

EXHIBIT 3

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ARAM A. SINNREICH, PH.D.

UNITED STATES DISTRICT COURT
SOUTHERN DISTRICT OF NEW YORK

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ARISTA RECORDS LLC; ATLANTIC
RECORDING CORPORATION; ARISTA MUSIC, Civil Action No.
fka BMG MUSIC; CAPITOL RECORDS, INC.; 06 CV 5936(KMW)(DF)
ELEKTRA ENTERTAINMENT GROUP INC.;
INTERSCOPE RECORDS; LAFACE RECORDS LLC;
MOTOWN RECORD COMPANY, L.P.; PRIORITY
RECORDS LLC; SONY MUSIC ENTERTAINMENT,
fka SONY BMG MUSIC ENTERTAINMENT; UMG
RECORDINGS, INC.; VIRGIN RECORDS
AMERICA, INC.; and WARNER BROS.
RECORDS INC.,

Plaintiffs,

vs.

LIME GROUP LLC; LIME WIRE LLC; MARK
GORTON; GREG BILDSON; and M.J.G.
LIME WIRE FAMILY LIMITED PARTNERSHIP,

Defendants.

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CONTAINS CONFIDENTIAL PORTIONS

February 11, 2011

9 a.m.

Videotaped deposition of ARAM A.
SINNREICH, Ph.D., pursuant to subpoena, at the
offices of Cowan Liebowitz & Latman, 1133 Avenue
of the Americas, New York, New York, before
Nancy Mahoney, a Certified Court Reporter,
Registered Professional Reporter, Certified
LiveNote Reporter, and Notary Public within and
for the States of New York and New Jersey.

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1 ARAM A. SINNREICH, PH.D.
2 09:23:42 A. I can't tell you the exact number.
3 09:23:44 There are several courses in which political
4 09:23:46 economy was a methodology.
5 09:23:56 Q. So political economy, you're
6 09:23:58 saying, is a methodology?
7 09:24:00 A. Yes. It's a framework for
8 09:24:02 understanding the relationship between
9 09:24:06 institutions and other social elements.
10 09:24:20 Q. Okay. Do you think that -- so
11 09:24:22 you've taken several courses in which political
12 09:24:24 economy was a methodology. Did you take any
13 09:24:26 course in which political economy was the sole
14 09:24:30 focus of that course?
15 09:24:32 A. No.
16 09:24:32 Q. Have you taken any course ever in
17 09:24:36 which economics was the sole focus of that
18 09:24:36 course?
19 09:24:40 A. I don't believe so.
20 09:24:50 Q. Do you consider yourself qualified
21 09:24:52 as an economist?
22 09:24:54 A. No.
23 09:25:04 Q. Okay. And you don't have a degree
24 09:25:06 in statistics, correct?
25 09:25:08 A. No, although statistical

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1 ARAM A. SINNREICH, PH.D.
2 09:47:42 Those are -- in the past were very
3 09:47:44 difficult to quantify to any degree that would
4 09:47:46 allow you to make statistical analyses because
5 09:47:48 they would rely on the subjective analyses of
6 09:47:54 musicologists.
7 09:47:54 Today we have very interesting new
8 09:47:58 software that can actually provide much more
9 09:48:00 mathematical detail on the subject and thus, I
10 09:48:04 believe, will allow me to make a much more
11 09:48:06 statistically valid and detailed analysis of the
12 09:48:10 question than has been performed in the past.
13 09:48:12 Q. Okay. So tell me again why the
14 09:48:16 musicological properties of songs that are being
15 09:48:18 offered by the record labels has anything to do
16 09:48:22 with the effect of file sharing or LimeWire on
17 09:48:28 losses that the industry has sustained.
18 09:48:30 MR. OLLER: Object -- object to
19 09:48:32 form.
20 09:48:32 You can answer.
21 09:48:34 A. Well, I would say two things: One,
22 09:48:38 the scope of my report is a little broader than
23 09:48:42 the way that you just positioned it. So I would
24 09:48:44 say that it's more relevant to the broad scope
25 09:48:46 of my report. But even within the narrow

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1 ARAM A. SINNREICH, PH.D.
2 09:48:50 constraints of your question, I would say that
3 09:48:54 the consumer marketplace behaves according to
4 09:49:02 the range of options that's available to it.
5 09:49:06 And better understanding what the marketplace
6 09:49:08 looks like from a consumer's vantage point gives
7 09:49:12 me, as a researcher, a better understanding of
8 09:49:16 how the different actors in the marketplace
9 09:49:20 influence its dynamics.
10 09:49:24 MS. YOUNG: Can I have my question
11 09:49:26 read back again, please.
12 09:49:28 (Record read.)
13 09:49:48 Q. Do you have anything else you want
14 09:49:50 to add to your answer?
15 09:49:50 A. I don't think so.
16 09:49:56 Q. Okay. You're -- you said you're
17 09:49:58 also -- oh, I'm sorry -- at an academic
18 09:50:00 conference, you presented a network analysis of
19 09:50:04 the structure of payola.
20 09:50:06 A. That's correct.
21 09:50:06 Q. Okay. What was your analysis?
22 09:50:10 A. My finding was that, ironically,
23 09:50:16 the payola laws and other regulations that
24 09:50:18 prohibited the exchange of money and other
25 09:50:24 considerations for access to airtime produced

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1 ARAM A. SINNREICH, PH.D.
2 10:09:08 A. That's correct.
3 10:09:10 Q. Okay. Really quick, just to hit
4 10:09:12 some of the points in your CV and then we can
5 10:09:14 get more into the substance of the report.
6 10:09:18 A. Okay.
7 10:09:18 Q. So you're now teaching at Rutgers
8 10:09:22 and you're an associate professor there -- an
9 10:09:24 assistant professor, I'm sorry.
10 10:09:26 Are you -- are you tenured?
11 10:09:26 A. No.
12 10:09:28 Q. Are you on the tenure track?
13 10:09:30 A. Yes.
14 10:09:36 Q. Radar Research, you currently are
15 10:09:40 involved with Radar Research as a consultant?
16 10:09:44 A. And a co-owner, yes.
17 10:09:44 Q. Okay. And what percent of your
18 10:09:46 time is devoted to Radar versus teaching?
19 10:09:50 A. Well, obviously depends on the
20 10:09:52 month, but on the whole, about 20 percent is
21 10:09:58 Radar and 80 percent is my academic work.
22 10:10:00 Q. And this would be, say, over the
23 10:10:02 course of a year?
24 10:10:04 A. Yes.
25 10:10:06 Q. Okay. And what percent of income

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1 ARAM A. SINNREICH, PH.D.
2 10:49:12 A. No.
3 10:49:24 Q. Okay. Okay. Turn to Page 12. You
4 10:49:30 offer the opinion -- and this is in the heading
5 10:49:34 at Roman numeral III -- "Plaintiffs' losses
6 10:49:38 cannot be substantially attributed to LimeWire,"
7 10:49:44 right?
8 10:49:44 A. Yes.
9 10:49:44 Q. Has LimeWire caused any decline in
10 10:49:48 record label -- record label sales?
11 10:49:48 A. I -- I couldn't attest to the fact
12 10:49:52 that it has, no.
13 10:49:52 Q. Why not?
14 10:49:54 A. Well, the -- the -- first of all, I
15 10:49:58 haven't performed any research specifically
16 10:50:00 dedicated to LimeWire's market effects. This
17 10:50:04 is -- this report is all meta analysis of -- of
18 10:50:08 a range of research.
19 10:50:10 Second of all, the -- as I discuss
20 10:50:12 in the report, you know, there are a great many
21 10:50:18 credible research publications suggesting that
22 10:50:20 the role of file sharing in general is to
23 10:50:22 improve the market for recorded music. Although
24 10:50:26 there's other research that says -- has contrary
25 10:50:28 findings.

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1 ARAM A. SINNREICH, PH.D.
2 10:51:36 contributed to record label revenues by virtue
3 10:51:40 of a range of industry beneficial effects that I
4 10:51:46 outline in the report.
5 10:51:48 Q. Okay. Let me ask a perhaps
6 10:51:50 different question.
7 10:51:50 Is it your opinion that LimeWire
8 10:51:52 has had a net positive effect on total revenues
9 10:51:58 for the record labels?
10 10:51:58 A. Yes.
11 10:52:10 Q. And show me where in your report
12 10:52:12 you say that.
13 10:52:28 A. If you look under Roman numeral
14 10:52:34 III, capital B, small Roman numeral I, I talk
15 10:52:42 about the direct industry benefits of file
16 10:52:48 sharing.
17 10:52:48 Q. What page is that?
18 10:52:50 A. It begins on Page 27.
19 10:52:58 Q. Okay. Well, this is titled Sharing
20 10:53:00 Can Help Sales, Revenues and Profits, right?
21 10:53:02 A. That's true.
22 10:53:04 Q. Where does it say sharing through
23 10:53:06 LimeWire did help sales, revenues and profits?
24 10:53:10 MR. OLLER: Object to the form.
25 10:53:12 A. The -- the first paragraph says,

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2 10:53:14 "Although file sharing has presented strategic
3 10:53:16 and economic challenges to the music industry,
4 10:53:18 it has also delivered significant benefits, both
5 10:53:22 helping traditional record sales and opening new
6 10:53:24 avenues for economic exploitation."

7 10:53:26 Q. Okay. So where in the report do
8 10:53:30 you say that LimeWire had a net positive effect
9 10:53:32 on total record label revenues?

10 10:53:38 A. The report doesn't say that and I
11 10:53:40 can't conclude that conclusively, that LimeWire
12 10:53:44 itself had -- you asked me whether it was my
13 10:53:46 opinion.

14 10:53:46 My opinion is that it has, as
15 10:53:48 LimeWire's representative of file sharing more
16 10:53:50 broadly.

17 10:53:54 Q. Okay. But you cannot offer a
18 10:53:56 conclusion that LimeWire has had a net positive
19 10:54:00 effect on record label revenues?

20 10:54:02 MR. OLLER: Object to the form.

21 10:54:04 A. I don't have any data specifically
22 10:54:08 demonstrating the LimeWire's market effects. I
23 10:54:12 only have information about file sharing more
24 10:54:14 broadly.

25 10:54:14 So it's my opinion, based on the

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1 ARAM A. SINNREICH, PH.D.
2 10:54:16 fact that LimeWire's representative of a great
3 10:54:20 deal of file sharing behaviors and technologies,
4 10:54:24 that what is true of file sharing in general is
5 10:54:26 true of LimeWire specifically, but I cannot
6 10:54:30 conclusively demonstrate that.
7 10:54:32 Q. Can you conclusively demonstrate
8 10:54:34 that file sharing has had a net positive effect
9 10:54:38 on record label revenues?
10 10:54:42 A. No, I can't. But, as I say in my
11 10:54:46 report, there is a bulk of credible research,
12 10:54:50 some of it authored by me and some of it
13 10:54:52 authored by others, that concludes that that's
14 10:54:56 the case.
15 10:54:56 Q. What do you mean by bulk? Do you
16 10:55:02 mean that a majority, do you mean some, what do
17 10:55:04 you mean?
18 10:55:04 A. A majority of what?
19 10:55:08 Q. You say there's a bulk of credible
20 10:55:10 research.
21 10:55:10 A. Yes.
22 10:55:10 Q. Does that mean that the majority of
23 10:55:12 credible research comes out on the side that you
24 10:55:14 have come out on or does it mean that some group
25 10:55:18 has?

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1 ARAM A. SINNREICH, PH.D.
2 10:57:22 of the overall market effects of file sharing on
3 10:57:26 recorded music.
4 10:57:30 Q. Okay. And the ones that you picked
5 10:57:32 to highlight in your report are the ones that
6 10:57:36 have found some sort of positive correlation
7 10:57:38 between file sharing --
8 10:57:40 A. That's correct.
9 10:57:40 Q. -- and music sales, correct?
10 10:57:42 Did you list all of the studies
11 10:57:46 you're aware of that have reached a conclusion
12 10:57:48 that file sharing has some sort of positive
13 10:57:52 effect on record sales or revenue?
14 10:57:54 A. All the -- all the -- yes.
15 10:57:56 Q. Okay. Have you read each of these
16 10:57:58 studies yourself?
17 10:57:58 A. Yes.
18 10:57:58 Q. Have you considered the underlying
19 10:58:00 data on which each study relied?
20 10:58:02 A. No.
21 10:58:02 Q. And are the studies that you cite
22 10:58:04 here the most recent version of -- of the
23 10:58:08 studies?
24 10:58:12 A. To my knowledge, yes. I think
25 10:58:16 Oberholzer has published more recently, but it's

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1 ARAM A. SINNREICH, PH.D.
2 10:58:20 not a different version of the same study, to my
3 10:58:24 knowledge.
4 10:58:24 Q. Okay. So your understanding is
5 10:58:26 that the more recent publication of Oberholzer
6 10:58:28 that you're aware of doesn't relate to the study
7 10:58:32 you cite in your report?
8 10:58:38 A. I'm not exactly certain what the
9 10:58:40 conclusion of the most recent Oberholzer study
10 10:58:48 is.
11 10:58:48 Q. Okay. Would it be important to you
12 10:58:48 to know if any of the authors you cite have
13 10:58:52 altered their conclusions since the publications
14 10:58:54 you're citing here?
15 10:58:58 A. Only insofar as they -- that
16 10:59:02 alteration represents a different analysis of
17 10:59:06 the same data.
18 10:59:06 If, for instance, an author found
19 10:59:08 one effect in 2004 and a different effect in
20 10:59:12 2008, that wouldn't discredit the 2004 finding.
21 10:59:16 It would just update it.
22 10:59:22 Q. But if the authors were looking at
23 10:59:24 the very data that was the subject of the
24 10:59:24 publication you listed --
25 10:59:26 A. Yes.

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1 ARAM A. SINNREICH, PH.D.
2 10:59:26 Q. -- and altered their conclusion,
3 10:59:28 would that be important for you to know?
4 10:59:30 A. Yes, of course it would.
5 10:59:34 Q. Are the studies that you cite in
6 10:59:36 here all published?
7 10:59:42 A. Yes, but in different formats.
8 10:59:44 They're not all journal articles, for
9 instance --
10 Q. Are --
11 10:59:48 A. -- but they're all publicly
12 10:59:48 available.
13 10:59:50 Q. Are you citing the published
14 10:59:52 version of all of the studies that you reference
15 10:59:56 in Pages 28 through 30 of your report?
16 11:00:00 A. No. 62 and 63 footnotes, I
17 11:00:10 actually cite the articles about the reports
18 11:00:12 rather than the reports.
19 11:00:14 Q. Why did you do that?
20 11:00:18 A. While we were looking for
21 11:00:20 citations, I could not find the originals of
22 11:00:22 those reports.
23 11:00:24 Q. Have you read the originals of
24 11:00:26 those reports?
25 11:00:30 A. I don't remember whether I've read

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1 ARAM A. SINNREICH, PH.D.
2 11:00:32 those two reports or not. I -- I believe that I
3 11:00:38 read the Moya report, but I can't be certain.
4 11:00:44 Q. Other than the footnotes you
5 11:00:46 pointed out, are you citing the published
6 11:00:50 version of the studies that you referenced at
7 11:00:52 Pages 28 through 30 of your report?
8 11:00:54 A. I believe so, yes.
9 11:01:02 Q. Do you believe you're qualified to
10 11:01:04 assess the validity or reliability of the
11 11:01:06 statistical methodologies that were applied in
12 11:01:08 these studies?
13 11:01:12 A. Well, it depends on the individual
14 11:01:12 study, but to the extent that it falls within
15 11:01:14 the range of statistical methodologies we
16 11:01:16 discussed before, yes.
17 11:01:18 Q. Did you do anything to assess the
18 11:01:22 validity or reliability of the statistical
19 11:01:24 methodologies that these studies employed?
20 11:01:26 A. Other than reading the -- the
21 11:01:30 research and deciding whether or not it was --
22 11:01:36 looked relevant to me and -- and looked like it
23 11:01:40 was performed in a methodologically sound way,
24 11:01:42 no.
25 11:01:42 Q. Well, do you have an opinion as to

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1 ARAM A. SINNREICH, PH.D.
2 11:01:44 whether these -- these studies were performed in
3 11:01:48 a methodologically sound way?
4 11:01:50 A. I would not have included them if I
5 11:01:52 didn't believe that they were.
6 11:02:00 Q. Were you familiar with all of the
7 11:02:10 statistical methodologies that were used in all
8 11:02:12 of these studies?
9 11:02:12 A. No. Some of them involved complex
10 11:02:18 economic analyses that are beyond the scope of
11 11:02:20 my expertise.
12 11:02:20 Q. Tell me which ones.
13 11:02:24 A. Off the top of my head, I don't
14 11:02:26 remember which ones. Some of them are more
15 11:02:28 survey-based, some of them are more theoretical.
16 11:02:42 For instance, the Gopal one, I
17 11:02:46 believe, was more theoretical, possibly Peitz
18 11:02:56 and Waelbroeck, but I would have to look at the
19 11:03:00 studies to -- to render a more conclusive
20 11:03:06 opinion.
21 11:03:06 Q. Is it fair to say, though, that at
22 11:03:08 least some of these studies used statistical
23 11:03:10 methodologies that you are not qualified to
24 11:03:14 assess the reliability or validity of?
25 11:03:16 A. Yes.

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1 ARAM A. SINNREICH, PH.D.
2 11:03:22 Q. What about the studies that used
3 11:03:24 survey methodologies, do you feel qualified to
4 11:03:26 assess the validity or reliability of those
5 11:03:30 methodologies?
6 11:03:30 A. Yes.
7 11:03:34 Q. And what about the economic
8 11:03:38 analyses offered in these studies, do you feel
9 11:03:40 qualified to assess the validity or reliability
10 11:03:42 of that analysis?
11 11:03:44 A. Well, it depends on the study, but
12 11:03:46 in some cases, yes.
13 11:03:48 Q. And in some cases, no?
14 11:03:48 A. Yes, correct. In some cases, yes,
15 11:03:54 and in some cases, no.
16 11:03:56 Q. Okay. And do you purport to offer
17 11:03:58 an opinion about the relative merits of any of
18 11:04:02 these studies?
19 11:04:02 A. Not beyond the fact that I thought
20 11:04:06 they merited inclusion in the report.
21 11:04:10 Q. Well, what qualified for meriting
22 11:04:18 inclusion in your report?
23 11:04:18 A. Well, when you're a research
24 11:04:20 professional, you can -- you develop a sense of
25 11:04:22 whether individual pieces of research are -- are

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1 ARAM A. SINNREICH, PH.D.
2 11:04:28 written in a -- using methodologies that are
3 11:04:32 supportable, written by people who understand
4 11:04:36 what they're doing and what they're talking
5 11:04:38 about and published in venues that -- that have
6 11:04:42 reputations for methodological rigor.
7 11:04:48 Q. Okay. So one criterion is what
8 11:04:50 publication?
9 11:04:50 A. Yep.
10 11:04:52 Q. You said another -- another
11 11:04:54 criteria would be who the author is?
12 11:04:56 A. Yes.
13 11:04:58 Q. Okay. And can you elaborate on
14 11:05:00 that?
15 11:05:00 A. Well, authors who are either in
16 11:05:06 academic positions or who work for known private
17 11:05:12 research firms are part of institutions that
18 11:05:14 have certain standards that lend them a halo
19 11:05:18 of -- of, you know, confidence.
20 11:05:28 Q. And by academic positions, are you
21 11:05:30 talking about people who are professors and --
22 11:05:34 A. Professors or post-doctoral
23 11:05:36 researchers or people who have the oversight and
24 11:05:38 the reputation of the departments that they're
25 11:05:42 affiliated with, yes.

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1 ARAM A. SINNREICH, PH.D.
2 11:06:54 A. Sociological Quarterly,
3 11:06:58 International Journal of Communication, Journal
4 11:07:02 of Communication, American Quarterly. Maybe two
5 11:07:10 or three others.
6 11:07:10 I mean, what happens is typically
7 11:07:12 you'll just get a request via email or less
8 11:07:18 often by phone from a journal saying, we have an
9 11:07:22 article that falls within your bailiwick, we'd
10 11:07:24 like you to take a look at it and do some peer
11 11:07:28 review.
12 11:07:28 So, off the top of my head, those
13 11:07:30 are the journals I can think of -- oh, also
14 11:07:32 University of Massachusetts Press, which was the
15 11:07:34 publisher of my book. I peer reviewed another
16 11:07:38 book manuscript for them. But there are
17 11:07:40 probably two or three others that I didn't name.
18 11:07:44 Q. Okay. Okay. So you acknowledge
19 11:07:50 that there are studies that have come out the
20 11:07:52 other way, finding that there's a negative or
21 11:07:56 neutral effect of file sharing on music sales,
22 11:08:00 correct?
23 11:08:00 A. Yes.
24 11:08:00 Q. Okay. How many studies are you
25 11:08:02 aware of that find a negative effect of file

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1 ARAM A. SINNREICH, PH.D.
2 11:08:04 sharing on music sales or revenues?
3 11:08:06 A. Somewhere on the order of ten, you
4 11:08:10 know, on par with the ones that I cited in terms
5 11:08:14 of the general, you know, site of -- location of
6 11:08:16 publication or position of -- of the authors.
7 11:08:22 Q. And have you read all those
8 11:08:24 studies?
9 11:08:24 A. No.
10 11:08:30 Q. Why not?
11 11:08:32 A. I've had limited time, and my role,
12 11:08:38 as I understand it, in preparing this report was
13 11:08:40 to say whether there was credible evidence that
14 11:08:44 file sharing had beneficial market effects.
15 11:08:46 Q. So you didn't take the time to
16 11:08:48 examine the evidence on the other side?
17 11:08:50 A. I'm --
18 11:08:50 MR. OLLER: Object to the form.
19 11:08:52 A. I'm willing to accept that there is
20 11:08:54 credible evidence on the other side, and so I
21 11:08:56 did not take the time to examine it.
22 11:09:02 Q. You say, "It's neither my role nor
23 11:09:04 my intention to dispute these findings," at
24 11:09:08 Page 30.
25 11:09:10 What findings are you referring to

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1 ARAM A. SINNREICH, PH.D.

2 11:31:04 Q. Did you personally, in preparing
3 11:31:06 this report, set out to analyze empirically the
4 11:31:10 effect that these different factors have?

5 11:31:12 A. No.

6 11:31:12 Q. Okay. Did you, in preparing this
7 11:31:14 report, attempt to quantify the magnitude of the
8 11:31:16 effect of these factors?

9 11:31:18 A. No.

10 11:31:22 Q. Okay. Do you have any idea
11 11:31:24 quantitatively what effect each of these factors
12 11:31:28 had in, as you say, contributing to declining
13 11:31:32 music sales and revenues?

14 11:31:32 MR. OLLER: Object to the form.

15 11:31:34 A. It would be difficult, for reasons
16 11:31:36 that we've already discussed, to discretely
17 11:31:38 attribute a percentage of the effect to any
18 11:31:44 single given factor because there are many
19 11:31:46 interaction effects between the factors.

20 11:31:48 For instance, the recession
21 11:31:50 influences the market for brick and mortar
22 11:31:54 retail, and so on and so forth.

23 11:31:56 Q. Well, did you attempt to quantify
24 11:31:58 the effect of the factors in combination on
25 11:32:04 declining music sales and revenues?

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1 ARAM A. SINNREICH, PH.D.
2 11:32:06 A. No.
3 11:32:10 Q. Okay. And I want to go through
4 11:32:12 each of these factors a little bit more and talk
5 11:32:16 about -- talk about them.
6 11:32:20 All right. Changing Consumer
7 11:32:22 Psychology and Market Expectations. You say
8 11:32:24 that -- this is on Page 14 toward the bottom --
9 11:32:28 "Digital music provided music fans with an
10 11:32:30 unprecedented degree of choice over their
11 11:32:34 consumption habits, control over their music
12 11:32:36 listening experiences, volume of content to
13 11:32:38 choose from and portability in their music
14 11:32:42 listening venues," correct?
15 11:32:44 A. Correct.
16 11:32:46 Q. Shouldn't that make digital music
17 11:32:48 more, and not less, valuable to consumers?
18 11:32:50 A. Well, it depends on your measure of
19 11:32:52 value. It makes it more valuable to consumers
20 11:32:56 in terms of the total amount of time and
21 11:33:00 attention that they're devoting towards
22 11:33:02 listening to music.
23 11:33:04 It's also making them probably
24 11:33:10 invest in a lot of music technologies that can
25 11:33:14 be used to access music with -- with portions of

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1 ARAM A. SINNREICH, PH.D.
2 11:33:20 wallet share.
3 11:33:20 So if you measure value in that
4 11:33:22 kind of broader holistic sense, yes. If you're
5 11:33:26 asking about value purely as represented through
6 11:33:28 the retail market, no, because it's not an
7 11:33:30 accurate barometer of consumer sentiment.
8 11:33:34 Q. And why is that?
9 11:33:36 A. Because, as I describe in the
10 11:33:38 report, the labels and other industry players
11 11:33:42 have not been -- have not effectively and
12 11:33:48 rapidly accommodated their business models and
13 11:33:52 distribution models to the changing needs of
14 11:33:54 the -- of the marketplace.
15 11:33:58 Q. Could another reason that the
16 11:33:58 market is not an accurate barometer of consumer
17 11:34:04 sentiment be that many consumers are acquiring
18 11:34:06 their music for free so that's not picked up on
19 11:34:10 the radar?
20 11:34:12 A. Certainly many consumers are
21 11:34:12 acquiring their music for free, but there's
22 11:34:16 little question that they continue to spend a
23 11:34:20 significant amount of their wallet share on
24 11:34:22 music and music related products and services.
25 11:34:24 Q. But is one of the reasons why the

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1 ARAM A. SINNREICH, PH.D.
2 11:34:24 market might not be an accurate barometer of
3 11:34:28 consumer sentiment, that some consumers are
4 11:34:30 choosing to spend -- choosing not to spend their
5 11:34:32 dollars and instead just getting the music for
6 11:34:34 free?
7 11:34:34 A. Some consumers, yes.
8 11:34:36 Q. You also say -- I'm now on Page 15
9 11:34:44 at the bottom of the section -- "The labels
10 11:34:46 themselves are to blame for taking a decade to
11 11:34:50 absorb the significance of this shift in market
12 11:34:52 demand."
13 11:34:54 Why are you saying it took a
14 11:34:54 decade?
15 11:34:56 A. Sorry. I -- I don't see the
16 11:34:58 sentence.
17 11:34:58 Q. It's at the very end of this
18 11:35:00 section, right above B.
19 11:35:04 A. Yes.
20 11:35:04 Q. Do you see where I am?
21 11:35:06 A. Yes. Okay.
22 11:35:10 So the question is: Why do I say a
23 11:35:12 decade?
24 11:35:14 Q. Yeah, why do you say it took a
25 11:35:16 decade for the labels to absorb the significance

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1 ARAM A. SINNREICH, PH.D.
2 11:35:18 of this shift in market demand and for failing
3 11:35:22 to accommodate it sooner?
4 11:35:22 A. Well, the shift began at least as
5 11:35:24 early as 1999 with the introduction of Napster
6 11:35:28 into the marketplace. And as recently as 2010,
7 11:35:30 public filings by -- by major record labels have
8 11:35:34 acknowledged that they've been slow to react to
9 11:35:36 changes in -- in the market.
10 11:35:38 Q. And so that's what you're referring
11 11:35:40 to when you say it took a decade to absorb
12 the --
13 A. Well, that's --
14 11:35:44 Q. -- significance of that shift?
15 11:35:44 A. -- one of the many indicators that
16 11:35:48 that's the case.
17 11:35:50 I mean, it was not until 2007, for
18 11:35:52 instance, eight years after the introduction of
19 11:35:54 Napster into the marketplace, that the major
20 11:35:56 labels allowed non-DRM encrypted music to be
21 11:36:02 sold through retailers. That's eight years,
22 11:36:04 that's nearly a decade, despite the fact that
23 11:36:06 there was abundant evidence of consumer demand
24 11:36:10 for that product early on.
25 11:36:12 Q. Yeah, we're going to talk about

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1 ARAM A. SINNREICH, PH.D.
2 11:36:12 that in a minute.
3 11:36:14 What year did record labels first
4 11:36:16 start offering services, digital music services
5 11:36:20 on the Internet?
6 11:36:20 A. Well, it depends on your definition
7 11:36:22 of digital music services, but it was roughly
8 11:36:28 2000 when the labels started to invest a
9 11:36:34 significant amount of effort in developing
10 11:36:36 digital strategies.
11 11:36:38 Q. And when was iTunes introduced?
12 11:36:42 A. 2001, I believe.
13 11:36:42 Q. What about subscription services,
14 11:36:46 when were they introduced, the subscription
15 11:36:48 services that the labels licensed, when were
16 11:36:50 they introduced?
17 11:36:52 A. 2001, maybe.
18 11:36:54 Q. And iTunes has been successful in
19 11:36:56 selling downloads on the Internet, correct?
20 11:36:58 A. Well, it depends on your definition
21 11:37:00 of success. I mean, they have been unsuccessful
22 11:37:02 at selling enough downloads to replace revenue
23 11:37:06 lost by CDs, largely, as I discuss in my report,
24 11:37:10 because it's a singles market as opposed to a
25 11:37:14 bundled market. And they've -- at the moment

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1 ARAM A. SINNREICH, PH.D.
2 11:37:18 they've been very successful in terms of market
3 11:37:20 share, but their sales volume is -- is leveling
4 11:37:24 off, so they haven't been successful in taking
5 11:37:26 that early success and translating it to a
6 11:37:30 consistently growing market.
7 11:37:30 Q. Were -- let me ask you: Were there
8 11:37:32 significant sales of downloads before iTunes
9 11:37:34 opened?
10 11:37:36 A. No, not major label downloads.
11 11:37:40 MR. OLLER: Counsel, we -- we
12 11:37:42 can -- we can correct this later. I'm happy
13 11:37:44 to -- I think it's undisputed and the record
14 11:37:48 shows iTunes started in 2003, but I just throw
15 11:37:52 that out.
16 11:37:52 THE WITNESS: No, I don't think
17 11:37:54 that's the case.
18 11:37:56 MR. OLLER: iTunes, Apple iTunes?
19 11:37:58 THE WITNESS: Yeah. Well, there --
20 11:38:00 there's several things called iTunes. There's
21 11:38:00 iTunes software, there's the iTunes music store
22 11:38:02 which started later, yeah.
23 11:38:04 Q. Okay.
24 11:38:04 MR. OLLER: I didn't know what you
25 11:38:06 were asking about.

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1 ARAM A. SINNREICH, PH.D.
2 11:38:06 Q. So when did the iTunes music store
3 11:38:10 start?
4 11:38:10 A. Yeah, I think that's 2003. That
5 11:38:12 sounds about right.
6 11:38:12 Q. And when you said iTunes started in
7 11:38:14 2001, what were you referring to?
8 11:38:16 A. I was thinking about the market
9 11:38:18 introduction of the iPod, actually. That was a
10 11:38:20 misstatement by me.
11 11:38:22 Q. Okay. So iPod came first in 2001?
12 11:38:24 A. Yes, that's correct.
13 11:38:26 Q. And then came iTunes in 2003?
14 11:38:30 A. Yes.
15 11:38:32 Q. Okay. Okay. Factor number 2 on
16 11:38:34 your list is an increase in small scale
17 11:38:36 commercial CD bootlegging, correct?
18 11:38:38 A. Yes.
19 11:38:38 Q. And you say that this has been
20 11:38:40 analyzed empirically by the plaintiffs?
21 11:38:42 A. That's correct.
22 11:38:44 Q. And what are you referring to?
23 11:38:46 A. By representatives of the
24 plaintiffs.
25 Q. Okay.

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1 ARAM A. SINNREICH, PH.D.
2 11:38:46 A. I'm referring -- I'm referring to
3 11:38:46 the IFPI music piracy report from June 2002 that
4 11:38:54 I cite in the footnote.
5 11:38:54 Q. Okay. And did you rely on any
6 11:38:56 other source in offering empirical support for
7 11:39:00 your conclusions expressed in the section on
8 11:39:02 small scale of commercial CD bootlegging?
9 11:39:06 A. No, although it's a subject that
10 11:39:10 I've continued to read trade articles about over
11 11:39:12 the years. So this was not my first
12 11:39:14 introduction to the subject --
13 Q. Got it.
14 11:39:16 A. -- but this was the only empirical
15 11:39:18 evidence that I leveraged in writing the report.
16 11:39:22 Q. You say, "Pirate CD-R sales had
17 11:39:26 tripled in the course of a single year to 450
18 11:39:28 million units."
19 11:39:30 A. Yes.
20 11:39:30 Q. What year was that?
21 11:39:32 A. 2001, I believe.
22 11:39:34 Q. Okay. And what were pirate CD-R
23 11:39:36 sales doing before 2001?
24 11:39:38 A. They were one-third the size.
25 11:39:40 Q. And did you look at what they were

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1 ARAM A. SINNREICH, PH.D.
2 11:39:42 doing in 1999?
3 11:39:48 A. I didn't really need to because
4 11:39:50 CD-Rs were not massively penetrated in the
5 11:39:54 marketplace until the end of the '90s.
6 11:39:56 Q. Okay. Did you look at what
7 11:39:58 happened to CD-R -- pirate CD-R sales after
8 11:40:00 2001?
9 11:40:02 A. Well, they continue to be mentioned
10 11:40:04 in RIAA and IFPI publications from time to time.
11 11:40:08 And, as I say, there continue to be trade
12 11:40:10 stories about it, especially globally speaking.
13 11:40:12 So there are certain markets like
14 11:40:16 China, for instance, where it's considered to be
15 11:40:18 a rampant problem.
16 11:40:20 Q. But did you do anything to look at
17 11:40:22 the empirical data about what happened after
18 11:40:26 2001 in terms of pirate CD-R sales?
19 11:40:30 A. No, that was the last empirical
20 11:40:30 data that I -- that I used for my report.
21 11:40:30 Q. Okay. And the IFPI data, what
22 11:40:34 geographic area does it cover?
23 11:40:34 A. I believe it was global.
24 11:40:36 Q. Okay. So 4 -- 450 million units is
25 11:40:38 a number of pirate CD-R sales globally, correct?

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1 ARAM A. SINNREICH, PH.D.
2 11:40:42 A. In 2001 or '2, yes.
3 11:40:44 Q. That's a global number?
4 11:40:46 A. Yes.
5 11:40:46 Q. Okay. Do you know what the numbers
6 11:40:48 in the U.S. were at that time?
7 11:40:50 A. I don't.
8 11:40:50 Q. Did you attempt to determine what
9 11:40:52 they were in preparing your report?
10 11:40:54 A. No.
11 11:40:56 Q. Would that have been relevant to
12 11:40:56 your analysis?
13 11:40:58 A. Yes, but it's a question of limited
14 11:41:00 time and scope. I could certainly -- if -- if
15 11:41:04 the primary subject of my analysis had been the
16 11:41:08 pirate CD-R market, I would have devoted more
17 11:41:12 time and attention to it.
18 11:41:14 Q. And do you know if pirate CD-R
19 11:41:16 sales are more prevalent in areas abroad than
20 11:41:20 they are in the United States?
21 11:41:20 A. I -- I think certain markets they
22 11:41:22 are, yes.
23 11:41:22 Q. And did you attempt to quantify the
24 11:41:28 extent to which pirate CD sales contributed to
25 11:41:30 the decline in revenues?

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1 ARAM A. SINNREICH, PH.D.
2 11:41:32 A. No.
3 11:41:32 Q. Are you aware of how many songs
4 11:41:34 were downloaded over peer-to-peer networks
5 11:41:36 compared to the number of pirate CD sales?
6 11:41:40 A. No.
7 11:41:42 Q. Do you know how many songs were
8 11:41:44 downloaded over LimeWire during the time period
9 11:41:46 of its existence?
10 A. No.
11 11:41:48 Q. Would that have been relevant to
12 11:41:48 your analysis?
13 11:41:50 A. Broadly speaking, yes.
14 11:41:50 Q. Did you ask to get those numbers
15 11:41:52 from LimeWire?
16 11:41:54 A. No.
17 11:41:54 Q. Did you do anything to try and
18 11:41:56 determine what those numbers were?
19 11:41:58 A. Yes.
20 11:41:58 Q. What did you do?
21 11:42:00 A. I looked at publicly reported data
22 11:42:04 from -- and descriptions of data from Big
23 11:42:10 Champagne, which is a third-party research
24 11:42:12 organization that looks at file sharing
25 11:42:14 networks.

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1 ARAM A. SINNREICH, PH.D.
2 11:42:14 Q. And based on your research, what do
3 11:42:18 you understand the -- the number of songs that
4 11:42:18 were downloaded over LimeWire to be?
5 11:42:20 A. I don't know.
6 11:42:24 Q. Okay. You mention, factor
7 11:42:28 number 3, the widespread economic recession.
8 11:42:30 This is on Page 16.
9 11:42:34 Did you make any attempt to
10 11:42:36 determine the magnitude that the effect of
11 11:42:38 either or both -- either or both of the
12 11:42:40 recessions you mentioned had on music sales in
13 11:42:44 the United States?
14 11:42:46 A. You mean a direct causal
15 11:42:50 relationship between the recession and the size
16 11:42:52 of the -- of the hit that the music market took?
17 11:42:54 Q. Correct.
18 11:42:54 A. No.
19 11:42:54 Q. Are you aware of any studies that
20 11:42:58 have analyzed that issue?
21 11:43:00 A. No. It's a good subject, though,
22 11:43:02 for a piece of research.
23 11:43:12 MS. YOUNG: We have just a few
24 11:43:14 minutes left on the tape, so why don't we stop
25 11:43:16 quickly so it can be changed.

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1 ARAM A. SINNREICH, PH.D.
2 12:08:42 reading market research.
3 12:08:42 Q. Okay. So you cite your own
4 12:08:44 experience?
5 12:08:46 A. Yes.
6 12:08:46 Q. And then you cite other research.
7 12:08:48 I want you to tell me what research that is.
8 12:08:52 A. Well, published reports by Jupiter,
9 12:08:54 Forester, Gartner, IVC, NPD, Pew, there -- there
10 12:09:02 are -- Yankee Group. There are many, many being
11 12:09:06 many different providers of market information
12 12:09:12 that quantify through surveys and through other
13 12:09:16 forms of analysis how consumer expenditures
14 12:09:20 shift from -- from one channel to another over
15 12:09:30 time.
16 12:09:30 Q. Okay. Are you attempting to
17 12:09:32 quantify how much money was substituted by --
18 12:09:34 let me rephrase that.
19 12:09:36 Are you attempting to quantify how
20 12:09:40 much money people were spending on other forms
21 12:09:40 of entertainment that they might otherwise have
22 12:09:44 spent on music?
23 12:09:46 A. No.
24 12:09:46 Q. And are you offering an opinion
25 12:09:48 about how much of the decline in music sales is

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1 ARAM A. SINNREICH, PH.D.
2 12:09:52 attributable to competition from other forms of
3 12:09:54 entertainment?
4 12:09:54 A. No.
5 12:09:54 Q. Do you think that can be measured?
6 12:09:58 A. No.
7 12:09:58 Q. Why not?
8 12:09:58 A. For the reasons that we've talked
9 12:10:02 about a few times during this deposition, which
10 12:10:04 is that the many different factors don't operate
11 12:10:08 discretely, but in confluence with one another.
12 12:10:10 Q. What factors operate in confluence
13 12:10:14 with this particular factor that we're talking
14 12:10:16 about now?
15 12:10:18 A. Well, the recession obviously has
16 12:10:20 an influence on overall consumer spending, and
17 12:10:24 it also causes consumers to reprioritize their
18 12:10:26 discretionary spending. The success or failure
19 12:10:30 of the retailers in the marketplace influences
20 12:10:32 the availability, price points and consumer
21 12:10:36 knowledge of and interest in the products.
22 12:10:42 The -- obviously the CD format cycle and end of
23 12:10:46 MAP pricing are both -- and unbundling are very
24 12:10:48 music specific, so those don't have as many
25 12:10:50 interaction effects -- although, you know, to a

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1 ARAM A. SINNREICH, PH.D.
2 12:15:16 So you're saying there's no doubt
3 12:15:18 that the availability of illegal music online
4 12:15:22 contributed to the bankruptcy of music retailers
5 12:15:24 and decline in shelf -- in shelf space?
6 12:15:30 A. Yes, I believe that it was one of
7 12:15:32 many factors contributing.
8 12:15:44 Q. Okay. Okay. I want to get back to
9 12:15:48 the minimum advertised pricing, but I'll just
10 12:15:50 take your factors in order and I'll follow up on
11 12:15:52 some of the things you mentioned there.
12 12:15:52 A. Okay.
13 12:15:54 Q. Okay. Your next factor on this
14 12:15:56 list is the maturation of the CD format and the
15 12:15:58 end of the replacement cycle. And just can you
16 12:16:02 briefly summarize what you mean here?
17 12:16:04 A. Sure.
18 12:16:06 When CDs became broadly distributed
19 12:16:12 technology around the beginning of the 1990s, a
20 12:16:16 great many people who already owned songs in LP
21 12:16:18 or cassette format bought those same songs or
22 12:16:20 albums in CD format, partially because of the
23 12:16:24 convenience and partially because of the
24 12:16:26 attendant hype surrounding the higher audio
25 12:16:30 quality that CDs had.

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1 ARAM A. SINNREICH, PH.D.
2 12:18:28 relevant format to consumers overall.
3 12:18:30 So the -- the bulk of new releases
4 12:18:38 were becoming available either primarily or
5 12:18:42 entirely in CD format, meaning there was no
6 12:18:44 requirement that they be replaced by a CD.
7 12:18:48 Also, exacerbating that was the --
8 12:18:56 the de-emphasis on non-CD formats in -- in
9 12:18:58 retail environments. So there was essentially a
10 12:19:00 whole -- a decade-long ascension of CD to the
11 12:19:04 dominant format, and by the time that was done,
12 12:19:12 more or less all of the replacing that was going
13 12:19:14 to happen had happened and there wasn't a lot
14 12:19:16 left to be done.
15 12:19:16 Q. Okay. For that last statement, all
16 12:19:18 of the replacing that was going to have happened
17 12:19:20 had happened --
18 12:19:22 A. Right.
19 12:19:22 Q. -- what empirical evidence do you
20 12:19:26 have about when that point was reached?
21 12:19:28 A. I don't have a -- I didn't cite a
22 12:19:32 specific point because I don't have empirical
23 12:19:36 evidence regarding that specific point.
24 12:19:36 I mean, this is a trend, not a -- a
25 12:19:40 discrete event encapsulated at a specific moment

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1 ARAM A. SINNREICH, PH.D.
2 12:19:46 of time. So if you think of it as a -- as -- I
3 12:19:48 think I describe it as a cycle, the reason it's
4 12:19:50 described as a cycle, it begins, it reach is its
5 12:19:54 apogee and then -- then it ends.
6 12:19:56 Q. Okay. Are you aware of any
7 12:19:56 academic literature that attempts to gauge the
8 12:20:00 impact of the replacement phenomenon on record
9 12:20:04 sales?
10 12:20:04 A. Yes. I've seen academic literature
11 12:20:08 on the subjects.
12 12:20:08 Q. What have you seen?
13 12:20:10 A. I couldn't cite titles or authors
14 12:20:12 off the top of my head.
15 12:20:14 Q. Did you review that literature in
16 12:20:16 connection with preparing this report?
17 12:20:20 A. No. I think I would have cited it
18 12:20:22 if I had.
19 12:20:22 Q. Do you know what that literature
20 12:20:24 has concluded?
21 12:20:26 A. Yeah, I think it supports the
22 12:20:28 consensus opinion that -- that there was a CD
23 12:20:32 replacement cycle that began in the late '80s or
24 12:20:36 early '90s and lasted until the end of the '90s.
25 12:20:38 Q. Are you aware of any academic

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1 ARAM A. SINNREICH, PH.D.
2 12:20:40 literature that reaches the opposite
3 12:20:42 conclusion --
4 12:20:42 A. No.
5 12:20:44 Q. -- that there was no -- I'm sorry.
6 12:21:12 So what kind of music was being
7 12:21:14 replaced by CDs?
8 12:21:16 A. Everything that was being made
9 12:21:18 available on CD that had previously been made
10 12:21:22 available on other formats.
11 12:21:24 Q. I think you said earlier, though,
12 12:21:24 for the most part, new releases weren't being
13 12:21:28 replaced because if you just wanted a new
14 12:21:30 release, you'd go get it on CD, you wouldn't buy
15 12:21:34 the cassette or the LP?
16 12:21:34 A. Correct.
17 12:21:36 Q. So, again, are you offering any
18 12:21:40 opinion about how much of the decline in music
19 12:21:42 sales is attributable to this replacement -- the
20 12:21:44 end of the replacement cycle?
21 12:21:46 A. No, I don't think that's a
22 12:21:48 quantifiable figure.
23 12:21:54 Q. All right. You've mentioned
24 12:21:56 minimum advertised pricing a couple of times, so
25 12:21:58 let's talk about that.

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1 ARAM A. SINNREICH, PH.D.
2 12:22:04 Do you know for how many years
3 12:22:06 minimum advertised pricing was used to price CDs
4 12:22:10 in the United States?
5 12:22:10 A. No.
6 12:22:10 Q. Do you know roughly what time
7 12:22:12 period minimum advertised pricing was used for?
8 12:22:16 A. I'm not sure.
9 12:22:20 Q. Have you considered whether record
10 12:22:24 label revenues increased and to what extent when
11 12:22:28 MAP was introduced?
12 12:22:30 A. Yes. I know that MAP was standard
13 12:22:32 practice throughout the 1990s, which was a
14 12:22:38 period of time during which the value of the
15 12:22:40 retail industry increased considerably.
16 12:22:44 Q. Okay. You said it was standard
17 12:22:44 practice in industry through the 1990s. Can you
18 12:22:48 be more specific about the time period in which
19 12:22:52 you believe it was standard practice for MAP?
20 12:22:54 A. I think throughout the entire
21 12:22:56 1990s, it was standard practice, but I don't
22 12:23:00 know specific dates.
23 12:23:06 Q. Do you know what the MAP price was?
24 12:23:12 A. Not off the top of my head,
25 12:23:14 although I've seen the figure, so a wholesale

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1 ARAM A. SINNREICH, PH.D.
2 12:23:20 price in the range of maybe -- well, the MAP
3 12:23:22 price wasn't wholesale, it was retail -- I think
4 12:23:26 it was in the range of \$15, but I don't remember
5 12:23:28 the exact figure.
6 12:23:30 Q. And where did you see that figure,
7 12:23:32 where is -- where is that from?
8 12:23:36 A. I've read many articles about MAP
9 12:23:38 pricing over the years. You know, most of them
10 12:23:40 I haven't read since the end of MAP pricing a
11 12:23:44 decade ago, which is why my memory is not as
12 12:23:46 clear as it would be if it were more recent.
13 12:23:48 Q. Okay. So you say here, starting at
14 12:24:02 Page 18 and going over to Page 19 --
15 12:24:06 A. Yes.
16 12:24:06 Q. -- "Given that many music retailers
17 12:24:10 immediately reduced prices from the \$15 range to
18 12:24:14 the \$10 range following the end of MAP pricing
19 12:24:18 in 2000, it is likely that this is a significant
20 12:24:20 contributory factor in market devaluation."
21 12:24:20 A. Yes.
22 12:24:22 Q. So what's your basis for saying
23 12:24:24 that prices were reduced from 15 to 10 dollars?
24 12:24:28 A. There are several bases. One, I've
25 12:24:32 seen figures -- although I couldn't find them

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1 ARAM A. SINNREICH, PH.D.
2 12:24:36 when I was writing this, so I didn't cite
3 12:24:38 them -- showing the average retail price of new
4 12:24:40 CDs during the time period and price comes down
5 12:24:44 from roughly the \$15 range to the -- roughly the
6 12:24:46 \$10 range.
7 12:24:48 Second of all, during this period
8 12:24:50 of time, while I was employed at Jupiter, I -- I
9 12:24:56 was in frequent contact with retailers and NARM,
10 12:25:00 which is the music retailer trade organization,
11 12:25:04 in fact, keynoted the NARM industry conference
12 12:25:08 in, I think, both 2001 and 2002, if I'm not
13 12:25:12 mistaken, maybe it was 2000, 2001, but for
14 12:25:16 two -- two consecutive years, so I was exposed
15 12:25:18 on an ongoing basis to the concerns about --
16 12:25:20 about pricing from the retail sector.
17 12:25:24 Q. Okay.
18 12:25:26 MR. OLLER: Can I just wait for ten
19 12:25:30 seconds to get him some water.
20 12:25:32 THE WITNESS: Thank you.
21 (Discussion held off the record.)
22 12:26:04 BY MS. YOUNG:
23 12:26:04 Q. So you say many music retailers
24 12:26:08 immediately reduced their prices when MAP
25 12:26:10 pricing ended.

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1 ARAM A. SINNREICH, PH.D.
2 12:26:12 How many retailers?
3 12:26:14 A. I don't know off the top of my
4 12:26:16 head.
5 12:26:16 Q. Do you know roughly what percentage
6 12:26:18 of retailers reduced their prices immediately?
7 12:26:20 A. Well, I know that the big box
8 12:26:22 retailers who accounted for a -- at that time
9 12:26:30 probably a plurality of brick and mortar CD
10 12:26:34 sales reduced their prices instantaneously after
11 12:26:42 that -- that ruling came down.
12 12:26:44 Q. And after -- okay. What ruling are
13 12:26:46 you referring to?
14 12:26:46 A. The -- the settlement in the MAP
15 12:26:52 pricing investigation.
16 12:26:56 Q. Okay. And what's your basis for
17 12:26:58 saying that the -- the big box retailers
18 12:27:02 immediately reduced their prices?
19 12:27:04 A. Again, I was in contact with the
20 12:27:08 retailers at the time. The head of the retailer
21 12:27:12 trade organization was somebody I spoke to on an
22 12:27:16 ongoing basis. I was paying attention to the
23 12:27:18 marketplace. There were many articles written
24 12:27:22 about it, some of which I was probably quoted
25 12:27:24 in. It was -- it was a matter of common

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1 ARAM A. SINNREICH, PH.D.
2 12:27:26 knowledge within the music industry.
3 12:27:30 Q. Have you heard of the term
4 12:27:34 "elasticity"?
5 12:27:36 A. Yes, but I couldn't define it for
6 12:27:38 you.
7 12:27:50 Q. Okay. So what empirical evidence
8 12:27:54 do you have that because of reductions in prices
9 12:27:58 as a result of the end of MAP, revenues
10 12:28:00 decreased?
11 12:28:06 A. Well, it's a matter of standard
12 12:28:08 logic.
13 12:28:08 Q. Explain that logic to me.
14 12:28:10 A. Well, if -- if the -- if the price
15 12:28:14 point for a product is \$15 and a hundred people
16 12:28:20 buy that product, the retail value of those
17 12:28:24 exchanges will be \$1,500; if the product is
18 12:28:30 priced at \$10, then the retail value of those
19 12:28:34 exchanges will be \$1,000.
20 12:28:36 Q. If the same 100 people buy the
21 12:28:38 product?
22 12:28:38 A. If the same 100 people buy the
23 12:28:40 product, absolutely.
24 12:28:42 Q. Would you agree with me that some
25 12:28:42 people might be more willing to buy a product

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1 ARAM A. SINNREICH, PH.D.
2 13:17:12 Are you familiar with the use of
3 13:17:15 instruments in statistical analysis?
4 13:17:18 A. Statistical instruments?
5 13:17:20 Q. Yes.
6 13:17:20 A. Well, yeah, broadly speaking.
7 13:17:22 Q. Well, what do you understand me to
8 13:17:24 mean when I use the term "instrument"?
9 13:17:26 A. Well, a -- any method of obtaining
10 13:17:29 data or of analyzing data can be considered a
11 13:17:34 statistical instrument.
12 13:17:35 Q. Okay. Do you know what the term
13 13:17:37 "instrument" means in a statistical analysis?
14 13:17:39 A. I -- I don't think I know what --
15 13:17:43 the usage of the term you're talking about, no.
16 13:17:45 Q. Are you aware of studies that use
17 13:17:47 things called instruments as part of their
18 13:17:50 statistical methodology?
19 13:17:52 A. No.
20 13:17:59 Q. Okay. Okay. Another factor that
21 13:18:01 you identify as having contributed to the
22 13:18:04 decline of the record industry is unbundling
23 13:18:08 songs.
24 13:18:09 A. Yes.
25 13:18:12 Q. Have you ever heard of the term "a

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1 ARAM A. SINNREICH, PH.D.
2 13:18:15 mixed bundled"?
3 13:18:16 A. Yes.
4 13:18:16 Q. What does that refer to?
5 13:18:17 A. I couldn't define it for you.
6 13:18:19 Q. Have you ever heard of the term
7 13:18:21 "pure bundle"?
8 13:18:22 A. Pure bundle?
9 13:18:25 Q. Um-hum.
10 13:18:28 A. I may have heard the term, but,
11 13:18:30 again, I can't define it for you.
12 13:18:31 Q. Okay. And do you know what
13 13:18:32 economic theory tells you about what should be
14 13:18:34 more profitable as between mixed and pure
15 13:18:40 bundles?
16 13:18:40 A. Yeah, some of this was covered in
17 13:18:43 one of the reports I cited in my -- in my
18 13:18:46 report, but it's not my area of expertise.
19 13:18:48 Q. What do you understand the theory
20 13:18:50 to be?
21 13:18:50 A. I think it was in the Elberse
22 13:18:55 report, if I remember correctly. And off the
23 13:19:03 top of my head, I couldn't summarize the
24 13:19:05 strategic and economic implications of the
25 13:19:07 difference between the two types of bundles.

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1 ARAM A. SINNREICH, PH.D.
2 13:24:22 those reductions.
3 13:24:25 Q. Okay. And, again, are you offering
4 13:24:27 any opinion about how much the decline in music
5 13:24:30 sales is attributable to this set of factors,
6 13:24:33 shrinking artist revenues, fewer album release,
7 13:24:37 fewer shipments?
8 13:24:37 A. Not as discrete from the other
9 13:24:39 factors, no.
10 13:24:41 Q. You also talk about increased
11 13:24:43 competition from used and independently
12 13:24:45 distributed music, starting at Page 21, right?
13 13:24:51 A. Yes.
14 13:24:55 Q. And you say -- why -- why did you
15 13:25:00 include this in your report? And the reason I'm
16 13:25:02 asking is I'm trying to understand what point
17 13:25:05 you're making here.
18 13:25:06 A. I can tell you about what point I'm
19 13:25:09 making. Maybe that'll answer the first half of
20 13:25:12 the question, as well.
21 13:25:14 Q. Yes.
22 13:25:14 A. The point I am making is that if we
23 13:25:16 look at the amount of money that consumers are
24 13:25:20 willing to spend for recorded music products at
25 13:25:23 retail, a percentage of that has always been for

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1 ARAM A. SINNREICH, PH.D.
2 13:31:06 song into the technology that they use to listen
3 13:31:09 to that song.
4 13:31:10 Q. Okay. And, again, what percent of
5 13:31:12 the decline in record label sales, if any, do
6 13:31:15 you attribute to the growth in the used CD
7 13:31:20 market?
8 13:31:20 A. As with the other factors, I can't
9 13:31:23 discretely quantify it.
10 13:31:23 Q. Okay. You then talk about the
11 13:31:25 market for independent music. And is it your
12 13:31:31 testimony that there's no source that tallies
13 13:31:33 independent record sales?
14 13:31:36 A. Not a single source that I'm aware
15 13:31:38 of, no.
16 13:31:39 Q. Okay. Would you be surprised to
17 13:31:40 learn that SoundScan, in fact, tallies
18 13:31:42 independent sales?
19 13:31:44 A. I'm -- I'm not surprised that they
20 13:31:47 have figures, but given SoundScan's
21 13:31:51 sampling-based methodologies, I doubt that they
22 13:31:53 are comprehensive reflections of the total size
23 13:31:58 of the independent music sales market.
24 13:31:59 Q. Okay. Can you explain what you
25 13:32:01 mean by that?

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1 ARAM A. SINNREICH, PH.D.
2 13:42:36 of the cost of distribution that we were talking
3 13:42:38 about before.
4 13:42:38 Q. Okay. Do you know what percent of
5 13:42:40 the songs on LimeWire were songs by independent
6 13:42:43 artists?
7 13:42:44 A. I'm not sure I understand the
8 13:42:45 parameters of your question. Are you talking
9 13:42:47 about the number of transactions, or are you
10 13:42:49 talking about the aggregate number of titles
11 13:42:51 that you could list?
12 13:42:52 Q. Let's talk about downloads. What
13 13:42:54 percent of the downloads from LimeWire were
14 13:42:56 independent -- from independent artists?
15 13:42:59 A. I don't know.
16 13:43:02 Q. And, again, are you attempting to
17 13:43:04 offer any sort of opinion about what percent of
18 13:43:08 the decline in total record -- record label
19 13:43:10 sales is attributable to the independent market?
20 13:43:14 A. No.
21 13:43:18 Q. Let's go to the next section of
22 13:43:21 your report on page -- Section 3(a)4.
23 13:43:33 MR. OLLER: What page is that?
24 13:43:36 MS. YOUNG: It's Page 22.
25 13:43:40 And it's titled, "To the extent

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1 ARAM A. SINNREICH, PH.D.
2 14:27:31 A. Sure.
3 14:27:32 It's a broad term that has a number
4 14:27:34 of different variations, but the general concept
5 14:27:37 is that instead of simply monetizing their
6 14:27:42 relationship with the artist through retaining
7 14:27:45 whatever is left of the wholesale price of a
8 14:27:49 recording after paying back the various
9 14:27:52 royalties and -- and production costs, record
10 14:27:57 labels participate on a percentage basis in
11 14:28:01 additional artist-based revenue streams, such as
12 14:28:04 touring and merchandising and licensing.
13 14:28:07 Q. Okay. What percent do the record
14 14:28:09 labels get under 360 deals?
15 14:28:11 A. To my knowledge, there's no
16 14:28:13 boilerplate at this point. Depends on how good
17 14:28:16 the artist representation is and how badly the
18 14:28:20 label wants them.
19 14:28:21 Q. What's the highest percentage the
20 14:28:23 record labels get that you've heard of under a
21 14:28:26 360 deal?
22 14:28:27 A. I don't know.
23 14:28:28 Q. What's the lowest percentage you've
24 14:28:30 heard of that they get?
25 14:28:31 A. I couldn't give you a range.

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1 ARAM A. SINNREICH, PH.D.
2 14:28:32 Q. Do you have any idea what percent
3 14:28:34 record labels get out of 360 deals?
4 14:28:37 A. Yes.
5 14:28:38 Q. Okay. What percent?
6 14:28:40 A. If I had to make a guesstimate of
7 14:28:44 the range, I would say it ranges from 10 to 30
8 14:28:47 percent.
9 14:28:47 Q. What's your -- I'm sorry. Finish
10 14:28:49 your answer.
11 14:28:50 A. Depending on the revenue stream,
12 14:28:52 depending on the artist, depending on the label,
13 14:28:55 depending on the deal.
14 14:28:56 Q. And what's that guesstimate based
15 14:28:58 on?
16 14:29:01 A. Conversations with artists,
17 14:29:04 conversations with their representatives,
18 14:29:06 conversations with people at labels, reading the
19 14:29:10 trade press.
20 14:29:11 Q. And have you specifically asked
21 14:29:14 them what percent do record labels get under a
22 14:29:16 360 deal?
23 14:29:17 A. Yes.
24 14:29:18 Q. And what have you heard in
25 14:29:20 response?

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1 ARAM A. SINNREICH, PH.D.
2 14:30:37 A. Except for the market sizing
3 14:30:39 figures about the growth, for instance, in
4 14:30:41 concert ticket sales over the last decade and
5 14:30:44 figures along those lines, yes.
6 14:30:45 Q. And what -- what degree of growth
7 14:30:49 have concert ticket sales experienced in the
8 14:30:51 last decade?
9 14:30:54 A. Somewhere in the vicinity of 250
10 14:30:58 percent.
11 14:31:04 Q. And do you know what that
12 14:31:05 represents in terms of overall revenues made off
13 14:31:08 of music?
14 14:31:10 A. By whom?
15 14:31:11 Q. Well, that's a good question.
16 14:31:14 Let's say by record -- record
17 14:31:16 labels.
18 14:31:16 A. No.
19 14:31:17 Q. And are you aware of any attempt to
20 14:31:29 quantify the extent to which growth in revenue
21 14:31:33 streams from 360 deals is attributable to
22 14:31:37 peer-to-peer or file sharing or other free
23 14:31:41 distribution of music online?
24 14:31:42 A. No. Again, I don't think it's
25 14:31:45 something that could be quantified.

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1 ARAM A. SINNREICH, PH.D.
2 14:37:34 Q. Okay. And can you just explain to
3 14:37:36 me what the -- to the extent that the labels
4 14:37:43 derive additional revenues from performance
5 14:37:45 rights, what that has to do with peer-to-peer.
6 14:37:56 A. It doesn't have a -- a whole lot to
7 14:37:59 do with peer-to-peer.
8 14:38:00 Q. Why do you say that?
9 14:38:04 A. These are revenues that are
10 14:38:06 delivered through licensed channels, either
11 14:38:08 negotiated or statutory, and those revenues
12 14:38:15 don't accrue from peer-to-peer channels, except
13 14:38:19 for licensed peer-to-peer channels.
14 14:38:21 Q. Okay. You also talk about synch
15 14:38:25 rights revenues. And I have a similar question,
16 14:38:28 which is: What do synch rights revenues have to
17 14:38:31 do with peer-to-peer?
18 14:38:32 A. Well, to a certain degree -- well,
19 14:38:35 it doesn't have a direct relationship.
20 14:38:39 To a certain degree, synch rights
21 14:38:41 revenues are influenced by peer-to-peer
22 14:38:45 behaviors in terms of giving -- providing a more
23 14:38:53 accurate impression of what the market demand
24 14:38:55 for various acts is, so that music licensors,
25 14:38:59 you know, producers of television shows, movies

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1 ARAM A. SINNREICH, PH.D.
2 14:39:02 or what have you, will make better decisions in
3 14:39:07 terms of which songs they want to license and at
4 14:39:10 what rates they're willing to license them.
5 14:39:12 Q. Okay. You also talk about music
6 14:39:14 video games. And same question: What does this
7 14:39:19 have to do with peer-to-peer?
8 14:39:23 A. It's the -- pretty much the -- the
9 14:39:26 same situation. Bands that are more successful
10 14:39:30 due to, in part, to the degree of consumer
11 14:39:37 interest that's exhibited via peer-to-peer are
12 14:39:40 more likely to get licensing deals in these
13 14:39:44 channels and -- and to recognize revenues as a
14 14:39:49 result of that.
15 14:39:50 Q. What's your basis for saying that
16 14:39:51 they're more likely to get their songs on
17 14:39:58 video -- music video games just because they're
18 14:40:01 followed on peer-to-peer networks?
19 14:40:03 A. Well, peer-to-peer is at this point
20 14:40:06 a vital element of the production of demand and
21 14:40:12 the -- the marketing and promotion of certain
22 14:40:19 artists and -- and songs to the -- to the
23 14:40:21 public.
24 14:40:21 And music -- music -- music
25 14:40:22 directors and other licensors of music for --

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1 ARAM A. SINNREICH, PH.D.
2 14:40:26 for products are aware of the overall degree of
3 14:40:29 consumer interest in and hype around a band, in
4 14:40:33 part, due to activity on those file sharing
5 14:40:36 networks.
6 14:40:38 Q. Okay. And, again, what's your
7 14:40:41 basis for saying that? Have you talked to these
8 14:40:44 promoters? I mean, have you --
9 14:40:44 A. Yes, I've spoken to music directors
10 14:40:47 about what influences their licensing behaviors.
11 14:40:51 Q. Okay. Who have you talked to?
12 14:40:53 A. When I was in Los Angeles, I knew a
13 14:40:57 number of people who were in the business of
14 14:41:00 music licensing.
15 14:41:01 Q. When you were in Los Angeles at the
16 14:41:06 USC --
17 14:41:08 A. Correct.
18 14:41:11 (Clarification for the reporter.)
19 14:41:11 Q. And are you still in contact with
20 14:41:13 those people?
21 14:41:14 A. Only socially. I haven't done any
22 14:41:16 research on the subject any time recently.
23 14:41:21 Q. Okay. You say that "Labels get a
24 14:41:24 hefty royalty from music video games."
25 14:41:27 A. That's a quote.

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1 ARAM A. SINNREICH, PH.D.
2 14:41:29 Q. Yeah. What -- what's the royalty?
3 14:41:31 A. If I knew, I would have said.
4 Q. Okay.
5 14:41:35 A. I did a significant amount of
6 14:41:37 research for the purpose of this report into
7 14:41:40 answering that question, and what I found was a
8 14:41:44 broad range of answers, to a certain degree
9 14:41:50 conflicting, from various sources in a position
10 14:41:53 to know.
11 14:41:54 So my sense is that, again, this is
12 14:41:57 a situation where there's a range of licensing
13 14:42:02 rates and structures and no boilerplate.
14 14:42:05 Q. And what's the range?
15 14:42:07 A. For -- typically -- as I understand
16 14:42:14 it, typically songs that are licensed for games
17 14:42:17 are licensed on a flat basis, that is, there's a
18 14:42:24 fee against anticipated volume of sales, and for
19 14:42:30 lesser known songs, it could be a few thousand
20 14:42:33 dollars, for better known songs, it could be a
21 14:42:36 half a million dollars and that there's an
22 14:42:38 entire range between them.
23 14:42:39 Furthermore, when games are --
24 14:42:41 exceed the anticipated volumes of sales or have
25 14:42:44 downloadable content expansion packs or are in

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1 ARAM A. SINNREICH, PH.D.
2 14:43:44 MS. YOUNG: Okay. So we'll just
3 14:43:45 designate that last portion of the transcript
4 14:43:49 confidential.
5 14:43:52 MR. OLLER: Yes.
6 14:43:52 Q. Okay. And then you also mentioned
7 14:43:54 hardware -- hardware royalties as an additional
8 14:43:56 source of revenue.
9 14:43:57 And I have the same question as
10 14:43:59 with some of these other things: What does this
11 14:44:02 have to do with peer-to-peer?
12 14:44:09 A. To the extent that peer-to-peer
13 14:44:12 increases consumer demand for high volume
14 14:44:21 hardware devices like MP3 players and hard
15 14:44:25 drives and writable media like CD-Rs, it has a
16 14:44:31 direct impact.
17 14:44:37 Q. And you say that revenues -- labels
18 14:44:40 get -- that -- I'm sorry -- you say that labels
19 14:44:42 get revenues from hardware sales?
20 14:44:46 A. In -- in some -- for some forms of
21 14:44:49 hardware in some regions, yes.
22 14:44:52 Q. Okay. Tell me which forms of
23 14:44:54 hardware and which regions you're talking about.
24 14:44:56 A. I couldn't give you an extensive
25 14:44:58 list. In the U.S., there's no statutory

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1 ARAM A. SINNREICH, PH.D.
2 14:45:02 compensation for hardware devices; however, some
3 14:45:05 manufacturers, like Microsoft, have volunteered
4 14:45:09 a royalty to be paid to rights holders which
5 14:45:15 they do for Zune, I believe.
6 14:45:17 And in other regions, there are --
7 14:45:17 and in the U.S., there are statutory royalties
8 14:45:20 that have to be paid on certain kinds of
9 14:45:23 writable media like DAT tapes and certain forms
10 14:45:26 of CD-Rs, I believe, but not all CD-Rs.
11 14:45:31 Maybe the -- I've heard, although
12 14:45:32 I'm not certain, that in the U.S., CD-Rs
13 14:45:35 designated as music CD-Rs pay royalties, but
14 14:45:36 those that don't, don't.
15 14:45:39 There are other -- there are
16 14:45:40 markets governed by different laws that I've
17 14:45:42 read about in -- especially in Europe and Asia
18 14:45:46 where there are more kind of blanket rules
19 14:45:49 regarding MP3 players, hard drives, CD-ROMs and
20 14:45:55 what have you -- or CD-Rs, rather.
21 14:45:59 Q. Okay. Do you know -- can you give
22 14:46:00 me any numbers, even a range, about how much
23 14:46:03 revenue labels get from hardware sales?
24 14:46:06 A. I've never seen any published
25 14:46:08 figures on that subject.

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1 ARAM A. SINNREICH, PH.D.
2 15:12:57 to demonstrate what they benefit, I have to show
3 15:13:02 what the rel -- what the alternative is, what
4 15:13:04 the relative market conditions are without the
5 15:13:06 existence of file sharing.
6 15:13:08 And the indirect artist benefits
7 15:13:10 are part of the larger argument about the
8 15:13:14 overall beneficial effects of file sharing.
9 15:13:16 Q. Why did the fact that major labels
10 15:13:18 have been consistently criticized for unfair or
11 15:13:22 unethical business relations with their artists,
12 15:13:25 why is that relevant to any of the opinions that
13 15:13:28 you're offering?
14 15:13:28 A. It demonstrates that labels have
15 15:13:30 not always worked in the artists' best interests
16 15:13:34 and have, therefore, strategically not always
17 15:13:37 worked in their own best interests.
18 15:13:41 Q. Okay. And explain -- explain to me
19 15:13:42 why that's the case.
20 15:13:47 A. The artists are the bread and
21 15:13:49 butter for the record labels. The -- the
22 15:13:53 labels' financial success is contingent on the
23 15:13:57 financial success, the continued creative
24 15:14:01 output, the audience demand for the -- the work
25 15:14:09 of the artists themselves.

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1 ARAM A. SINNREICH, PH.D.
2 15:14:12 When artists are not -- are
3 15:14:15 constrained from operating optimally, when
4 15:14:19 they're not adequately compensated for their
5 15:14:22 work, when they are embittered as a result of
6 15:14:25 their labor relations, it negatively impacts
7 15:14:30 their output and negatively impacts their
8 15:14:33 ability to produce and support products that are
9 15:14:37 going to succeed in the marketplace.
10 15:14:39 And when that's the case, the
11 15:14:41 labels, as the -- as their partners in bringing
12 15:14:45 those products to market suffer, as well.
13 15:14:48 Q. And is it your opinion that
14 15:14:49 phenomenon you just described is what caused the
15 15:14:52 decline in sales of recorded music starting in
16 15:14:56 2000?
17 15:14:57 A. Well, I refer you again to the --
18 15:14:58 the outline of -- of the report. The -- the
19 15:15:03 section it comes in is the section where I'm
20 15:15:06 talking about how sharing can help sales,
21 15:15:09 revenues and profits.
22 15:15:10 So, again, the -- the point is to
23 15:15:13 illuminate how sharing has actually made the
24 15:15:17 process of creating a career in music a better
25 15:15:20 one for artists. And to the extent that labels

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1 ARAM A. SINNREICH, PH.D.
2 16:17:33 A. Not on -- on order with the
3 16:17:35 services I've listed in this section.
4 16:17:45 Q. And why do you say that?
5 16:17:47 A. As I said before, I think it's only
6 16:17:49 marginally differentiated from -- from other
7 16:17:52 file sharing front ends that I've seen.
8 16:18:00 Q. Okay. Let's move now to the
9 16:18:02 last -- I think it's the last section of your
10 16:18:04 report, Section 5.
11 16:18:16 You have a discussion about why you
12 16:18:20 think market-based carrots will be more
13 16:18:23 effective than legal statistics.
14 16:18:25 Why did you include that discussion
15 16:18:27 in your report?
16 16:18:28 A. I was asked to offer an opinion on
17 16:18:32 the question of the effects of the damages on
18 16:18:35 the availability of music in the marketplace.
19 16:18:40 Q. Okay. And do you consider damages
20 16:18:42 to be carrots?
21 16:18:44 A. No, I'm not sure why --
22 16:18:46 Q. So why are you addressing carrots
23 16:18:50 then?
24 16:18:51 A. I'm suggesting that there are
25 16:18:53 alternative strategies to achieve the ends

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1 ARAM A. SINNREICH, PH.D.
2 16:18:57 that -- that this suit was -- was undertaken in
3 16:19:03 order to achieve that don't involve massive
4 16:19:08 litigation.
5 16:19:28 Q. Okay. And you talk about the
6 16:19:29 massive financial burdens that were borne by
7 16:19:34 mp3.com, Napster and Grokster, right?
8 16:19:36 A. Yes.
9 16:19:39 Q. Okay. Did a court award statutory
10 16:19:43 damages in any of those cases?
11 16:19:46 A. I don't think so. I don't know.
12 16:19:54 I -- to the extent that I have seen the -- the
13 16:19:56 legal documents about damages, I don't recall
14 16:20:00 the details.
15 16:20:01 Q. Well, what massive financial
16 16:20:03 burdens are you referring to?
17 16:20:05 A. Well, there was -- there were
18 16:20:10 considerable settlements or awards in each of
19 16:20:13 these cases levied against -- against the
20 16:20:17 defendants in the realm of hundreds of millions
21 16:20:22 of dollars or more.
22 16:20:34 Q. And have you seen a document that
23 16:20:37 causes you to say that?
24 16:20:42 A. Well, they were fairly widely
25 16:20:44 reported on at the time. It may have been tens

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1 ARAM A. SINNREICH, PH.D.
2 16:35:32 believe.
3 16:35:32 Q. Okay. But, collectively, do you
4 16:35:35 know what the range of potential damages is
5 16:35:39 that's being sought in this case?
6 16:35:41 A. No. I've read -- prior to my
7 16:35:43 engagement on the case, I had read that it was
8 16:35:45 in the billions, but I don't know what the
9 16:35:48 actual number is.
10 16:35:49 Q. If there were a damages award in
11 16:35:51 the billions, do you think that would deter
12 16:35:53 people from operating or financing illegal file
13 16:35:57 sharing services?
14 16:35:57 A. Not on a whole, no.
15 16:35:59 Q. Okay. Why not?
16 16:35:59 A. Well, for the reasons I already
17 16:36:04 talked about, although it's true that -- for a
18 16:36:08 variety of reasons.
19 16:36:11 One, in the wake of Grokster, it's
20 16:36:14 become, I think, clearer to the business
21 16:36:17 community that under current conditions file
22 16:36:20 sharing is not a viable investment anyway, so I
23 16:36:22 don't think there's a whole lot of money out
24 16:36:25 there funding commercial unlicensed file sharing
25 16:36:29 ventures at this point.

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1 ARAM A. SINNREICH, PH.D.
2 16:36:32 And consumer behaviors have
3 16:36:34 definitely moved on. File sharing, I can tell
4 16:36:36 you, among my students, I asked 20 students
5 16:36:40 enrolled in a class about music and technology
6 16:36:42 last week how many of them have used file
7 16:36:46 sharing networks in the last year, or something
8 16:36:48 like that. I think two of them raised their
9 16:36:50 hands.
10 16:36:51 And it's not that they are not
11 16:36:52 interested in digital music. They just have
12 16:36:54 other ways of gaining access to it, many of
13 16:36:57 which I outline in my report.
14 16:37:00 So file sharing is also, you know,
15 16:37:02 no longer a -- an innovative or even leading
16 16:37:08 edge paradigm for distribution. It's just one
17 16:37:11 of many, many, many different platforms that
18 16:37:13 people use to achieve the same ends.
19 16:37:15 Q. Okay. Well, let me ask my question
20 16:37:17 a little differently then --
21 A. Sure.
22 16:37:19 Q. -- and not limit it to file
23 sharing.
24 16:37:21 If there were a damages award in
25 16:37:23 excess of a billion dollars in this case, do you

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1 ARAM A. SINNREICH, PH.D.
2 16:37:25 think it would deter people from operating or
3 16:37:28 financing illegal music services?
4 16:37:31 A. No, I don't. Would you like me to
5 16:37:34 say why not?
6 16:37:35 Q. I would.
7 16:37:38 A. Okay. First of all, as I've
8 16:37:41 observed, everybody has ample evidence that
9 16:37:50 services that are found to be in violation of
10 16:37:53 copyright are liable for sufficient damages to
11 16:37:59 put them out of business, and, in fact, that
12 16:38:02 services can go out of business just defending
13 16:38:05 copyright infringement accusations, whether or
14 16:38:11 not they -- they are legitimate accusations.
15 16:38:17 So the addition of one more set of
16 16:38:24 damages to the pile, I don't think, would
17 16:38:27 significantly change the outlook of any
18 16:38:31 developers or investors.
19 16:38:34 That being said, you know, I'm not
20 16:38:37 an attorney, but I believe that there is
21 16:38:40 probably still a fair amount of legal gray area
22 16:38:43 that people are interested in examining in the
23 16:38:50 quest to find a workable music distribution
24 16:38:53 paradigm that can both deliver revenues to
25 16:38:58 operators and rights holders and match the needs

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1 ARAM A. SINNREICH, PH.D.
2 16:39:01 of today's online music consumers.
3 16:39:05 So I think that quest will probably
4 16:39:10 continue to drive the desire for people to
5 16:39:13 innovate.
6 16:39:14 And then there's the factor that we
7 16:39:15 were talking about before, which is the kind of
8 16:39:18 global community of coders who aren't interested
9 16:39:20 in, you know, making any money or delivering any
10 16:39:23 revenues necessarily to anybody and just want to
11 16:39:27 make cool tools that they think make the world a
12 16:39:30 more interesting place.
13 16:39:32 So I -- I don't really see -- I --
14 16:39:35 I can't really image a scenario in which the
15 16:39:39 presence or absence of a large damages award in
16 16:39:42 this case would significantly change the
17 16:39:47 availability of free music or the -- the overall
18 16:39:53 pace of innovation in -- in this arena.
19 16:39:56 Q. Let me ask you this: If you had
20 16:39:59 money that you wanted to invest in an unlicensed
21 16:40:02 Internet music distribution service, would the
22 16:40:05 fact that somebody got a \$1 billion award
23 16:40:08 against them from doing that deter you in any
24 16:40:12 way from investing your money in an illegal
25 16:40:14 distribution service?

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1 ARAM A. SINNREICH, PH.D.
2 16:41:07 I mean, we've had -- you know, it's
3 16:41:10 been -- it's been a decade since Napster and I
4 16:41:13 think that anybody in a position to invest is
5 16:41:17 already -- regardless of the outcome of this
6 16:41:20 case, is already well-aware of what the, you
7 16:41:22 know, financial risks are.
8 16:41:31 Q. Okay. You say in your report that,
9 16:41:35 "The most likely effect of a large damages award
10 16:41:41 will be further erosion of the plaintiffs'
11 16:41:43 already tarnished reputation among consumers and
12 16:41:46 the business community, undermining their
13 16:41:48 ability to effectively counter any economic and
14 16:41:51 organizational challenges they face."
15 16:41:55 So are you saying that a large
16 16:42:00 damages award is actually against the
17 16:42:01 plaintiffs' interest?
18 16:42:02 A. Reputationally, absolutely.
19 16:42:07 Q. And are you trying to balance that
20 16:42:10 against any other factors?
21 16:42:11 A. Well, you asked a legitimate
22 16:42:14 question about whether the -- a large damage
23 16:42:22 award in this case would have any beneficial
24 16:42:25 effect on the financial outlook for the
25 16:42:27 plaintiffs.

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1 ARAM A. SINNREICH, PH.D.
2 16:42:27 It's a legitimate question. My
3 16:42:29 opinion is that the answer is no.
4 16:42:41 MS. YOUNG: Okay. Let me take a
5 16:42:42 minute to look over my notes.
6 (Multiple speakers.)
7 16:42:49 MS. YOUNG: Go off the record.
8 16:42:50 THE VIDEOGRAPHER: Off the record
9 16:42:51 at 4:42 p.m.
10 16:42:53 (Recess taken.)
11 16:54:08 THE VIDEOGRAPHER: We are back on
12 16:54:16 the record at 4:53 p.m.
13 16:54:18 BY MS. YOUNG:
14 16:54:19 Q. You testified that the record
15 16:54:22 labels should have partnered with unlicensed
16 16:54:25 services instead of suing them, correct?
17 16:54:28 A. By and large, yes.
18 16:54:31 Q. Okay. What sort of business model
19 16:54:33 should they have used?
20 16:54:35 A. There are a range of possible ways
21 16:54:40 in which the innovative distribution platforms
22 16:54:43 presented by these services could have been
23 16:54:47 monetized.
24 16:54:48 There are successful examples of
25 16:54:50 micropayments base models, there are successful

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ARAM A. SINNREICH, PH.D.

17:15:49 THE VIDEOGRAPHER: This concludes
17:15:51 today's testimony of Aram Sinnreich. The time
17:15:55 on the record is 5:15 p.m. This also concludes
17:15:58 tape number six.

17:16:00

17:16:01 (Time noted: 5:15 p.m.)

17:16:01

ARAM A. SINNREICH, Ph.D.

Subscribed and sworn to before me
this ____ day of _____, 2011.

Notary Public

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C E R T I F I C A T E

STATE OF NEW YORK)

: ss.

COUNTY OF NEW YORK)

I, NANCY MAHONEY, a Certified Court Reporter, Registered Professional Reporter, Certified LiveNote Reporter, and Notary Public within and for the States of New York and New Jersey, do hereby certify:

That ARAM A. SINNREICH, Ph.D., the witness whose deposition is hereinbefore set forth, was duly sworn by me and that such deposition is a true record of the testimony given by the witness.

I further certify that I am not related to any of the parties to this action by blood or marriage, and that I am in no way interested in the outcome of this matter.

IN WITNESS WHEREOF, I have hereunto set my hand this 15th day of February 2011.

NANCY MAHONEY, CCR/RPR