've done.

Q. When you were first asked to evaluate this case, did you brainstorm about other apportionment arguments that a licensee in Samsung's position might put forward?

A. Yes. I thought about in my experience what other types of adjustments that the parties might talk about and try to adjust for it.

Q. Can you give a couple of examples of that?

A. Sure. Sometimes a licensee might come to the negotiation with their own patents and say that part of the value is associated with their patents and were commercial benefits that they contribute that somehow helps drive the value of that specific technology.

And sometimes I've done this in negotiation by using a comparison of research and development between companies to see who spent money on research and development and what kind of innovation they've had and negotiated for some type of split based on that.

And I also looked at the licensees' gross margins to see what they typically have earned off of this technology, and that's another way that you can do that.

Q. And did you actually calculate out to see if that would produce -- that Samsung might argue for that to produce a lower number?

A. I did do the calculations, yes, in my report when I wrote my report.

Q. And then the way it works is you do an opening report, and then you hear from Samsung's expert after that. Right?
A. That's right.
Q. Did Samsung's expert ultimately use the R&D margin or identify patents or do any profit margin as the basis for his calculation?
A. No, he did not.
Q. And during the case, all the evidence that you've seen, has Samsung ever identified any contribution from a Samsung patent to any of the benefits that you've described?
A. No. I've seen no evidence of that, and evidence that, as we saw in deposition testimony, that they have not.
Q. We are looking at just a couple of examples that folks saw played earlier today up on the screen. Is that right?
A. Yes. These are principal engineer, technical engineer, and senior engineer from Samsung who were designated on these topics as the corporate representative.
Q. Now, does the analysis you've done leave Samsung with profit on its infringing sales?
A. Yes, it does. It's -- the Samsung products are very profitable. They make about a 50 percent margin on them. And after the taking out the value for Netlist's portion of that value, they're still left with a significant profit.
Q. Let's take a look at the next factor. What is factor 8?
A. So this relates to that established profitability of the

product and the commercial success, and its popularity in the marketplace. And to do that, you need to understand the overall market.

Q. What are we looking at on the slide here?

A. This is Samsung's market position in this market. Between Samsung, Micron, and SK hynix, they control 95 percent of the marketplace.

Q. And why is that important when you're thinking about how to calculate a royalty?

A. So it shows that it -- Samsung would want to be very competitive, not to lose market share here. There's two other big players out there that would willingly take those sales if they couldn't offer that technology. So it's important to understand that.

Q. Can you give an example from the testimony we heard earlier today about where that actually happened to Samsung before they had the Netlist patents?

A. Yes. He identified that or said that -- testified that SK hynix had launched an HBM1 product commercially before Samsung, and that led to Samsung being cut out of that marketplace and they could not sell anything in the market for HBM1. And that was confirmed by Mr. Kim's testimony saying they didn't end up even making an HBM1 product.

Q. And this was in the time period before the JDLA. Correct?

A. That's right.
Q. What is Samsung's view on the HBM3 market growth going forward and does that impact the royalty?
A. It does. When you're negotiating and you know that the other party is predicting the market's going to experience huge growth, that does influence the negotiations. Here we see from Samsung that they're expecting a 40 percent compound annual growth rate in this marketplace.
And that was double of what they were projecting for the rest of the memory space.
THE COURT: Counsel, approach the bench, please.
(The following was had outside the hearing of the jury.)
THE COURT: Two things. We're going to break for lunch and finish the direct after lunch.
There's a rather distinguished Asian gentleman sitting right behind your technical expert. I assume he's a Samsung officer.
MR. CORDELL: There has been a distinguished Asian gentleman who has no connection to Samsung.
THE COURT: Whoever he is, he's visually nodding his head side to side, especially when the witness talked about the 50 percent margin. If you have any control over him, he needs to sit still. If you don't, then I'll deal with it.
MR. CORDELL: Sure. It's someone behind the

technical expert?

THE COURT: Yes. No. Behind your IT person with the screen.

MR. CORDELL: Okay.

MS. GLASSER: With the glasses?

THE COURT: With the glasses.

MR. CORDELL: Okay. I'll see if I can speak with him.

THE COURT: All right. We'll break for lunch at this point. Okay?

(The following was had in the presence and hearing of the jury.)

THE COURT: Ladies and gentlemen, this examination is going to go on a little longer. We've reached the noon hour, so we're going to use this juncture to break for lunch.

If you will take your notebooks with you to the jury room, lunch should be there waiting for you. Please follow all my instructions, including, as you would expect me to remind you, not to discuss the case with each other.

And we'll be back shortly, a little less than an hour, and we'll pick up with the examination of this witness at that time.

With those instructions, the jury's excused for lunch.

(Whereupon, the jury left the courtroom.)

THE COURT: The Court stands in recess for lunch.

(Lunch recess.)

THE COURT: Be seated, please.

Mr. Kennedy, if you'd like to return to the witness stand, please.

Ms. Glasser, you may return to the podium.

And once they're in place, let's bring in the jury.

(Whereupon, the jury entered the courtroom.)

THE COURT: Welcome back from lunch, ladies and gentlemen. Please have a seat.

We'll continue with the direct examination of Mr. David Kennedy by Plaintiff's counsel.

Ms. Glasser, you may continue.

MS. GLASSER: Thank you, Your Honor.

Good afternoon, ladies and gentlemen of the jury.

Q. (BY MS. GLASSER) And good afternoon, Mr. Kennedy.

A. Good afternoon.

Q. Just before lunch, we had been talking about the benefits of the Netlist patents to Samsung. And can you explain for us with reference to market position why your assumption that Samsung would have retained all of those sales even without use of the patents was conservative?

A. Well, in the marketplace, there's three big players that dominate it, 95 percent of the market. And it's very competitive between these three players. And if one of the companies is going to offer a product that's not as good or is

not using the Netlist technology, they're going to probably just lose those sales altogether.

I gave Samsung the benefit of the doubt that they would be able to keep the sales, but there would be a cost associated with being able to retain those sales.

Q. Thank you.

Let's then turn to factor 6 you've described on your slide as convoyed sales. What does that term mean for purposes of patent royalty evaluation?

A. So generally a convoyed sale is the sale of a product that you can get because you're selling a patented product. It may not be -- it's not covered by the patents, but because they're buying one thing from you, they buy other products from you. And that's the concept of convoyed sales. It's a benefit to an infringer.

Q. And we saw that deposition testimony of Mr. Anson Tsui earlier today from Samsung. How does his testimony relate to this factor?

A. Yes. His testimony describes -- described that in one of his answers that concept of convoyed sales where he said, we win some business with one product and we win additional opportunities in the future.

Q. That takes us to factor 11. What is factor 11?

A. So this is where I considered the extent of use of the product by Samsung, all the ways that they benefit from the

product and what they get out of that.
Q. Now, with respect to factor 11 -- actually there's 15 factors in the list. Did you evaluate each and every one of the 15 factors?
A. Yes, I did.
Q. And have you presented here to the jury all of the factors that you believe the hypothetical negotiators would place significant weight on, positive or negative?
A. Yes, I did.
Q. Let's go over factor 11. I know you have spoken fairly extensively about this, but can you summarize for us what are the key facts about Samsung's use and how it impacts the royalty rate?
A. So on this summary, you see Samsung's products, infringing products on the left, the DDR5 DIMMs, the DDR4 LRDIMMs, and the HBM2, 2E, and 3 products.
Q. And let me pause you there just for a minute. For clarity, the DDR5 DIMM products, that's one separate category on the '918 and '054 Patents. Is that right?
A. Yes, that's correct.
Q. And then the DDR4 is another separate category on the '339?
A. Yes, that's correct.
Q. And then, finally, all of the ones that are identified as HBM, those all relate to the '060 and '161 [sic]?

A. Yes, that's correct.

Q. And so could you then summarize for us what you saw in the record, what you learned from the technical experts, about what the Netlist patents enable?

A. Yes.

THE COURT: Let me interrupt. Ms. Glasser, I think you said the 161. It's the '160.

MS. GLASSER: Thank you, Your Honor.

THE COURT: I'm just trying to prevent confusion since we have five different numbers for different patents floating around.

MS. GLASSER: That is very, very much appreciated. There's a lot of numbers. Thank you, Your Honor.

THE WITNESS: So the benefit to Samsung that has been identified by the technical experts is faster DIMMs, the ability to have two DIMMs per channel in the LRDIMMs, and for the HBM DIMMs to have eight or higher stacks, and then also the improved signal integrity.

So those are the benefits that Samsung enjoys from Netlist's patents that enables them to get what's called design wins with their big customers where they can sell these products.

And these three categories of products in the DDR5, as we talked about, just during the damages period, sold $681.7 million of those products. The DDR4 LRDIMMs, they sold $312.1

million, and the HBM products was $903.4 million. And I also add down here that there was additional sales opportunities that would come from this convoyed sales concept that Samsung's witness identified.

Q. And to be clear, Mr. Kennedy, are any of those revenue numbers there anything other than United States patent -- United States sales that are subject to the United States patent infringement statute?

A. That's -- that's it. That's the -- all they relate to. So the total sales that Samsung in the U.S. got from the sale of these infringing products was approximately $1.8 billion.

Q. I'd like to talk to you a little bit more on this design win concept, too. We've heard qualification a few times in this trial. How does the concept of qualification relate to design wins?

A. So it's my understanding that a customer has to qualify the product and understand that it's going to work for their specific purpose, and that leads to a design win where they accept the design, which means that then they're able to sell in to that particular customer.

Q. Were you here in the courtroom on Friday when Mr. Milton from Netlist testified?

A. Yes.

Q. And do you recall on the cross-examination when Samsung's lawyer used the word 'misleading' and suggested he was

misleading folks by referring to products as being commercial when they were in qualification?

A. Yes, I did.

Q. Was that an accurate or inaccurate characterization?

A. I think it was inaccurate.

Q. Have you seen anything in the record about whether Samsung makes any of these sales without going through the normal qualification process?

A. No.

Q. We may have had a double negative. What have you seen in the record about that issue?

A. I have not seen anything in the record that says that that's possible.

Q. To get a design win, you have to go through that qualification. Correct?

A. That's my understanding, yes.

Q. Whether you're at Netlist or whether you're at Samsung. Fair?

A. Correct.

Q. So when you walked through the factors, you noted that a lot of them had an upward pressure on the royalty. Is that right?

A. Yes.

Q. And then you calculated the technical benefit. Is what we're looking at on the top of the screen that exact technical

benefit that you laid out on your prior slides?

MR. CORDELL: Objection. Leading, Your Honor.

THE COURT: Sustained.

Q. (BY MS. GLASSER) What are the three numbers up at the top of the slide, sir?

A. Those are the three damages numbers for the three different product types, and by patent numbers, the damages that relate to Samsung's benefit from using the technology just during the damages period, and they do not include any other technology other than Netlist's technology.

Q. Sir, thank you for your analysis today. Could you summarize for us your ultimate opinion regarding the damages owed to Netlist?

A. Yes. For the DDR5 patents, the '918 and the '050 [sic], that's $196.3 million. For the DDR4 patent, the '339, it's $44.2 million. For the HBM patents, the '060 and the '160, it's $163.7 million. And the total of those three numbers is $404.2 million.

MS. GLASSER: I pass the witness, Your Honor.

THE COURT: Cross-examination?

MR. CORDELL: May I approach, Your Honor?

THE COURT: Let's distribute binders, yes.

All right, Mr. Cordell. You may proceed with cross-examination.

MR. CORDELL: Thank you, Your Honor.

CROSS EXAMINATION

By Mr. Cordell:

Q. Good afternoon, Mr. Kennedy.

A. Good afternoon.

Q. It seems like we've been in a lot of cases together, but is this the first time we've met?

A. I think so. Nice to meet you.

Q. Well, good to meet you. I was listening to you introduce yourself. You sound like a hunter.

A. I am.

Q. What do you hunt?

A. Most recently an alligator down in Florida. And back before the last trial, I was in Africa hunting African game.

Q. Oh, wow! Like what?

A. Well, there was a leopard that was -- had killed a couple of the local villagers, and they asked me to come in and hunt it. I'd had a business over there and was with connected with the Tanzanian Wildlife Authority. So, anyway, that -- that was an interesting trip, but it was sad in one way.

Q. Wow! Well, I mean, you don't hunt leopards here, though. Right?

A. No.

Q. You hunt deer? You said something about a lease.

A. Yes. Yes. Deer hunt.

Q. Yeah. You're not like Mr. McKeon who thinks that a

10-point buck is a basketball player from Milwaukee?
A. No.
Q. All right. Now, you gave us a lot to talk about here so I should probably get on with it.
Let me -- let me start with a few things we can agree on. If this jury decides that there's no infringement in this case, then there are no damages. Correct?
A. That's correct.
Q. And if this jury finds that any of the patents that they do find infringed are invalid, then there's no damages. Correct?
A. That's correct.
Q. So if this jury decides, for example, that the Samsung accused HBM products have DRAM circuits on them and that there's no infringement, then there's zero dollars for the '060 and '160 Patents. Right?
A. Correct. When no infringement, there is -- there are no damages.
Q. And if the jury decides that the staircase in the HBM products means that there is an electrical connection to every one of the die and concludes there's no infringement because of that, then there's no damage for the '060 and '160 Patents. Right?
A. Yeah. I'm not sure -- that's a technical aspect of the patent. But if there's no infringement of the patent, then

there are no damages.

MR. CORDELL: Your Honor, with your permission, I neglected, when I had this demonstrative on the elmo before, to give it a number. May I give it DDX 154?

THE COURT: All right.

MR. CORDELL: And for the record, that's my mark-up of PDX 3.39.

Q. (BY MR. CORDELL) Now, this is a patent infringement case. Right?

A. Yes.

Q. And you're a very accomplished patent infringement damages expert. Right?

A. I have done a lot of that type of work, yes.

Q. And you know that the way this works is that we're supposed to imagine Mr. Netlist and Mr. Samsung sitting across the table from each other negotiating. Right?

A. Basically. That's fair.

Q. You call it a hypothetical negotiation. Right?

A. I refer to it that way because that's the way it is referred to in the *Georgia-Pacific* factors, yes.

Q. The idea is that we are supposed to imagine these two companies sitting across the table and negotiating. Right?

A. That's correct.

Q. And as part of that negotiation, the first thing we assume is, look, we're not going to squabble about

infringement or validity anymore; we're just talking about what it's worth. Right?

A. That's correct.

Q. And we're going to go ahead and we're going to assume that both parties are going to be reasonable. Right?

A. Yes.

Q. And I think you refer to that situation as both parties being prudent. Right?

A. I may have used that word. I don't recall.

Q. It's in your expert report. Would you like to refresh your recollection?

A. I'll take your word for it, or if you'd like me to look, I'd be happy to.

Q. It's in your binder. Look at paragraph 49.

A. Yes, I see it.

Q. Yeah. And you assume that the parties are prudent. Right?

A. Yes, among other things, but that is a good word.

Q. You know that they're going to be careful and they're going to show good judgment. Right?

A. They should.

Q. So what -- the whole purpose of your being here is to help the jury figure out that, if they find infringement, if they find validity, what reasonable people would likely come out with if they were sitting down to cut a deal. Right?

A. Yes.
Q. All right. Now, both parties would know a lot about each other at this negotiation. Right?
A. Yes.
Q. And one of the things they would know is any other agreements that might be relevant out there. Right?
A. Yes.
Q. Now, before we get into that, I'd like to just frame up kind of what we're talking about. Well, let's do those agreements right now. I'm sorry.
Netlist has licensed the patents in this case in two agreements. Correct?
A. As part of two agreements, yes.
Q. That would be the JDLA that they -- the agreement they had with Samsung. Right?
A. Yes.
Q. And the agreement they had with SK hynix. Correct?
A. Yes.
Q. And in both of those agreements, Netlist licensed every patent that they owned. Right?
A. Yes.
Q. And in the JDLA at the time, it was about 87 patents. Is that right?
A. That sounds about right.
Q. And the terms of the JDLA required Samsung to pay Netlist

$8 million. Right?
A. Yes.
Q. And there's also the SK hynix agreement. You're familiar with that one. Right?
A. Yes.
Q. JDLA was done in 2015. Is that right?
A. Yes.
Q. And SK hynix, that agreement was done in 2021. Right?
A. Yes.
Q. And the SK hynix agreement licensed all of Netlist's patents to SK hynix. Right?
A. Yes. That was part of the agreement.
Q. And in 2021, that was about 120 patents. Right?
A. Yes.
Q. Okay. And Samsung and SK hynix are competitors. I think you testified about that. Right?
A. Yes.
Q. They both sell DDR4 products. Right?
A. Yes.
Q. Both Samsung and hynix sell DDR5 products. Right?
A. Yes.
Q. SK hynix and Samsung sell HBM products. Right?
A. Correct.
Q. Those are all the products that are at issue in this case. Right?

A. Yes.
Q. Okay. So let me -- before we get into the nitty-gritty, let me see if I can frame this up. And let's start with the damages that you have opined about in this case. So let's call this Mr. Kennedy.
MR. CORDELL: Your Honor, may I move this forward?
THE COURT: You may. Move it up near the elmo.
MR. CORDELL: Thank you.
Can you hear me all right?
THE COURT: Mr. Kennedy, can you hear him?
THE WITNESS: Yes, sir.
Q. (BY MR. CORDELL) Now, there are three different classes of products. Let me make sure I get all this right. We have DDR4, we have DDR5, and we have HBM. Is that right?
A. Yes.
Q. I apologize about my handwriting again.
And the years of the damages that you have talked about in this case are a little bit different for each of the products. Right?
A. Yes.
Q. So for DDR4, when does the damages start on DDR4?
A. That's at the termination of the JDLA, which was July, I believe, of 2020.
Q. Would you believe that it was in December of 2021?
A. Yes.

MS. GLASSER: Actually, can we have a sidebar, Your Honor?

THE COURT: Approach the bench.

(The following was had outside the hearing of the jury.)

MS. GLASSER: My concern is that he is correct that the number he -- he said the wrong date, but he mixed up something. But now he just threw out a completely different date that has to do with a separate period of damages that is not when the hypothetical negotiation is taking place. So I guess I'm not sure where he's going with --

THE COURT: If we're talking about the JDLA, I've told the jury that it was no longer effective in July of 2022.

MR. CORDELL: We're not, Your Honor.

THE COURT: '21.

MR. CORDELL: '21. 2020.

MS. GLASSER: If it was the issue date of the patent, then I would be okay with it if that's what it is, but --

MR. CORDELL: No. No.

THE COURT: Let's start over. What's the problem?

MS. GLASSER: It sounds like he's introducing something having to do with a different damages period or a different hypothetical negotiation date than what is actually at issue. But I could be wrong. Maybe he can reassure me

where he's going with it. But that wasn't the hypothetical negotiation date or the JDLA date, and so it seemed to me like it might be going in a wrong direction.

THE COURT: All right. Can you respond to that, Mr. Cordell?

MR. CORDELL: Yes, Your Honor. First of all, this witness should know. You can see him over there looking it up right now.

The damages period he opined about is the damages period he opined about. The correct damages period begins at December of 2021 when the complaint was filed. Your Honor ruled on that at the pretrial. For these two patents, it's December of 2021.

For HBM, it began in May when they filed the amended complaint. So I'm entitled to get from him what his opinion is about when the damages started. I'll refresh him if he can't remember, but he should remember. It has nothing to do with the hypothetical negotiation --

MS. GLASSER: Do you intend to talk about how he calculates that number for the revenue? Is that --

THE COURT: All right. Just -- just stop. There's not an objection up here. We're not here to have a conversation. Let's go forward. Okay?

MR. CORDELL: Thank you, Your Honor.

MS. GLASSER: Thank you.

(The following was had in the presence and hearing of the jury.)

Q. (BY MR. CORDELL) All right, Mr. Kennedy. Do you remember the question?

A. Yes, I believe so.

Q. When do your damages period begin for DDR4?

A. When the JDLA was terminated.

Q. Okay. So are you sure about that, sir?

A. I can check in my report to make sure.

Q. Why don't you check? Because I think it's December of 2021, not July of 2020. And that's about a year and a half difference.

A. To save time, do you want to direct me to it, or do you wish for me to look for it?

Q. Well --

A. I'm happy to do either.

Q. So let me show you -- I mean, well, let me just ask you quick. Do you remember the damages period for any of the three classes of products that you put your opinion in on?

A. Yes.

Q. Okay. Well, what -- what are the others?

A. The DDR5 is -- it's March of 2021, and HBM is May of 2021.

Q. No. Let me see if I can find your chart. Okay. Let's try it with this.

And it matters when the damages period is. Right, Mr. Kennedy.

A. Yes, yes.

Q. Right. You don't want to pay for your hunting lease for years you're not going to be there. Right?

A. That's correct, yes.

Q. You've been called to Africa, it would be silly for you to pay for a lease when you're not there. Right?

A. Yes, that's correct.

Q. So if you see here your exhibit for B to C, which is DDR4 --

A. Yes.

Q. -- after December 2021 going forward. Right?

A. Yes, that's correct.

Q. Not July 2020. Right?

A. That's correct.

Q. It's not March of 2021. Right?

A. Yes, that's correct.

Q. So for DDR4, the damages begin when we have to start paying you at 12/21. Right?

A. That's correct.

Q. And that runs through the present day. Fair?

A. Yes.

Q. That's through the present. What about DDR5? What does your chart say about when damages began then for DDR5?

A. In -- at December 20th, 2021, forward.
Q. Okay. So 12/21, and that again to the present. Right?
A. Yes.
Q. All right. And when did the damages begin for HBM.
A. So from May 3rd, 2022 forward.
Q. All right. So 5/22 to the present. Right?
A. Yes.
Q. So we've had about, oh, call it 14 months for DDR4 and DDR5? Is that right?
A. That's correct, yes.
Q. And then we have about, oh, just shy of a year, maybe 11 months, for HBM.
A. Yes, that's correct.
Q. All right. Now, can we kind of come up with a round number just so I can use one time period? So 7, 18, and 11, you know, call it 16 months? Does that sound about right?
A. Sure.
Q. Okay. So is there another number you prefer?
A. No. That's fine for --
Q. All right. So 16 months?
A. -- this purpose.
Q. All right. So that's what you say is the capture period for damages in this case. Right?
A. Yes. That's the damages period. The hypothetical negotiations were the other dates. But I think we -- the

Court has instructed which date to use for damages, and that is correct.

Q. And that's important. Right? Because we didn't -- we didn't lease the land until these dates. Right?

A. That's right.

Q. Okay. So we're going to -- you're only going to give an opinion that Samsung owes money for those dates. Right?

A. That's correct.

Q. Okay. Now, let's take that, that's -- and you say that's -- I'm sorry, $440.2 million. Right?

A. Yes.

Q. And you accountants write million as two Ms. Is that right?

A. That's right.

Q. Why do you do that?

A. I'm not sure. It's been that way since I've been in college, since I was in college.

Q. Million still only has one M in it. Right?

A. I know it. But if you put one M, people understand that as a thousand, so -- I didn't come up with it.

Q. All right. Now, I'd like you to do something for the jury and do a comparison. Would that be okay?

A. Sure.

Q. All right. So let's see. Let's start with your number. Okay? I'm just going to put a big K here as that's your

number. And your number is $404.2 million. Isn't that right?
A. Correct.
Q. And that was for 16 months. You want to round that up so I can call it a year-and-a-half, 18 months, 1.5 years?
A. Okay.
Q. 1.5 years. All right. That's your opinion. Right, sir?
A. Yes.
Q. Okay. Now, the JDLA, that's another agreement in this case. Right?
A. Yes.
Q. And that was -- the total money in that case that was paid was $8 million. Right?
A. The total cash -- the cash, yes.
Q. The cash--$8 million. Right?
A. Yes.
Q. Okay. And how long was the JDLA in force?
A. How long was it supposed to be in force or over time or --
Q. Just in fact, it was five years, wasn't it? It was from 2015 --
A. Yes, until it was terminated.
Q. -- until 2020. That was about five years. Right?
A. Yes.
Q. And then we have the hynix agreement. You talked about that one. Right?

A. Yes.
Q. And that was $40 million. Right?
A. Yes.
Q. And how many years has that been in force?
A. Five years.
Q. Five years? Well, it started in 2021. Right?
A. Oh, it was for a five-year period.
Q. It started in 2021.
A. Yeah.
Q. But there was a funny thing in the hynix agreement. It had a release in it. Tell us what a release is.
A. When you release somebody from an obligation, I guess. It's a legal term, but that would be a way to think about it.
Q. That meant that it kind of took care of some past years. Right?
A. Yes.
Q. So there are a few years maybe before 2021 that were swept in there, but we can start at 2021. Is that all right?
A. Sure.
Q. Okay. So 2021 to 2026. Isn't that right?
A. Yes.
Q. So that's another five years. And then we have Rambus. Talked a lot about that one. Do you remember that?
A. Yes.
Q. And how much did you say was attached to Rambus?

A. I'm sorry? What was your question?
Q. How much did you say that was paid for the Rambus license?
A. Well, it was up to $1.1 billion. I don't know what the -- how much had actually been paid at that point in time.
Q. You gave us two numbers. You said it's between 690 and 1.1 billion. Right?
A. That's correct. That's what the agreement called for potentially over time when they agreed to it.
Q. So 690 to 1.1 billion. Right?
A. Yes.
Q. And how many years was that Rambus agreement? How many years did that lease go on for?
A. I believe it was the -- well, I'm -- I'm not certain. The license agreement itself would have been for the life of the patents.
Q. Okay. So that could be 20 years?
A. For some patents, yes.
Q. It could be more than 20 for others? So the short answer is, you don't know how long the Rambus license is going to go on for. Right?
A. Yes. There's no -- as the patents expire, coverage would expire or benefits would expire.
Q. Well, we know that it was signed in 2010. Right?
A. Correct.

Q. And it's going -- it's at least in force now. That's been 13 years. Right?
A. Yes.
Q. And it's going to go on for an indeterminate number of years into the future. Right?
A. Yes.
Q. So it's at least 13. I'm going to put present. And that's -- I'm going to write 13-plus. Right?
A. Okay.
Q. So what we've got and the evidence that this jury is going to be presented with is we have your analysis that $404 million should be paid for a lease of 1.5 years. Right?
A. Yes.
Q. The JDLA was an $8 million cash payment for a five-year lease. Right?
A. Yeah. I wouldn't agree with that characterization that the 8 million paid for the five-year --
Q. That was the cash. Right, Mr. Kennedy?
A. That was the cash, yes.
Q. Hynix, the cash was 40 million for a five-year lease. Right?
A. That was part of the payment -- part of the consideration, yes, 40 million.
Q. And Rambus you said is somewhere between 690 and 1.1 billion, but that's for a 13-year lease and counting. Right?

A. Yes.
Q. Okay. But there's another aspect to this. How many patents are in your -- your lease?
A. Five.
Q. Five. So I don't know. I'm out of room. Five patents. How many patents with the JDLA?
A. Well, the cross license, so it would have been --
Q. Well, let me rephrase it then. How many patents did Samsung give Netlist money to license Netlist patents?
A. I'm sorry. Ask that question again, please?
Q. How many patents -- Netlist patents did Samsung license in the JDLA?
A. They received coverage on the portfolio.
Q. And was that 87 patents?
A. Approximately, yes. I believe that's correct.
Q. 87 patents. For hynix, how many patents -- how many Netlist patents did hynix receive rights to?
A. The portfolio.
Q. Was that about 120 patents at the time?
A. Yes.
Q. All right. And for Rambus, how many patents did Samsung receive rights to under the Rambus license?
A. I believe Rambus had -- I'm not sure of the exact number.
Q. Something like more than 2,000?
A. That -- yes, I believe so.

Q. So when we're out there shopping for leases, what is supposed to happen in the hypothetical negotiation is we look at what other landowners in the area are charging for their acreage. Right?
A. For leases? Yes, sure. Well, depending on the difference in the land. Some land is better hunting than others.
Q. Some people think they got the best in the whole world and some don't. But basically if you're in the same county, you're probably going to pay about the same for a lease. Right?
A. Yeah. With the hunting lease, I couldn't say. It would depend on whether it was swamp or timber or combination or crops.
Q. Well, one thing we know is that for your lease, your five-patent lease for only 1.5 years, it was only 404 million. Right?
A. Yes.
Q. For the JDLA lease, it was $8 million for five years for 87 patents. Right?
A. Yes. Again, the qualification of your identifying the engineering payment, not the other aspects of the agreement.
Q. Okay. But the cash payment made under the JDLA was $8 million. Right, sir?
A. Cash, yes.

Q. The cash payment under the hynix agreement was $40 million for 120 patents for five years. Right?
A. Correct.
Q. And the cash payment under Rambus for 2,000 patents for 13-plus years was between 690 and 1.1 billion. Right?
A. Correct.
MR. CORDELL: Your Honor, I'm afraid I have to seal the courtroom now, with your permission.
THE COURT: All right. Based on counsel's request and to protect confidential information, I'm going to order the courtroom sealed at this time.
If you're present and not subject to the protective order that's been entered in this case, you should excuse yourselves until the courtroom is reopened and unsealed.
(Courtroom sealed.)
THE COURT: All right. The courtroom is sealed as is this portion of the transcript. Let me know when we can return to an open session.
MR. CORDELL: Thank you, Your Honor.
Q. (BY MR. CORDELL) So, Mr. Kennedy, I'd like to show you JTX 48, which is the hynix agreement. Do you recognize this, sir?
A. Yes.
Q. And you understand that under this license agreement, hynix received rights to all of Netlist's patents in their