IN THE UNITED STATES DISTRICT COURT
FOR THE SOUTHERN DISTRICT OF MISSISSIPPI
SOUTHERN DIVISION

MISSISSIPPI STATE CONFERENCE OF THE NATIONAL ASSOCIATION FOR THE ADVANCEMENT OF COLORED PEOPLE; DR. ANDREA WESLEY; DR. JOSEPH WESLEY; ROBERT EVANS; GARY FREDERICKS; PAMELA HAMNER; BARBARA FINN; OTHO BARNES; SHIRLINDA ROBERTSON; SANDRA SMITH; DEBORAH HULITT; RODESTA TUMBLIN; DR. KIA JONES; MARCELEAN ARRINGTON; VICTORIA ROBERTSON,

Plaintiffs,

vs.

STATE BOARD OF ELECTION COMMISSIONERS; TATE REEVES, in his official capacity as Governor of Mississippi; LYNN FITCH, in her official capacity as Attorney General of Mississippi; MICHAEL WATSON, in his official capacity as Secretary of State of Mississippi,

Defendants,

AND

MISSISSIPPI REPUBLICAN EXECUTIVE COMMITTEE,

Intervenor-Defendant.

CIVIL ACTION NO.
3:22-cv-734-DPJ-HSO-LHS

PLAINTIFFS' MOTION IN LIMINE TO EXCLUDE UNTIMELY EXPERT TESTIMONY FROM DR. PETER MORRISON

Plaintiffs the Mississippi State Conference of the National Association for the Advancement of Colored People, Dr. Andrea Wesley, Dr. Joseph Wesley, Robert Evans, Gary Fredericks, Pamela Hamner, Barbara Finn, Otho Barnes, Shirlinda Robertson, Sandra Smith, Deborah Hulitt, Rodesta Tumblin, Dr. Kia Jones, Marcelean Arrington, and Victoria Robertson

Census dataset?

A. The -- the correction is justified here, first of all, because there were so many Hispanics. Hispanics were a predominant part of the population. And secondly, at that point in time, which is now -- we're talking about 2007, before the 2010 Census had even been taken, which is, you know, a decade old -- at that point in time, there were a lot of concerns about citizenship misreporting. And I believe at that time, I -- when I was working with Mr. Bryan, he said, "You know, the Census Bureau looks at this issue, and they actually have studies -- unpublished studies and unpublished data that we could refer to as suggesting that there may be misreporting at the very local level, such as this village.

And that's where I got the information, and it was -- I would characterize it as responsive to a circumstance that occurred at a very local level where there was a considerable concern with misreporting on the part of a very sizable Hispanic population about whom there could be some controversy as to whether or not they were all citizens, as reported on the Census. So that was something I looked into, and that was the basis for bringing that issue up at that point in that particular case.

Q. So would you suggest that experts correct for citizenship over-reporting when evaluating Census data when there is evidence of over-reporting, as you described?

A. I would say when there is substantial evidence of over-reporting, it would be worth looking into the feasibility of doing that, but I would not, as a general rule, say it's something that ought to be done. As a general rule, I would say just go with the published Census data because at this point in time, which is now, what, about 15 years -- 15 or 18 years ago, we know a lot more about the Census Bureau's robustness of reporting of citizenship and their efforts to deal with problems such as this, which were problems of concern in 2007 but are now well accounted for by the practices that the Census Bureau engages in 15, 18 years later.

Q. Okay. And would you agree that disproportionate over-reporting by one group can lead to inaccurate results on a survey?

MR. CARDIN: Object to the form.

You may answer the question.

A. I -- I wouldn't agree with that, no.

Q. (BY MS. SMITH) And why not?

A. Because I have no evidence that it is something that is of concern and can be corrected. I'm

not -- let me be clear on what I'm saying here. I'm not saying that there is no over-reporting. I'm simply saying that there is no evidence of over-reporting in, I -- I would say, virtually any of the cases I've been involved in since then that would justify saying this is a central concern. I -- I think it's important to understand that everyone recognizes that all data that the Census Bureau deals with have issues concerning reporting. They are not 100.000 percent correct. But the issue of over-reporting of Hispanics -- of Hispanic citizens as a general concern with the Census Bureau is not one that enters into any of the research or any of the studies that I've done in the last 10 years.

Q. Okay. I think we can move on to -- I want to talk about another case. Your CV mentions that you worked as an expert for defendants in the case NAACP versus East Ramapo School District; is that right?

A. Yes.

Q. Okay. And was that a case where --

MR. CARDIN: That's Number 18 on the list; is that --

MS. SMITH: Oh, sorry.

MR. CARDIN: Appendix A.

MS. SMITH: Let me go back to Appendix A. I believe that's right, but just give me a moment.

A. Sure. East Ramapo, I think it's pronounced.

Q. (BY MS. SMITH) Ramapo. Oh, thank you.

A. Yeah.

Q. Yes, Number 18. Thank you.

A. Right.

Q. And you testified at trial in this case?

A. Correct.

Q. Okay. And was that a case where the NAACP and minority voters sued a school district alleging an at-large system of electing school board members diluted the votes of Black and Latino communities under Section 2?

A. I'd have to go back and see whether every single word in your sentence is correct, but --

Q. Right.

A. -- that's generally what I recall about it.

Q. Great. Well, let's look at that decision, too. So I can mark for the record -- this is now Exhibit 5.

(Exhibit 5 marked.)

Q. (BY MS. SMITH) I'm marking for the record National Association for the Advancement of Colored People versus [sic] Spring Valley Branch versus East Ramapo Central School District. That's 462 F. Supp. 3d 368, an SDYN decision from 2020. Here you are.

A. Thank you.

Q. Okay. If you want to take a moment, we can look at the synopsis. It says: Interest group and minority-registered voters brought an action against a school district alleging that the election system that the school district used to elect members of its board of education resulted in minority vote dilution in violation of the Voting Rights Act.

A. Yes.

Q. Does that sound right? Okay.

Let's turn to Page 12 here. And the page number is at the bottom right. Looking at the top left-hand corner, the end of that first paragraph, I believe the Court noted that you had, quote, advocated for the use of surname and geocoding analysis to derive racial estimates by geographic unit. Do I have that right?

A. Yes.

Q. And another name for that would be Bayesian Improved Surname Geocoding?

A. That's correct.

Q. Or BISG?

A. Yeah.

Q. Okay. Let's turn now to Page 36 of this document, and we're looking at Footnote 33. And here,

the Court said that, quote, a 2017 paper coauthored by Dr. Morrison cited the Imai -- Imai and Khanna article about BISG methodology. Do I have that right?

A. Yes.

Q. Is that a reference to Dr. Kosuke Imai?

A. I -- I -- I don't know if it's the same Imai, but I -- I don't dispute that I said that.

Q. Okay. So you cited Dr. Imai --

A. Yes.

Q. -- in a paper you wrote in 2017?

A. Correct.

Q. Is Dr. Imai reputable in the field of statistical methods, to your knowledge?

A. I -- I don't know anything about the person, the author. I just know that I cited the article in support of the contention that one could assign a race -- and the quote here is "one could assign a race to registrants in a voter file where this quantity is not present and then aggregate" the individuals and then use it as an EI input. And what I said was you could do. I -- I didn't say whether you should do it or whether it would give you an accurate result. I said you could. And I think the intention of my statement there was that there was no reason not to try to do it that way. It was a way to do it that would -- you know,

could be justified --

Q. Okay.

A. -- based on what I knew about BISG.

Q. But you're not offering any conclusions about BISG in this case?

A. No, I -- I -- I stand behind BISG as a way of dealing with a very complicated problem if it's properly applied and the caveats are recognized and obeyed. In other words, if you use it correctly, it -- it has been proven to be workable. I had some experience where people have used BISG and they -- they ignore the caveats, and I say it's too bad because they didn't do it right, and they -- you know, they're going to end up with things I don't know whether they're true or not.

Q. Okay. But you're not offering opinions about BISG here in this litigation in your --

A. No, I -- I -- I would say if somebody has used BISG properly, I -- my opinion would be I stand behind it. I haven't directly studied its application in this case.

Q. Understood.

A. But if I'm called upon to do it, I will.

Q. And Dr. Imai, you testified you don't know about him, but you found his article reputable enough to cite in a paper you wrote; is that right?

A. I'm assuming here that it was a peer-reviewed publication.

Q. Uh-huh.

A. And if someone has a peer-reviewed publication, I will regard that as meeting the minimum scientific standards that I would want to rely upon.

Q. Okay. Thank you. I think we're done with that document. And I'm going to shift gears a little bit. I want to pull up one more document while we --

MR. CARDIN: Can we take a break --

MS. SMITH: Oh, yeah.

MR. CARDIN: -- for a second?

MS. SMITH: Of course. We've been going about an hour. We can go off the record. Thank you.

(Recess taken from 10:05 to 10:12 a.m.)

Q. (BY MS. SMITH) Okay. I want to pull up one more document while we're talking about your past work.

MS. SMITH: Okay. I'm going to mark this as Exhibit 6 for the record. It's an op-ed in the LA Times by Dr. Morrison.

(Exhibit 6 marked.)

Q. (BY MS. SMITH) So do you recognize this document?

A. Yeah, I know it's mine. It's 1995.

Q. So is this an op-ed you published in 1995?

A. Yes.
Q. Okay. And what is it about?
A. '95. Let me just read it.
Q. Oh, yeah, take a moment.
A. Sure.
Q. Please.
A. Yeah, I think I recall what this is about. Your question?
Q. What is -- what is it about?
A. It's about the Census Bureau's definitions and distinctions among individual ethnic and racial -- and racial identities and the questions they ask.
Q. Great. Okay. And it's also about race-based redistricting?
A. Tell me which paragraph you see that in. I --
Q. Let's --
A. -- didn't read the whole thing.
Q. Sure. Let's go to Paragraph 6.
A. All right.
Q. I believe you said in the third sentence, quote: Membership in a given "minority" group means not exclusion but entitlement.

What did you mean?

A. I said -- what I said is, "At the same time --
Q. "At the same time."

A. -- membership" --

Q. Oh.

A. -- et cetera.

Q. Okay. So: At the same time, membership --

A. Yeah.

Q. -- in a given "minority" group means not exclusion not entitlement?

A. And the preceding sentence says: Now the focus is on distinctions that are finer, more numerous and more open to debate. At the same time, membership in a given "minority" group means not exclusion but entitlement.

Q. Okay.

A. "The stakes remain as always: privilege and resources, including political empowerment."

Q. Okay. And when you said "membership in a given 'minority' group means not exclusion but entitlement," specifically, what did -- what did you mean by that?

A. Entitlement to equal opportunity to vote --

Q. Okay.

A. -- at this particular point in our history, which is 1995, which I would say it is a -- a comment on the state of affairs in 1995, which would be, at this point, what, close to three -- three decades ago.

Q. Sure.

A. So it's -- it's -- I -- I would regard this as a commentary -- an opinion piece commenting on the state of affairs three decades ago in the United States with regard to race and entitlement.

Q. Okay. And then in the next paragraph, you said, quote: A highly controversial aspect of ethnically based districting is its reinforcement of ethnic separatism.

Do you see that?

A. Yes.

Q. And what did you mean by that?

A. Just what I said. It's highly controversial.

Q. Okay. Would providing Black-opportunity districts lead to, quote, reinforcement of ethnic separatism, in your view?

MR. CARDIN: Object to the form.

You may answer the question.

A. I don't have an opinion on that.

Q. (BY MS. SMITH) Okay. One more thing on your background. Looking at your CV, I see you filed a brief in support of the appellants in the case Evenwel v. Abbott. Is that right?

A. Yes.

Q. And Dr. Swan- -- David Swanson joined that

brief with you?

A. Yes.

Q. Is he another demographer you've worked with?

A. Yes, he is.

Q. Have you discussed this case with Dr. Swanson?

A. I -- I don't know that I've discussed this case in particular with him. I have discussed the work that he has been doing on another case, and I -- I can't rule out the possibility that our discussion also include -- included some mention of this case. I'm trying to think back. I did not discuss the case itself with him. I may have discussed data with him that included Mississippi as well as other states.

Q. Okay. Did any of those discussions affect your conclusions in this October 2023 report?

A. No, we -- they -- I haven't discussed this case with him, as best as I can recall.

Q. Okay. Great. And going back to the Evenwel v. Abbott case, what is your understanding of the appellants' argument in that case?

A. Again, I -- I really don't recall the details of what the appellants' argument was. What I recall is simply that a group of demographers had something to say collectively about what was going on, and that's -- that's the -- you know, I'd have to review the whole

thing to see what it was about again.

Q. Okay. And if I had told you that the appellants were arguing that the equal protection clause requires districting take into account the total number of people eligible to vote as opposed to the total population, would that sound right? Does that sound familiar?

A. I'm not sure what the distinction between the total number of people and the total population. To me, that sounds synonymous.

Q. Oh, sorry. The total number of eligible people to vote --

A. Oh, eligible.

Q. -- as opposed to the total population, which would include, say, not citizens?

A. I honestly don't recall where that distinction entered in. I mean, I'd have to review the whole thing. I -- it may have entered in. And what was your question about that?

Q. Just if that sounded familiar to you as to what the appellants argued in that case.

A. I can't say that it sounds familiar because I don't recall what -- what they were arguing. I only recall what we said.

Q. Okay. What -- and did you say, to the best of

your recollection?

A. Again, I'd have to -- I'd have to look at the document to tell you what we said.

Q. Okay. So why did you file a brief on behalf of the appellants in that case?

A. I think the -- the -- the simple answer to your question was that I felt honored to be called upon to gather together several of the most qualified applied demographers from several different disciplines to agree on what we had to say about a set of -- a subset of the issues in that case and someone who was willing to pay us to do so. And I said, "If you'd like us to -- to put together what we think of as our consensus opinion, it's a big favor to ask to do it for free, but if you'd like for us to do it, we'll do it."

Q. Okay. Do you have a view on whether decennial redistricting should be done on the basis of number of people who are eligible to vote as opposed to the total population?

MR. CARDIN: Object to the form.

But you may answer the question.

A. Yeah, I -- I don't have an opinion on it. I acknowledge that it is important both to the eligible voter population and to the total population because it gets at everyone who is represented, which is the total

population, and those among the persons represented who are entitled to cast a ballot.

Q. (BY MS. SMITH) So just to be sure I'm clear, do you think decennial redistricting should be done on the basis of number of people eligible to vote?

MR. CARDIN: Object to the form.

You may answer the question.

A. You're saying do I think it -- it should be done based on the -- state the question again.

Q. (BY MS. SMITH) Do you think that decennial redistricting should use data that looks at voting-eligible people and not the total population?

MR. CARDIN: Object to the form.

You may answer the question.

A. I think it should be -- reflect both populations.

Q. (BY MS. SMITH) And is that the view of -- how would it do that? Yeah.

A. Operationally? You mean -- I -- you --

Q. Sure. How would that work?

A. It would -- it would work by eligible voters electing people who represent the total populations of which the eligible voters are a part.

Q. Okay. So when drawing district maps and accounting for the one-person-one-vote principle,

would -- would states be using the number of voting-eligible people or the total population?

MR. CARDIN: Object to the form.

You may answer the question.

A. It's not an either/or situation. It is a conceptual distinction, and I -- I can't answer the question because it's -- it's not one or the other. It's not -- it's not an either/or.

Q. (BY MS. SMITH) Do you understand that the appellants were arguing for -- for one of those options and not a hybrid approach in that case?

A. I can't say that I'm clear on what they were arguing.

Q. Okay. So you submitted --

A. I'm just saying I'm clear on --

Q. It's your testimony that you submitted the amicus brief in that case, but you didn't know what they were arguing?

A. I did know at the time, but I'm saying I don't know at this time.

Q. Okay.

A. I don't clearly recall at this time.

Q. All right. We talked a little bit earlier about how you worked a fair amount with Thomas Bryan; is that right?

A. Yes.

Q. Okay. Have you ever worked with BryanGeoDemographics, his firm?

A. Yes. I mean, when I say I worked with Thomas Bryan, he regards it as working with him --

Q. Okay.

A. -- and his firm.

Q. Okay. I think that concludes your background. Let's -- let's turn to your report again. That's Exhibit 2, in terms of its location in the record. Although, here's what it looks like. So I believe you already have it. Yeah. That first one.

A. Oh, okay. Sorry.

Q. No, you're fine.

A. All right.

Q. Okay. So looking at Page 2 to the first page of the report, I see you were asked to opine on the level of political participation of Black eligible voters in Mississippi relative to White voters. Is that right?

A. To White eligible voters.

Q. White eligible voters?

A. Right.

Q. And to evaluate political participation, you considered the percentage of people who were registered

and then also the percentage of people who turned out to vote?

A. Correct.

Q. Great. And what methods did you use in your analysis?

A. I tabulated and displayed the data on the number of people who were eligible to vote and the number who turned out to vote.

Q. Okay. And you relied on the CPS, as you said earlier. And what did you conclude in your report? I believe it's listed on Page -- still on Page 2, at Paragraph 3.

A. Well, I concluded that based on a 42-year-time series of data that is unique to this source of -- to this data source from the Census Bureau, that there is a distinct break that occurred in the historical pattern of political participation by Mississippi voters, and I noted that the distinction -- that -- that the way the break evidenced itself was comparing a period from 1980 through 2002 with a period from 2004 onward, where in the latter case, the pattern had reversed and that Black political participation which had trailed that of Whites now exceeded that of Whites in most years, and that it was an authentic break that could be documented only by a scientifically collected source of data over a period

of this length.

Q. Understood. And you concluded that, quote, irrespective of any apparent over-reporting of registration or turnout on the CPS?

A. Did I say that?

Q. Yes.

A. Yeah, I -- I agree with that --

Q. Great.

A. -- that that's what I said.

Q. Okay. And then in the next paragraph, you said: Based upon the entirety of these data and other research.

Just to make sure I understand, what is "other research" referring to here?

A. I have followed the political participation of Black voters in Mississippi in more than one instance, and I have taken note in another study that I did that Blacks are a disproportionately high percentage of all locally elected officials in Mississippi in recent years. And I regard that as -- as a noteworthy observation for just the changes that have occurred over the decades in Blacks' political participation from an earlier period of time to what is now a period of time that I can document from 2004 onward.

Q. Okay. But you're not offering any opinions as

to the level of Black representation in political office in Mississippi, number of people who've been elected and their race?

A. I'm simply saying that the pattern that I observed of Black versus White participation evidences itself since 2004 in Black participation being certainly equal to if not greater than that of Whites. I don't know that it's greater for sure, but it looks greater in the graphs, and it certainly establishes without any doubt that participation is equal, if not greater, among Blacks relative to Whites in terms of both registration and turnout.

Q. Okay. Let's talk more about the Current Population Survey. So what -- what is the CPS?

A. The CPS is, first and foremost, a long established scientific survey conducted by the Census Bureau for, I think, 42 years now, if not more, as a scientifically conducted survey. It is uniquely informative relative to administrative by-product data, which most political scientists are using to evaluate elections in a particular year or at a particular point in time or in a particular place --

Q. Uh-huh.

A. -- or state but are always time-specific, place-specific as opposed to a continuous regular

reading of what's going on every two years over a 42-year period.

Q. Okay. In terms of how the survey data is collected, is it accurate to say that the Census Bureau -- and correct me if I have this wrong -- selects a random group of respondents and then asks them a series of questions?

A. I don't know if the word "random" is strictly correct in a statistical sense, but it is representative. I would say "representative" would be the proper word to use in that sentence.

Q. Understood. So they select a representative group of respondents and then ask them a series of questions?

A. That's a conceptual overview. I don't know if that's exactly how they define it, but I wouldn't dispute that.

Q. Okay. And generally speaking, the group of respondents who answer on the CPS would never be perfectly representative of the population of eligible voters, correct?

MR. CARDIN: Object to the form.

You may answer the question.

A. I don't have any basis for saying that that's true, nor do I have any basis for saying it's false.

Q. (BY MS. SMITH) Okay. If I use the term "weighting," do you understand what that means?

A. I do.

Q. Okay. So does the CPS use weighting?

A. I would have to check on the technical details. If they do use weighting, it's because it was necessary. If they didn't use weighting, it's because it wasn't warranted.

Q. Okay.

A. But they're the arbiters of whether weighting is used.

Q. Okay. So to sum up, in a -- in a survey like the CPS, where the group of respondents who answer may not be representative of the population, weights might be used to account for that?

MR. CARDIN: Object to the form.

You may answer.

A. Yeah, I -- I can't answer the question as you framed it.

Q. (BY MS. SMITH) Okay. Is using weights common with a survey like this?

A. Yes.

Q. Okay. But you don't know if the CPS uses weighting?

A. I -- I -- I count on the Census Bureau to use

weighting where it's warranted to get data that are representative of the population.

Q. Okay.

A. That's what weighting is used for.

Q. Understood. And so the CPS data that you're reporting is an estimate of registration and an estimate of turnout. Do I have that right?

A. Correct.

Q. What does it mean that it's an estimate?

A. In -- in this instance, with the scientific survey, it means that each number or percentage that is shown has a margin of error, a statistical margin of error that is known and is specified by the Census Bureau.

Q. And what is a margin of error?

A. It is a -- it was -- it is a band within which a number lies that is published as the point estimate, and it allows one to draw conclusions with scientific certainty about what the true number would be if you had counted every single person in the population rather than the representative sample.

Q. And how is a margin of error calculated?

A. It is typically a -- a statement that says the number you have is X.XX and you can know with 95 percent certainty statistically that the true value of X.XX is

either a higher limit or -- is -- is higher -- as high as a higher limit or as low as a lower limit. So it allows one to -- such as myself, to make a statement that I have scientific certainty at the 95 percent confidence level that the number is between X and Y.

Q. Okay. So the margin of error is what allows an expert such as yourself to -- to report with scientific certainty what the result -- or the estimate of a survey is?

A. Correct.

Q. Okay. Is 90 percent certainty an acceptable level of certainty?

MR. CARDIN: Object to form.

You may answer the question.

A. It certainly is acceptable, yes.

Q. (BY MS. SMITH) And in terms of how margins of error are calculated, is it based on factors such as the size of the sample or the weighting that the CPS does?

A. It's based on both.

Q. Both? Thank you. Just to make sure I understand, when evaluating a survey, I can take the point estimate plus the margin of error, top of a range, the point estimate minus the margin of error, is the bottom, and that gives me an interval, right?

A. Correct.

Q. And given, say, 90 percent confidence level, that interval means 90 percent of the time the survey is run, the actual number will fall within that interval?

A. That's one way of putting it, yes.

Q. Okay. What would be another way of putting it?

A. How much confidence --

Q. How --

A. I'm 90 percent confident that it falls within this range. So any statement that is based on this number or a time series of these numbers, I have 90 percent confidence in the number that I have used to draw my conclusion is a number that I can believe.

Q. Okay. So if we know the margin of error and the confidence level, we know how much the estimate CPS reports might differ from the actual result; is that right?

A. When you say "the actual result," you mean the --

Q. Actual level.

A. The actual level, yeah.

Q. Great. Is the margin of error something you -- you typically want to know when you're analyzing survey results?

A. Yes.

Q. What about the confidence level?

A. Well, the confidence level derives from the margin of error.

Q. Okay.

A. And how I use the data, it is a guide to how one should interpret the data.

Q. So, in other words, the margin of error might guide the scientific -- scientific interpretation of the point estimate?

A. In this case, it guides the interpretation of each point estimate and the trend shown by the collection of point estimates over a 40- or 42-year period.

Q. The margin of error governs that?

A. That's correct.

Q. Okay. And looking into margins of error would be a typical practice of a demographer?

A. It would be -- when you say "a typical practice," it would be something that I would take into account, yes.

Q. Okay. Okay. So applying that -- and you would typically take that into account, you said?

A. In this case, I take it into account.

Q. So let's apply that principle to the CPS estimates. So lower bound of an estimate would be CPS

estimate minus the margin of error. Upper bound would be CPS estimate plus the margin of error. So the actual turnout or actual registration we can be confident falls within the lower --

A. Correct.

Q. -- and upper bound?

A little more on the CPS. So the CPS includes a voting and registration supplement; is that right?

A. I'm not sure what you mean about a "voting and registration supplement." The -- I'm -- I'm saying that the data that I have here derived from the Current Population Survey annual data, and I -- it is assessed at the website --

Q. Uh-huh. Okay.

A. -- under Table 1 in my report.

Q. So there's a set of questions they ask about voting and registration when they conduct the survey?

A. Yes, there are a set of questions.

Q. Okay. And turning back to Paragraph 2, where we just were in your report, you say that the CPS -- one second -- oh, yeah -- the CPS enables you to compare the, quote, self-reported political participation of Black and White Mississippi voters?

A. Correct.

Q. So we're going to talk a little bit about over-reporting today. In this context, would you agree with me that over-reporting means the phenomenon where some survey respondents say they are registered or that they voted even though they did not register -- or they are not registered or they did not vote?

A. That's what the term means, yes.

Q. All right. And have you worked with data from the CPS on voting and registration previously in your -- in your work as an expert?

A. I'm sure I have in a number of different instances, but not in the way I've used it here as a long-time series, not -- not in a historical approach, but simply a snapshot of what -- what the world is today.

Q. Understood. Have you written any publications about the CPS voting supplement -- or -- sorry -- the CPS as a measure of voting and -- and registration?

A. I -- I really can't answer the question because it's like saying have you used this particular kind of Census data? And I'm -- I'm sure I've used it somewhere. In -- in a published paper? I don't know. I -- I know I've used it. I -- I regularly use it.

Q. So you regularly use --

A. Yeah.

Q. -- the CPS in your work?

A. Yeah. I rely on it, yes.

Q. Okay. All right. So in terms of how the CPS survey is conducted, do Census Bureau representatives call people and interview them over the phone?

A. I would have to check the details of how they conduct this. What I do know and what gives me confidence in the CPS is that the Census Bureau is the recognized source of scientifically collected data for the nation that is relied upon by the government and policymakers in the formulation of laws, and it is the only source that one would go to for data of this kind over a period of time. It is -- it is more a matter of confidence that one has in the Census Bureau as producing the best quality scientific data that can be had about a phenomenon.

Q. Okay. So to go back to how the survey is conducted, I'm going to mark an exhibit. I'll represent to you I went to the Census website linked in your report, and I looked up the methodology and I downloaded it for us to look at. So this is going to be Exhibit 7 in the record.

(Exhibit 7 marked.)

Q. (BY MS. SMITH) Here you are. So I'm looking here at the second paragraph on the first page, and it

says that the questionnaire is, quote, administered by Census Bureau field representatives around the country -- or -- sorry -- across the country through both personal and telephone interviews. Do I have that right?

A. You say the second paragraph?

Q. Yeah. So --

A. I've got the second paragraph says: The CPS questionnaire is a completely computerized --

Q. "Document that is administered by" --

A. Oh, I'm sorry. Yeah. Okay. I get you. Okay.

Q. So it's a computerized document -- thank you --

A. Yeah.

Q. -- for correcting me -- that Census Bureau --

A. Correct.

Q. -- field representatives around the country look at as they conduct personal and telephone --

A. Right.

Q. -- interviews. So as I read this, it says that they're doing the survey through telephone interviews and through personal interviewing. Do I have that right?

A. Yes.

Q. Okay. And for the Census -- the CPS' voting and registration data that you use, does anyone go back and check to see if people reporting that they registered or reporting that they voted actually registered or actually voted?

A. Does the Census Bureau say anything about that in this?

Q. No. I think we're done with this document for now.

A. Okay. I -- I --

Q. Just generally speaking.

A. I -- I don't know if they do or not. I would -- I -- I suspect if I called up the people who collected this, I could get the answer. But if this is not part of their stated methodology, I can't answer whether they do or not.

Q. Okay. So you don't know whether they go back and check what people said in their responses against their, say, official records of a state?

A. I know -- I know that their -- their -- their usual practice is to evaluate the method that they're using. So I -- I can't say that they state this explicitly, but I know that their reputation is they don't do this for 40 years and never check to see with -- periodically on their own whether they are

meeting their own scientific quality-control standards.

Q. Uh-huh.

A. I'm sure that -- I'm sure that this is not a question that has been ignored by the Census Bureau. That's what their reputation is.

Q. Sure.

A. So --

Q. So just as a --

A. -- I -- I don't have any direct analogy of it. I can't answer your question.

Q. Just -- just to make sure I understand the data you're relying on, it's based on survey answers, right?

A. That's correct, self-reports. And the implicit assumption that any researcher, such as myself, makes is that after 40 years of doing it this way, the Census Bureau knows what it's doing to elicit this, and the accuracy of the reports are sufficiently accurate for people like me to use it.

Q. Uh-huh.

A. Otherwise, they wouldn't publish it. They would say, "We tried to collect the data, and we couldn't get it."

Q. Yeah, I think what I'm trying to get at, taking aside the general gradeability of the survey, if

I answer the survey and I say, "I registered to vote," for example, do you know if the Census Bureau goes and checks if I actually am in my state's registration system?

A. I don't know for sure, but I can't rule out the possibility that they might randomly check something like that.

Q. Uh-huh.

A. But they don't publish -- they don't publish all the details of what they do. It would not surprise me if they did do that on some of the records just to assure the quality of the data.

Q. Okay. So in your review of the CPS and your use of this data in the past, you're not aware of -- of that practice?

A. I am aware of their practices, which, generally speaking, are they don't publish data if it turns out that they're getting garbage in that is not anywhere near what they're representing it to be.

Q. Uh-huh.

A. I -- I would be astonished if they had not at all or were not continuously monitoring the accuracy of this. That's their normal practice.

Q. Uh-huh. And to your -- I believe you said earlier you -- you think they might on occasion, but

not -- but haven't publicly reported that they conduct that kind of validation of a survey result?

MR. CARDIN: Object to the form.

You may answer the question.

A. What I'm saying is the Census Bureau is known for validating their data-collection methods, and they continuously improve them. And so I have confidence in this particular body of data first and foremost because of the Census Bureau's reputation and, secondly, because of the 40 years of experience that they've had in dealing with an obvious quality-control question, which is: Are people responding?

Q. (BY MS. SMITH) Uh-huh.

A. If -- if it were a new survey and this was the first year, I would say, well, they may not have looked at that yet.

Q. Uh-huh.

A. But after 40 years, I'm quite confident that they -- that they know what they're doing. And if there were insurmountable problems, they would say, "We've tried to gather this information, but we can't." And there are instances where information, they tried to gather it and they couldn't, and they say so.

Q. Okay. So to make sure I understand, you're not aware of whether the CPS is a validated survey or

not?

MR. CARDIN: Object to the form.

You may answer.

A. I -- I wouldn't agree with that. I -- I am aware.

Q. (BY MS. SMITH) Okay. And which -- which one is it?

A. I would say that it is -- it is a validated form of collecting data because if they couldn't validate it, they wouldn't -- would not be publishing it for 40 years.

Q. All right. So you -- you -- okay. Yeah, so the dataset that you used, does it reflect validation from any state's administrative records or another source?

A. I don't know the details of how the Census Bureau validates its numbers, but I'm sure that they do validate them.

Q. Okay. So you testified a little earlier that the CPS has known limitations as a survey. What are those?

A. The confidence intervals.

Q. Okay. Any other flaws or limitations?

A. Not that -- not that I know of.

Q. So let's turn -- okay. I want to turn to

another exhibit, which is a frequently asked questions document that the CPS publishes.

(Exhibit 8 marked.)

Q. (BY MS. SMITH) I'm marking for Exhibit 8 in the record a document that I'll represent to you I pulled from the Census Bureau's website, and it's called "Frequently Asked Questions, or FAQs, About Voting and Registration." All right?

A. Uh-huh.

Q. Great. Okay. So I want to talk a little bit more about how the CPS describes its own limitations in this document. All right?

A. All right.

Q. Turning to Page -- the second page, so turning over the document, do you see here that it says, quote, Why might the Census Bureau's voting and registration estimates differ from other data sources?

A. Yes, I do.

Q. Okay. And so the Census Bureau is saying here, essentially, that the voting and registration estimates might differ from other data sources?

A. Yes.

Q. Okay. And then looking at the first sentence below that, it references that one of those other data sources that the CPS might differ from would be the

official counts in an election?

A. Can you tell me what sentence -- what the words are in the sentence that --

Q. Oh, yeah, of course. So, "Differences between the official" --

A. Yeah.

Q. -- "counts and the CPS" --

A. Right. Yeah, "may -- may be a combination of an understatement of the official numbers and an overstatement of the CPS estimates."

Q. Yes.

A. Sure, I -- I see that.

Q. So do you dispute that the CPS might differ from official counts reflected in a state's records?

A. No, I do not dispute that.

Q. Okay. Okay.

A. With the caveat that the state's records are administrative record data.

Q. Uh-huh. Sure. So moving a little bit down in that paragraph, I also see the quote: Respondent misreporting is also a source of error in the CPS estimates.

Do I have that right?

A. Yes.

Q. So do you dispute that respondent misreporting

is a source of error in the CPS estimates?

A. No, I don't.

Q. Okay. Do you dispute the CPS' own description of the limits of its data?

A. No, I don't.

Q. All right. Why don't we take a quick break now because I'm about to shift gears. So we're coming to a natural stopping point.

A. Sure.

Q. Thank you.

MS. SMITH: Going off the record.

(Recess taken from 10:53 to 11:03 a.m.)

Q. (BY MS. SMITH) All right. Dr. Morrison, just before a break, I asked if you dispute the CPS' own views of the limits of its data, and you said you did not. Do I have that right?

A. Correct.

Q. Okay. Thank you. So I want to turn back to your report, looking at Table 1 now. So I'm on Page 3 of your report.

A. Yes.

Q. Okay. So let's look at -- I just want to walk through this table and make sure I'm understanding it right. So looking at 2020, you looked at -- here, you're reporting the Census CPS survey data, and you're

reporting that as one example, in 2020, according to the CPS, Black voter turnout in Mississippi was estimated at 72.9 percent. Do I have that right?

A. Yes.

Q. And White voter turnout was estimated at 69.8 percent?

A. That's correct.

Q. For a 3.1 percent difference?

A. Correct.

Q. Okay. I'll represent to you I went to the link here at the bottom of your Table 1, and I pulled some more CPS -- or the same CPS data in a different table. So let's mark that Exhibit 9 for the record.

(Exhibit 9 marked.)

Q. (BY MS. SMITH) And this is Table 4A, which is called "Reported Voting and Registration For States." Okay?

A. Uh-huh.

Q. Great. So this is data from the CPS voting and registration supplement, which is the same dataset you relied on for Tables 1 and 2. Okay?

A. Let me make sure that the sources agree.

Q. Sure. Take your time. If you want to look at the second page, it says the source there at the bottom.

A. Okay. Okay. All right.

Q. So what I'm going to try to do next is understand how many people the CPS estimate would lead us to think voted in Mississippi in 2020. Okay?

A. All right.

Q. And if you're like me, you don't like doing math in your head, potentially, so I did a few basic calculations to just understand what's reported here. And I'll -- I have a calculator for you. If you want to double-check --

A. Okay. All right.

Q. -- my math, you have that. Okay?

A. Before I proceed with this, can I --

Q. Take a moment? Oh, yeah.

A. No. What I'm just wondering is I may want to do a calculation and write it down on a napkin --

Q. Sure.

A. -- or a piece of paper, if you --

Q. We can get you paper.

A. I'm sure if I put it on a piece of paper --

MR. CARDIN: Let me hand you a piece of paper.

THE WITNESS: Yeah, yeah, give me a piece of paper.

A. Okay. I'm all set.

Q. (BY MS. SMITH) Great.

A. Just so you know, I'm going to follow your calculation -- your -- your --

Q. Yes.

A. Yeah. Okay.

Q. By all means.

A. All right. So the -- we're talking about 2020.

Q. Yes. So let's look at Mississippi, an entry here on the first page.

A. Uh-huh.

Q. Moving all the way over to -- under "Voted" --

A. Right.

Q. -- "Percent Voted (Citizen)" being the column.

A. Uh-huh.

Q. And for Mississippi, I'm seeing 70.3 percent of the citizen voting age population voted in 2020.

A. Where -- where do you see that number?

Q. I'm seeing 70.3 when I look under "Voted" at the top. "Percent Voted (Citizen)" at the next line from the top. And then when I go to Mississippi --

A. Oh, I see. I get you. Okay.

Q. -- I see 70.3.

A. 70.3, yeah.

Q. So that's the CPS estimate.

A. The percent of citizens voting, right.

Q. Yes. That's the percent of citizens voting in 2020. Are we on the same page?

A. Yeah.

Q. Great.

A. I see what you're looking at.

Q. Okay. Perfect. And like I said, I want to calculate how many people actually voted -- or -- sorry -- how many people voted in 2020 as the CPS would have us estimate it in Mississippi.

A. All right.

Q. So are you familiar with the -- you mentioned earlier the American Community Survey issued by the Census.

A. Yes.

Q. And are you aware that it contains data on citizen voting age population --

A. Yes.

Q. -- across jurisdictions?

Okay. So I'll represent to you that using the ACS, that Mississippi's citizen voting age population --

A. Uh-huh.

Q. -- is 2.227795 million.

A. All right.

Q. All right. Great.

A. That's the ACS CVAP estimate, 2,227,795. And do you have a margin of error for them, also? Because that's the --

Q. Yes, I do. Sorry. I don't have it for that number.

A. Oh, be- -- I mean, that -- that's their point estimate. I need the margin of error.

Q. That's their point estimate?

A. Yeah. Right.

Q. I believe we can find you the margin of error, if that's helpful. I wasn't planning to walk through the margin of error for that calculation, but I'm happy --

A. Yeah.

Q. -- to find it. Maybe we could go off the record just for a moment so I could pull it up, if that's all right.

(Recess taken from 11:09 to 11:10 a.m.)

Q. (BY MS. SMITH) Okay. Thanks for your patience just now. So the margin of error is plus or minus 3,481.

MR. CARDIN: And could you identify just the source that you are -- obtained that information from?

MS. SMITH: Yeah. Data.census.gov. The

citizen voting age population by selected characteristics, the American Community Survey filtered by Mississippi, filtered by citizens years 18 -- 18 years of age and over. And this is the 2017 to 2021 tabulation.

A. Okay. Okay. That's important.

Q. (BY MS. SMITH) Okay.

MR. CARDIN: And you have accessed that on your laptop, correct?

MS. SMITH: Yes. I'm happy to try to print it out or anything, if that's helpful.

MR. CARDIN: No, I just want the record to reflect the source and how you got it --

MS. SMITH: Understood. Yes.

MR. CARDIN: -- just so it's clear.

Q. (BY MS. SMITH) Are we all clear now?

A. Yeah.

Q. Great. Okay. So in order to find number of people who voted in Mississippi in 2020 according to the CPS, I'm going to multiply .703 times 2,227,795. Does that sound right?

A. I understand -- yeah, I understand exactly what you've done.

Q. Great. And when I ran that, I found 1.57 million people to have voted in Mississippi in 2020

according to --

A. 1.57 million?

Q. Yes.

A. Okay. And do you want me to comment on that comparison?

Q. I don't think we need --

A. Do you have a question about it?

Q. -- a comparison. I'm just -- I'm asking: Do you dispute that 70.3 percent of 2,227,795 is about 1.57 million?

A. I -- I -- if -- if you did the calculation correct, I don't dispute that it's 1.57 million. I'm just asking what is it that you don't understand about the 1.57 million?

Q. Oh, no, I'm just -- I'm trying to -- okay. So to sum all that up, the CPS estimate of how many people voted in 2020 in Mississippi would be 1.57 million people?

A. I think you've done the calculation correct.

Q. Great. Okay. Understood. So we can mark the next exhibit, which would be official data from the Secretary of State's office from 2020. This is their report of official results.

(Exhibit 10 marked.)

Q. (BY MS. SMITH) Okay. So this is the official

results of total votes reported by counties for the 2020 general election as offered by the Secretary of State. Okay?

A. Uh-huh.

Q. Okay. So I want to turn to Page 9. And here, we can see the total number of votes cast for each of the presidential candidates. Are -- do you see that?

A. Yeah.

Q. Okay. So I'll represent to you I also calculated -- I added up all of these numbers to get a total number of votes that were actually cast in Mississippi in 2020. Okay?

A. Votes cast in Mississippi.

Q. In 2020.

A. In 2020.

Q. Uh-huh. And I did that by adding up all of the numbers here.

A. And the source of this is the Statewide Election Management System?

Q. The source is the Secretary of State's Statewide Election Management System.

A. Secretary of State of Mississippi.

Q. Yes. Thank you.

A. All right.

Q. All right. And I added those up to be 1.31 --

3 -- sorry -- 1,000 -- sorry -- 1,300,000 -- 313,759 was the number I got when I added those up.

A. All right.

Q. Okay. So 1.313759 million.

A. Uh-huh.

Q. So as I read it, the Mississippi Secretary of State's office reports that that's the number of votes that were actually cast --

A. Right.

Q. -- in 2020. Okay?

A. Yeah.

Q. Do you dispute the calculation I just gave you?

A. I'll take your word for doing the calculation correctly. And I just want to reiterate that you have the votes cast as sourced from the Secretary of State in Mississippi.

Q. Uh-huh.

A. You had the ACS CVAP five-year estimate as -- accessed for the period 2017 to '21.

Q. Uh-huh.

A. And then you started out mentioning my calculation of -- my -- my percentage showing 70.3 percent --

Q. Uh-huh.

A. -- of 2177 --

Q. Uh-huh.

A. -- equals 1530. Those are the numbers you've given me.

Q. Yeah. So just to sum up there, when I ran the calculation of the CPS estimate of voter turnout in Mississippi, we got 1.57 million, about. And here, the Mississippi Secretary of State's office is reporting about 1.31 million.

A. Yes.

Q. Is that right?

Okay. So comparing the 1.31 million votes reported by the Mississippi Secretary of State's office with the 1.57 million votes estimated by the CPS, the CPS' report is about 250,000 votes over the actual results reported by the State?

A. Yeah. If you've done the arithmetic correctly, yeah, that's the difference between the numbers.

Q. Okay. And that's about 20 percent?

A. I'll take your word for that, yeah.

Q. Okay. Is it fair to assume that this over-reporting on the CPS might be due to survey respondents saying -- due, in part, let's say, to -- to survey respondents saying they voted when maybe they

didn't actually vote?

A. That's one possibility, but I don't see the two sources of data that you've provided as having any bearing on the CPS number because the CPS is an entirely different survey. It's -- I -- I wouldn't expect the numbers to be consistent at all.

Q. Why wouldn't you expect these numbers to be consistent?

A. Because the CPS is not based on five-year CVAP data. It is -- it is based on their own sample design for the CPS, which is an entirely different data-collection enterprise. And the -- the simple statement I can make is that if you wanted to gain insight into the 2020 CPS value, looking at the five-year ACS CVAP or the administrative record count of votes cast would not inform me at all about the accuracy of the -- of the CPS because these are entirely different universes.

Q. Uh-huh.

A. The -- the latter two sources of data that you have cited really are not comparable to the -- what the CPS does when they collect -- when -- when they do their survey.

Q. Okay. But the 70.3 percent turnout rate, we got that from the CPS, right?

A. And that's based on the CPS.

Q. Uh-huh. Okay. Okay. So acknowledging that these are different data sources, is it fair to say there's about -- there's -- there's about a gap of 255 -- 250,000 voters between the official vote counts and the estimate provided by the CPS?

A. I haven't done the arithmetic, but I would say that there's a -- there would be obvious differences between these three because they're three different forms of data collection.

Q. Uh-huh.

A. And in the comparisons that you've set up here, the ACS CVAP and the administrative record data are -- are -- my simple answer is they're not at all comparable to the CPS frame of data that are being used. They just -- I -- I think any demographer would say you can't -- you can't infer anything from the two other sources about the CPS because it's its own separately designed sample that's drawn from which calculations are made that are internally consistent.

Q. Okay. So we can't infer anything from differences between the CPS and vote counts as reported --

A. You --

Q. -- by the state?

A. You could only say -- no, I mean, they just -- they're not comparable. They don't -- they're just apples and oranges.

Q. Okay. Turning back to Table 4A -- just give me a moment. Oh, here we are.

MR. CARDIN: That's Exhibit 9?

MS. SMITH: Yes. Thank you.

Q. (BY MS. SMITH) So turning back to Table 4A, which is Exhibit 9 in the record, and looking back at Mississippi again.

A. Yes.

Q. And I see that the margin of error listed for the 70.3 percent figure we just spoke about is 3.2 percent. Is that right?

A. That's the column under -- under the heading "Voted," "Margin of Error"?

Q. Yes.

A. Yeah.

Q. So "Voted," "Margin of Error."

A. Right, right.

Q. Margin of error for 70 --

A. Yes.

Q. -- .3 percent, having voted being 3.2 percent?

A. Yes.

Q. Okay. So as I calculate it, the lower bound

of the margin-of-error range for the estimate of Mississippians who voted in 2020, being 70.3 percent minus 3.2 percent, multiplied by that overall figure, 1.57 million, would put us at about 1.49 million?

A. Just give me the last three. I have 70.3 minus 3.2 --

Q. Yes.

A. -- equals what again?

Q. I don't -- I don't recall off the top of my head.

A. Okay.

Q. I multiplied that by --

A. Okay. Well, the -- the number the -- the --

Q. -- the CVAP.

A. -- 70.3 minus 3.2 is --

Q. Yeah.

A. -- 67.1.

Q. Yes.

A. And that percent multiplied times -- what are you multiplying it by?

Q. Times the estimated CVAP in Mississippi from the Census being 2,200,000 -- 227,795.

A. Yeah.

Q. So I multiplied --

A. You multiplied that, and --

Q. -- that.

A. -- and you got that.

Q. Yeah. So I multiplied 67.1 --

A. Yeah.

Q. -- percent of 2.227795 million, and I got about 1.49 million.

A. All right.

Q. Okay. So lower bound of the CPS range of possible estimates is 1.49 million, using their margin of error, right?

A. Well, that's what you've calculated. And as I've said before, it -- I -- I agree with the arithmetic that you've done, but --

Q. Okay.

A. -- I don't agree that it has any bearing on -- on anything to do with the CPS.

Q. Uh-huh.

A. That's a number that you would derive trying to estimate something based upon the ACS CVAP and another number that you've -- you've grabbed from this data source. And as I say, it's an apples -- it's combining apples and oranges, and it yields a number that you said correctly is 1.49 million.

Q. Okay.

A. And if you asked me to interpret it, I have no

idea what it means.

Q. Okay. So the lower bound of the estimate here provided by the CPS and combining that with the estimate from the Census, so the same institution putting out the survey of the population still puts us over 170,000 more people than the actual vote count that we see from the Secretary of State's office?

MR. CARDIN: Object to the form.

You may answer the question.

A. It's a hypothetical calculation of apples and oranges, and I don't know what to say about it. I don't -- it has no meaning to me.

Q. (BY MS. SMITH) Okay.

A. It -- it -- I can say your calculation has no meaning to me, but I think you've done it correctly.

Q. Okay. I think we can move on. So let's look back at your report Page 4 now, and I'm looking at Footnote 5.

A. All right.

Q. So you said here that, quote, studies have documented specific instances where respondents' self-reports appear to have exaggerated actual measured rates of voter registration and/or turnout, right?

A. Yes.

Q. Okay. When you refer to those, quote,

specific instances where respondents' self-reports might be shown to have exaggerated measured rates of voter registration and/or turnout, what specific instances are you referring to?

A. I'm referring to the political-science literature that -- that -- where studies of particular elections in particular years in particular states have shown, by the standards of the study, that self-reports appear to have exaggerated actual measured voter -- voter rates. So people find exceptions out there in the world of elections based on administrative record data to what is shown in self-reports for those particular instances. Those are instances that may not be about Mississippi or they may be instances that include many states including Mississippi in one year, but none of them, to my knowledge, covers any span of time on a regular basis.

Q. Uh-huh.

A. So I acknowledge that there is -- this is a -- there's a controversy in the political-science literature as to whether or not this is a problem, a measurement problem. Some say yes; some say not really.

Q. Okay. Well, we'll -- we'll talk a bit more about that. But looking now at the fourth full paragraph on Page 4, you say here that -- I'm looking

at -- I believe it's the third sentence. You say that -- you quote: Do not disregard the possibility of over-reporting a registration or turnout by Black voters on the CPS. Do I have that right?

A. That's correct.

Q. So it's your view that there -- there's a possibility of over-reporting on registration or turnout by Black voters on the CPS?

A. Anything is possible here.

Q. Okay. Okay. But then you conclude here also on Page 4 that the data strongly suggests an apparent change since 2004 in Black political participation?

A. That's correct.

Q. Okay. And in the last sentence of this paragraph, you note that you question attributing the historical break you conclude occurred after 2004 to a presumed differential over-reporting on the part of Black voters relative to Whites, right?

A. Correct.

Q. Okay. So just to make sure I'm clear on your view, is it your view that Black voters differentially over-report registration and voting on the CPS or not?

A. I cannot say -- in answering the question, I cannot say that I have an assumption there. I'm talking in this paragraph here, where I said specifically

"attributing this historic break to a presumed differential over-reporting on the part of Black voters" -- that's -- that's -- that's the part I don't -- I -- I question.

Q. Okay. So just to make sure I'm understanding, you do conclude, based on your review of the literature in this field, that Black voters differentially over-report registration on the CPS, or do you dispute that?

A. I -- I don't have any conclusion about that.

Q. Okay.

A. I have stated here that I do question attributing the historic break.

Q. Uh-huh.

A. That's all I'm referring to, is the break, because that implies something else.

Q. Okay. But you don't offer a view on whether Black voters are differentially over-reporting registration and voting?

A. I -- I don't have any view on whether voters generally over-report, and I don't have any views on whether Black voters over-report more or less than White voters over-report. I only have a view that refers to the possible -- to the historical break and whether that can be attributed to differential over-reporting on the

part of Black voters relative to Whites. That means Black voters started doing something differently but White voters didn't.

Q. Okay. So in your view --

A. That's what --

Q. -- there's a historical pattern that changes in 2004, and that is that Black voters start to politically participate more than White voters, and that can't be attributed to differential over-reporting?

A. No, that's not my view at all.

Q. Okay. I'm sorry. What's your view exactly?

A. What I'm saying is you cannot say that the historic break -- or I should say it is highly implausible that you can attribute the historical break to Black voters over-reporting more than they were before but White voters did not over-report more than they were before.

Q. Great. Thank you for clarifying that.

A. That's what the word "differential" means in that sentence.

Q. Okay. Perfect. Thank you for walking me through all of that.

So I want to talk about your testimony as an expert witness for the defendants in a case called Thomas versus Bryant, also here in Mississippi. And I

have a copy of -- we can mark that for the record.

(Exhibit 11 marked.)

Q. (BY MS. SMITH) This is going to be Exhibit 11 for the record, and this is Thomas v. Bryant, district court decision from the Southern District of Mississippi at 366 F. Supp. 3d 786 from 2019. Okay?

A. All right.

Q. Great. Do you remember offering testimony for the defendants in this case?

A. I -- I recall doing it. I don't recall the exact details of it. I just have to remember which case this was.

Q. Sure. So looking just at the synopsis here, three African-American voters brought an action in Mississippi alleging the boundaries of a Mississippi senate district violated Section 2 of the Voting Rights Act?

A. Yeah, I'm trying to put this in perspective as to what this was about, what my participation was. I'm still not recalling exactly which case it is, but --

Q. I think -- let's -- let's -- let's talk about that. So I -- I believe you offered testimony about voting turnout in Mississippi, as well. And let's turn to Page 9, and we can talk more.

A. That might help refresh --

Q. Yes.

A. -- my memory on this.

Q. Great. So turning to Page 9, looking at the right-hand side. And I'm at the third full paragraph.

A. Right. Yeah. Now -- this is coming back to me now.

Q. Great.

A. I've got it.

Q. Great. So I'm seeing that you, quote, gathered Census data about voter turnout in Mississippi using surveys from even-numbered election years spanning 2004 through 2016 to show that African-Americans self-reported higher turnout rates than White voters, and you concluded that, "These data furnish convincing evidence that African-Americans in Mississippi have access to the political process and have participated in that process at ever higher rates in recent years." Do I have that right?

A. Just -- I -- I -- I think you have it right. Just point to me the paragraph under --

Q. (Indicating.)

A. Okay. I get you.

Q. Yeah, the --

A. The "finally" --

Q. -- third full paragraph.

A. The one that begins "finally." Okay.
Q. Yes.
A. Let me just read that.
Q. Okay. So as I understand it, you gathered --
A. Hold on. I just want to read --
Q. Oh, yeah.
A. -- the paragraph, just --
Q. Oh, take your time.
A. -- so it will bring it back.
Q. Please.
A. Okay. I'm set to go.
Q. Okay. Thank you. So would you agree with me that your conclusion in this case is similar to your conclusion that you're offering in this case -- in -- I'm sorry -- in the -- in the Mississippi versus -- the NAACP versus SBEC case that we're talking about today, your conclusion is similar to the conclusion you offered in the Thomas v. Bryant case here?
A. I wouldn't say they are similar. I would say the -- the conclusion was drawn in the same way that I draw conclusions, generally, as a demographer looking for patterns in elections.
Q. Okay. And in this case, you concluded that African-Americans self-reported higher turnout rates than White voters in a period spanning 2004 through

2016?

A. Yes.

Q. Okay. And in this case, you're also offering survey data to show that Black voters self-report higher turnout rates since 2004? In this --

A. Yes, yes, yes, I see it. I was referring specifically to the time series there of self-reported turnout, right.

Q. Okay. Okay. So in your report -- let's actually mark your report from the Thomas v. Bryant case.

(Exhibit 12 marked.)

Q. (BY MS. SMITH) So I'm marking as Exhibit 12 for the record your report from January 7th, 2017 in the case Thomas v. Bryant. All right?

A. All right.

Q. Great.

A. Thanks.

Q. Okay. Do you recognize this document as the report you submitted in the Thomas v. Bryant case on January 7th, 2019?

A. Yes, I do. Let me just take a look through it because I need to refresh my memory --

Q. Sure.

A. -- on how I did this.

Q. If it helps, the relevant part that I want to talk about is on Page 3 --

A. All right.

Q. -- at your Table 1.

A. Yeah, that's what I'm looking at. Right.

Q. Great. So --

A. Hold -- yeah, hold on. Let me just -- let me just take a look at this.

Q. Sure. Perfect.

A. Okay. What were your questions about this?

Q. Great. So let's look at Table 1.

A. Yeah.

Q. Would you say that this analysis here in your Thomas v. Bryant expert report on voter registration and voter turnout is similar to the analysis you've done for this case?

A. Well, all I can tell you is that the source here is the Current Population Survey voting and registration tables, and I -- I can't tell you for sure that the table that I got for each one of these years in this study is the identical downloaded table it should be or -- it cert- -- it certainly came from the same source because it's the CPS, the Current Population Survey.

Q. I understand. So in both -- in both cases,

you looked at the CPS?

A. That's correct.

Q. And in both cases, you calculated Black voter registration and turnout and you compared it to White voter registration and turnout?

A. Yes. And I -- I see here there's a -- a note that we're talking about very specific definitions, Black alone than any -- rather than any part Black.

Q. Uh-huh.

A. And we're also talking about -- there was a change in the data from voting age population 2004 to '10 to CVAP from 2010 to '16.

So I -- I can't tell you, as we sit here today, whether numbers in this table ought to agree with numbers in my table in the current case that we're talking about in this deposition.

Q. Uh-huh.

A. But the source are the same.

Q. Uh-huh.

A. And in each case, the source in both the study we're discussing here and the one that the deposition is about are sourced from the Current Population Survey, which is a scientific survey.

Q. Fair enough. So in both cases, you're reporting political participation by race in Mississippi

using the CPS data?

A. Correct.

Q. And do you remember what the Court decided in that case about your conclusions?

A. I remember that the Court ruled in favor of the other party, not -- not the -- not the side that I was engaged on.

Q. And you don't remember what the Court decided about your testimony specifically or what they commented on?

A. I -- I don't have any clear recollection other than I think it was -- I really don't know why. I -- I don't know how the result came about.

Q. Okay. That's fine. So let's turn back to the opinion itself. Let's turn to Page 14. And I'm looking at the bottom right-hand corner on the page. And it's --

A. Okay. Tell me, again, which one am I looking at?

Q. Oh, you're looking at Exhibit -- it should be 11.

A. 11.

Q. This is the Thomas v. Bryant opinion.

A. Yeah. Okay. Let me get that out. I think I put that away somewhere.

Q. I think you have it (indicating) --

A. Okay. There we go.

Q. Great.

A. Now you want me to turn to Page 11?

Q. Sorry. Page 14 now.

A. Page 14?

Q. Yeah, of Exhibit 11.

A. All right. Page 14. All right.

Q. Thanks for your patience there. So on Page 14, now I'm around the bottom right-hand corner of the page with the sentence starting "the defendants' expert."

A. Uh-huh. Yes.

Q. And you were the defendants' expert they were referring to here?

A. Correct.

Q. Okay. So the Court there says, quote: The defendants' expert sought to minimize the on-the-ground realities by pointing to statewide data showing that African-American Mississippians report higher voter turnout than White Mississippians in even-year elections.

Right?

A. Yes.

Q. And then they said, quote: These data points

fail to persuade. They look at the wrong jurisdiction, the wrong election years and rely upon known issues with self-reported voting surveys, issues that EI, in contrast, seeks to overcome.

Do I have that right?

A. Yes.

Q. Okay. And just really quickly, because it's mentioned here, I saw no CPS data is reported for odd-numbered years in your -- in your report; it's all even-numbered years.

A. I -- yes, yes.

Q. And the CPS doesn't report data for odd-numbered years?

A. Not that I know of, no.

Q. And Mississippi holds elections in odd-numbered years, right?

A. I'll take your word for that.

Q. Okay. Let's turn back one page to Page 13, bottom left-hand corner of this document. I see that the Court says here that you, quote, conceded that the Census explicitly cautions that survey respondents over-report their voting behavior. Right?

A. Which paragraph is that? Lower right?

Q. Oh, yeah. Sure. So we're on the --

A. Oh, I see. Okay.

Q. -- fourth full paragraph.

A. Okay.

Q. I'll just --

A. Yeah. Okay. I see it.

Q. I'll just read the --

A. Sure.

Q. -- the full quote.

A. All right.

Q. So, quote: Dr. Morrison is an experienced demographer. He knows the problems with his testimony.

And then I'm moving on to: He did not look at voter turnout in odd-numbered years, and he conceded that the Census explicitly cautions that survey respondents over-report their voting behavior.

Do I have that right?

A. Yes.

Q. Okay. I guess, what do you think of that assessment?

MR. CARDIN: Object to the form.

But you may answer the question.

A. He -- that -- that's -- that's what I said.

Q. (BY MS. SMITH) Okay. So you conceded in that case that the Census explicitly cautions that survey respondents over-report their voting behavior?

A. I made that point in this particular context,

yes --

Q. Uh-huh.

A. -- based -- based -- excuse me -- based on the state of knowledge at that point in time about over-reporting and under-reporting.

Q. Okay.

A. And that point in time, whatever the date was --

Q. So this was --

A. -- was -- yeah, that -- that's what was -- that's what political scientists whose work I had consulted -- that was the state of the political-science knowledge as I gleaned it from the political-science literature at that earlier point in time.

Q. But your testimony was that the Census explicitly cautions that survey respondents over-report their voting behavior, right?

A. Yes, I'm sure the Census Bureau explicitly cautions that somewhere in their -- in -- in what they say today since it's one of their --

Q. So would that point change based on -- their -- their explicit caution about over-reporting --

A. Yeah.

Q. -- would that change based on any literature since 2019? I'm just speaking about their

acknowledgment.

A. No, their -- I -- I think they were acknowledging what they knew from the political-science literature.

Q. Okay.

A. And -- and I -- let me take that -- I believe the Census Bureau was saying that they know that when respondents self-report, they can over-report or under-report on anything they ask them about. That's -- that's kind of like a -- they know that for a fact. That's what they watch out for.

Q. All right. So this issue went up on appeal, as well. So let's just look at what the Fifth Circuit had to say here. So I'm going to mark as the next exhibit -- that's going to be Exhibit 13.

(Exhibit 13 marked.)

Q. (BY MS. SMITH) For the record, this is Thomas v. Bryant Fifth Circuit decision from 2019 at 938 F. 3d 134, right?

A. Okay.

Q. All right. So do you -- let's turn to Page 18. All right. And I'm on the first full paragraph on the right-hand side --

A. Uh-huh.

Q. -- starting with the sentence starting

"however." It says, quote: However, the data used by Dr. Morrison had serious problems. It was self-reported rather than based on official state records. It was -- it came from statewide elections as opposed to District 22 elections and from even-numbered years for federal elections as opposed to odd-numbered years for state elections.

Do I have that right?

A. Yes.

Q. Okay. So the Fifth Circuit found that the data you used had serious problems, being the CPS data, in that it was self-reporting rather than based on official state records?

MR. CARDIN: Object to the form.

You may answer the question.

A. That -- that's what it says here, yes.

Q. (BY MS. SMITH) So in -- were you aware that either the Southern District of Mississippi or the Fifth Circuit had commented on your analysis?

A. Oh, yes. I mean, I was aware -- I was aware what the judge said in the case.

Q. Oh, you were aware? Okay.

A. Oh, yeah, I've seen this.

Q. You've seen this before?

A. I mean, it's -- I -- I read it.

Q. Okay.

A. It's not a surprise. I --

Q. You read it at the time?

A. Yeah, yeah.

Q. Okay.

A. He -- he saw -- the -- the judge, who had a lot of familiarity with the locale, saw the limitations of the demographic approach that I took.

Q. Okay. So after the Southern District of Mississippi and then the Fifth Circuit addressed this issue of over-reporting of Black turnout on the CPS, did you look into the issue further?

A. No, because I have -- demographers have no way of looking into what's over-reported. We use Census data. And I'm fully aware, based on this case, that the Census Bureau's data are as they say. They -- they're -- they -- they are what they are. The Census Bureau, you know, it puts in caveats.

Q. Sorry. So is it your testimony that demographers can't look into the issue of over-reporting of Black turnout on the CPS?

A. Not -- not in any way that I know how because they -- we rely on the Census Bureau for scientifically accurate data, and we are aware of the caveats that apply.

Q. But you testified earlier that you have followed the political-science literature on --

A. Yes.

Q. -- the CPS?

And so you haven't looked at any political-science literature on over-reporting of Black turnout?

A. Oh, no, I've -- I'm -- I'm aware of what the literature says. And what I'm saying is that the over-reporting that the Census Bureau acknowledges can occur is a given. And when you look over time, it's one factor you have to consider. And in this case that we're talking about here, I was assembling data on elections, and the judge called attention to the fact that there's over-reporting, which I don't dispute. I was not looking at 40 years' worth of time trend in this case.

Q. Okay. So after the judges made this finding and you reviewed that finding, did you do anything to change your methodology to account for the flaws the Court noted, being the issue of over-reporting --

MR. CARDIN: Object to the form.

Q. (BY MS. SMITH) -- of Black turnout?

MR. CARDIN: You may answer the question.

A. I was not asked to do that. And the decision

was already made, so there was -- I can't understand why I would be asked to do it.

Q. (BY MS. SMITH) Oh, no. Sorry. Before you offered a report in this case, did you change any of your methods --

A. No.

Q. -- to account for the over-reporting issue?

A. No. There was no need to.

Q. Okay. And when you reviewed the literature about Black voter turnout on the CPS, what did -- what did that literature say happens?

A. You mean in this present case?

Q. So you testified that you have looked into literature about over-reporting of Black voter turnout --

A. Right.

Q. -- on the CPS. What did -- what did you find when you looked at that literature? What did it say?

A. The literature has identified it as -- over-reporting as a source of concern in using self-reported data. And the literature also shows that there are different points of view about what the over-reporting means and how it figures in drawing conclusions. There is -- it -- it is a controversial topic among political scientists, and I'm aware of the

controversy in that field. And I -- being a demographer, I work with the numbers, and I'm conscious of what -- what is being said about that controversy.

Q. Okay. So after a federal judge here discounted your report in the Thomas versus Bryant case based on, in part, the limitations of self-reported voting surveys, you continued to use them when you were producing your report in this case?

MR. CARDIN: Object to the form.

You may answer the question.

A. I used the CPS with full knowledge of its limitations over a long period of time, yes.

Q. (BY MS. SMITH) Including over-reporting?

A. I -- I was aware of -- I -- I was fully aware of that issue and that concern, yes.

MS. SMITH: Okay. I think we can take a break now because I'm about to change topics, and we can go off the record.

(Recess taken from 11:51 to 11:57 a.m.)

Q. (BY MS. SMITH) All right. So let's again turn to your report. I'm on Page 4. You note here on the first full paragraph each individual percentage in Table 1 is a sample-based measure with a statistical margin of error, right?

A. Correct.

Q. Okay. So as we talked about earlier, the actual percentage could fall within a range of numbers?

A. That's correct.

Q. And did you report that range of numbers for each of the estimates in Table 1?

A. No, I did not include them, but I have them available.

Q. Okay. And what about in Table 2; did you report them there?

A. I think the answer is the same. Yes, I -- the answer is the same.

Q. Okay. And in thinking about voter turnout or voter registration by certain groups of voters, are you able to say whether voter turnout among one group is higher than the other based on survey estimates without looking at the margin of error?

A. I would not want to make any such statements without assembling the data in a way that I could account for the margins of error and test the -- you know, the significance of change from one year to another.

Q. Okay. So why would you want the margin of error available?

A. To document with strict precision the exact point at which one could say there was a change in a

40-year trend.

Q. Okay. And would you want to know it also for an individual year? Say 2008, would you want to know the margin of error when you're comparing voter turnout among one group in one individual year to voter turnout in another group for an individual year?

A. If I wanted to, that would be how I would do it, but that is not my intent here.

Q. Okay. So your intent wasn't to compare individual years of voter turnout estimates to one another?

A. No. I was -- I'm simply concerned with the overall time trend over 40 years, irrespective of the exact statement that one could make and the confidence level of that statement for one year versus another or one group versus another group in a particular year.

Q. Okay. All right. Okay. So you're not contending that Black turnout was higher than White turnout in, say, 2020 on an individual basis?

A. I -- I could do -- I could make such statements, but I haven't -- that -- that's not part of what I intended to do.

Q. Okay. So your analysis does not report differences in voter turnout between individual years?

A. I -- as I say, I had no need to do that. I'm

talking about the overall trend and the change that is apparent starting in about 2002.

Q. Okay. I think we'll talk more about that change in a minute, but for now, I want to talk about the underlying data that you -- the defendants' counsel represent that you used in producing your report. So if I could -- the next exhibit, please, I'll mark as Exhibit 14 for the record.

(Exhibit 14 marked.)

Q. (BY MS. SMITH) I'll represent to you that defendants' counsel e-mailed this to plaintiffs' counsel in the form of an Excel spreadsheet, and I went through and printed out the individual tabs, and I've labeled them for you by year as they were labeled in the spreadsheet.

A. All right.

Q. Does that sound all right? All right. Here you are. So I want to turn to the year 2008. It should be written at the top, which was the label in the Excel spreadsheet, the tab label.

A. All right.

Q. So I'm looking at the tab of the spreadsheet for CPS estimates of registration and voter turnout by race in 2008, and I don't see a margin of error reported here. Is that right?

A. I -- I don't see a margin of error, but I'm just trying to see what you have.

Q. Is there a margin of error for the estimates of White non-Hispanic alone turnout and of Black alone or in combination turnout or registration for either group?

A. Let me just see where this came from. This table is one formatted version of data that provide the numbers -- as far as I can tell here, the numbers apart from the margins of error. I'm -- I'm -- I don't see the margin of error presented here, but that doesn't mean they don't exist. There's -- there's a whole separate table for that.

Q. So they -- I'm sorry.

A. And, actually, I realize this is as of 2008, and I don't know if the American Community Survey or any other -- well, I don't know how they -- how -- I don't know how the Census Bureau gathered these data in 2008, but they, apparently, have not in this table shown margins of error. Let me just read the -- the stuff here. Current Population Survey.

Q. So I -- I don't want to interrupt your reading. I'll give you a moment.

A. Yeah. All right. Is your question about the -- what the margins of error are?

Q. My question is simply: Is -- is there a margin of error reported here in this -- this document?

A. I would assume there is, yes.

Q. In this, do you see a margin of error reported?

A. Oh, I -- I don't see it reported in this table. That doesn't mean it -- it -- apparently, in 2008, they were not -- they were not presenting the full details of people in 2018 would want to see, let's say, or 2022. The format of this table is the way they presented it in 2008. That is not to say that there weren't margins of error that one could obtain by looking for another table showing margins of error.

Q. Okay. So one might obtain a margin of error by going to the Census and getting it from their data, but it's not in --

A. In the --

Q. -- your spreadsheet?

A. It's -- it's not in the table that you've shown me here.

Q. Okay. And it's not in your report, either?

A. No. I -- no. I -- I know where to get it, but I --

Q. Okay.

A. -- I haven't needed it.

Q. Okay. That's fine. So turning to the next page, 2010, I don't see a margin of error here, either. Right?

A. Nor do I.

Q. Okay. And to 2012, same --

A. No margin of error.

Q. -- question: No margin of error?

A. No.

Q. 2014, I don't see a margin of error. 2016 --

A. No.

Q. -- no margin of error? Okay.

And 2018, also no margin of error, right?

A. Yeah. In 2020, they show a margin of error.

Q. Yes. Okay. So --

A. Yeah.

Q. -- from 2008 until 2018, you didn't report a margin of error for the CPS estimates that you used, right?

A. No. What -- what's shown here is that the table that you've accessed did not begin to report the margin of error until 2020. That's not to say that there wasn't a separate table showing margins of error that one could obtain if one looked for them elsewhere. And it may be that they weren't published, but could be obtained upon request.

Q. Okay. So, yeah, this being the spreadsheet that you provided via defendants' counsel, there's no margin of error here in your underlying spreadsheet for those --

A. In the -- in the --

Q. -- entries, 2008 to 2018?

A. Yeah, in -- in Table 2 of my report, I do not show margins of error in -- for any of the years.

Q. Okay. And same for the underlying spreadsheet: For 2008 to 2018, no margin of error is included?

A. In the ones that you got.

Q. Okay. Yeah. But if I maybe went to the -- if I went to the Census, I could find it elsewhere?

A. I'm quite sure you could find it elsewhere, yes.

Q. Okay. Thank you for clarifying that.

For 2008 to 2018, do you know whether the turnout and registration differences you report fall within the margin of error, meaning the estimate for Black voter turnout falls within the margin of error in the interval for White voter turnout, for example?

A. I don't -- I don't know for any particular year what the margin of errors are, and it's not a central question to the time trend that I was looking at

over a 40-year period.

Q. Okay. So you don't know whether the range of margins of error for Black and White voter turnout for individual years overlap with one another?

A. I don't know for any particular year.

Q. Okay.

A. But I -- I would know where to get the data, and I would probably consult it before I finalized my testimony.

Q. All right. So let's look at 2020 for a moment. And here, you do have the margins of error reported, right?

A. Yes.

Q. All right. And under the table, you've labeled the margin of error -- sorry. The font is a little bit small, but as I read it, it says: This figure added to or subtracted from the estimate provides the 90 percent confidence interval.

Right?

A. Yes.

Q. All right. So we're going to do some adding and subtracting again. If you want to get your paper or your calculator, please take a moment.

A. Okay. I -- I want to state in advance of this that I will do my best at calculating numbers you give

me.

Q. Okay. Sure. Best is all we can all do. So -- all right. So looking at the "White non-Hispanic alone" row under the column "Percent Registered Citizen" -- are you with me? It's highlighted in green.

A. Yeah, in -- in green, yes.

Q. Yeah.

A. Okay.

Q. So I see 79.2 there.

A. Right.

Q. And that's the point estimate for percentage of White non-Hispanic alone individuals that is reported by the CPS survey that were registered in 2020, right?

A. Correct.

Q. Okay. And going to the left of that, I'm seeing under margin of error, 3.6. Right?

A. Yes.

Q. Okay. So I just want to walk through how I might calculate the range based on the margin of error that the actual number of White non-Hispanic alone citizens -- what percentage were registered in 2020, according to this data. Okay?

A. All right.

Q. So I believe 79.2 plus 3.6 would be 82.8.

A. Yes. Right.

Q. Okay. And 79.2 minus 3.6 is 75.6?

A. Yes.

Q. Does that sound right?

A. Yes.

Q. Okay. So the actual percent registered White non-Hispanic alone citizens reporting on the CPS -- as reported on the CPS -- excuse me -- falls somewhere between 82.8 and 75.6?

A. Yes.

Q. And we can be 90 percent confident in that?

A. That's the way the data are used, yes.

Q. Okay. Great. And then I'm looking now a few lines below that. We have Black alone or in combination.

A. Yes.

Q. And moving over to the "Percent Registered Citizen" column, I see 83.4. So as I read it, the CPS is reporting that 83.4 percent individuals Black alone or in combination would have self-reported being registered?

A. Right.

Q. Okay. And 4 -- one over -- one to the left over from that, 4.1 margin of error -- 4.1 being the margin of error --

A. Yeah.

Q. -- for that figure?

Okay. So just some math again. So 83.4 plus 4.1 is 87.5?

A. Hold on just a second here.

Q. Sure.

A. As I look at this table, you have margin of error for the total percent registered, but you do not have a margin of error for the percent registered of citizens. I'm just trying to figure out how this table has been set up.

Q. Oh, okay. That's helpful.

A. I -- I don't know that the -- what you're -- what you're computing here are margins of error for the column entitled "Percent Total Registered." And it appears to me -- again, I -- I don't like to do instant analysis with a Census --

Q. Sure.

A. -- Bureau table --

Q. Of course.

A. -- but the column headed "Percent Registered Citizen" does not have an accompanied margin of error for citizens only. Now, that's a -- it may be that you can have the total with the margin of error or you can have the citizens alone without a margin of error.

Q. Uh-huh.

A. And that's one limitation of -- or I should say that's one aspect of this table that would prevent me from applying the margin of error --

Q. Uh-huh.

A. -- for the total to the "Citizen" column instead. I just would have to -- I would have to study this and read the fine print before I could really kind of follow your calculations along and make any informed --

Q. Of course.

A. -- statement about it.

Q. Okay. So it's your testimony that you're not sure whether 4.1 being -- or you're not sure whether the figures in the "Margin of Error" column are referring to percent registered for citizens as opposed to percent registered for total?

A. That is correct.

Q. Okay. Did you make this table?

A. No, I -- I -- I didn't make this table. You made it.

Q. No. So I printed this out, but your counsel --

A. Oh.

Q. -- provided it to me. Do you understand that?

MR. CARDIN: Let's go off the record for

just a second.

(Recess taken from 12:15 to 12:16 p.m.)

A. Let me say that what I am looking at here is a version of the tables that the Census Bureau provides for people who want to look at the table for a particular year for a particular place, and they want to see it on a piece of paper. The Census Bureau also allows one to download a large body of data from -- in a whol- -- in a wholly different way that can be set up as a database.

Q. (BY MS. SMITH) Uh-huh.

A. And it is the database that, I believe, would allow me to answer the questions that you're asking, but I can't answer them based on these data because these are really for public consumption as opposed to a database for statistical analysis and tabulation and preparing the kind of table that I had here. And I -- I don't know what to say about it, but it -- the Census Bureau provides data in different forms for different purposes.

Q. Uh-huh.

A. And what we have here is an example of people who want to see a table on a piece of paper as opposed to a data scientist who wants to set up a database to be interrogated by me and put together in a customized way

for analysis, which in this case of Table 2 in my report is designed to show, in the simplest form, a time series over time and a graphic representation in Figure 1 on Page -- Page 5 of my report. So I just -- that's -- that's a caveat I want to make known to you.

Q. Okay. Sure. So --

A. And now, continue to ask the questions, and I'll answer them --

Q. Of course.

A. -- as best I can.

Q. So just to make sure I'm clear, this is the data you relied on in producing your report? That's what you represented to us via defense counsel? This is the spreadsheet that you provided?

A. This is the spreadsheet that has been provided, yes.

Q. By you? By you?

A. Yes.

Q. Okay. And you did not make this table, or you did make this table?

A. This --

Q. Looking at the spreadsheet now.

A. The -- the spreadsheet --

Q. Uh-huh.

A. -- is the table that I believe I would have

accessed if I had gone online and requested it as a table as opposed to as a -- as an element of a database with the full information.

Q. Did you make this spreadsheet, or did Thomas Bryan make this or someone else?

A. I -- I honestly don't recall whether this was mine or whether -- this looks, to me, like this is something that I would have downloaded myself to look at it.

Q. All right. So you're not sure whether you made this spreadsheet?

A. I'm not sure. I mean, I -- I don't know. This looks, to me, like the source that you would get if you went to the website --

Q. Uh-huh.

A. -- at the bottom. That's -- that's one way of getting it.

Q. Okay. And you're not sure whether the margins of error for percent registered citizen is included here? You don't know whether --

A. That's correct. I'd have to check on that.

Q. So I think we can move on from that since -- I -- I just wanted to walk through the margin-of-error calculation. But if you're not sure --

A. Sure.

Q. -- if that's the right one, I don't want to say anything --

A. All right.

Q. -- misleading. All right. So why don't we move on. So let's actually turn to the tab for the year 2016 in this same spreadsheet.

A. All right.

Q. Okay. And as we talked about earlier, there's no margin of error listed here in -- in your spreadsheet. So I'll represent to you I -- I looked at the margin of error for some other years when I couldn't find it.

A. Yes.

Q. And I'll represent to you that as the Census Bureau reports it, in 2016 -- and I'm looking at "voter turnout White non-Hispanic alone" -- the figure you reported for "percent voted citizen" here was 67.7. Looking at -- under "Voted," under "percent voted citizen for White non-Hispanic alone," I see 67.7.

A. This is 2016?

Q. Yes.

A. Oh, I'm sorry. Okay. Yeah. I got it. Okay. I see.

Q. Okay. 67.7?

A. Right. Yeah.

Q. Great. All right. And I'll represent to you, when I looked up -- as you note, the Census Bureau does make this public. So I looked up the margin of error, and for this figure, it was 3.3. All right?

A. All right.

Q. All right. So let's do that calculation again, but this time, we can be -- we can use that 3.3 number because I looked it up --

A. All right.

Q. -- and I have it available.

Okay. So the interval for voter turnout would be, at the bottom of the interval, 67.7 minus 3.3 --

A. Yeah.

Q. -- which would be 64.4?

A. Yeah.

Q. Okay. And then the top of the interval would be 67.7 plus 3.3 --

A. Yes.

Q. -- which I calculate to be 71?

A. Right.

Q. Okay. So the interval for range of possible estimates as reported by the CPS for White non-Hispanic alone voter turnout in 2016 would be 64.4 to 71?

A. That's correct.

Q. Okay. Let's do the same thing for turnout under Black alone or in combination. All right?

A. Yeah.

Q. All right. So the point estimate you report for 2016 is 69.2 for Black alone or in combination percent voted citizen?

A. Yeah. Yeah, I gotcha. 69.2.

MR. CARDIN: Yeah, object to the form.

But you may answer the question.

THE WITNESS: All right.

Q. (BY MS. SMITH) Okay. So let's do the range of possible estimates again. So 69 -- oh, sorry. I didn't already mention this. I also looked at the CPS margin of error here for Black alone or in combination percent voted citizen, and that margin of error was 5.2. Okay?

MR. CARDIN: Object to the form.

You may answer the question.

A. All right. I'm -- the answers I'm giving are premised on -- I should say I -- I don't know where you got the margin-of-error-data from, so --

Q. (BY MS. SMITH) Okay.

A. -- I'm taking the numbers you're giving me and you're representing that -- that you've correctly accessed them.

Q. Yes, I'm representing --

A. And I can't -- I can't validate your numbers, so you're giving me --

Q. No, that's very fair.

A. All right.

Q. So I'll represent to you that I looked up the CPS margins of error that they reported and that I saw 5.2.

A. All right.

Q. But I take -- I take your point that you don't know --

A. Sure. Yeah.

Q. -- the margins of error here.

A. These are the numbers you're giving me --

Q. Yeah.

A. -- and we're talking about a hypothetical --

Q. Right.

A. -- analysis based on numbers you gave me.

Q. Based on numbers I have --

A. Okay.

Q. -- because you don't have them here.

A. Because you -- you accessed them and I didn't access them. Okay.

Q. That's right.

MR. CARDIN: And -- and my objection is

objection to the form of the question for this whole line of questioning for that reason.

MS. SMITH: Okay.

MR. CARDIN: But you may go ahead and answer.

MS. SMITH: Fair enough.

Q. (BY MS. SMITH) So taking my representation of 5.2 just for purposes of this --

A. Yeah.

Q. -- discussion, let's do the range of possible estimates for Black voter turnout again. Okay?

A. Uh-huh.

Q. Okay. So I -- as I calculate it, 69.2 minus 60 -- minus 5.2 would be the bottom of the range of possible estimates --

A. Right.

Q. -- for Black voter turnout in 2016, and that would be 64?

A. 64 percent, right.

Q. Okay. And then the top of the range of possible estimates would be 69.2 plus 5.2?

A. Yeah.

Q. And that would be 74.4?

A. Right.

Q. Okay. So does a range of 64.4 to 71, which

was the range of White voter turnout possible estimates that we just discussed --

A. Uh-huh.

Q. -- overlap with the range 74.4 to 64?

A. Yes, it does.

Q. Okay. So is it fair to say that the range of possible estimates that the CPS reports for Black voter turnout in 2016 that you report in Table 1 overlaps with the range of possible estimates the CPS reports for White voter turnout in 2016?

A. Based on your data, yes, that's a correct --

Q. Okay.

A. -- conclusion to draw.

Q. Based on the data that I'm representing to you --

A. Yeah.

Q. -- I pulled --

A. That's right.

Q. -- from CPS? Okay.

Does the point estimate you report for Black voter turnout -- so that's 69.2 -- fall within the range of possible likely estimates of White voter turnout? So that's 64.4 to 71.

A. The way I would state it is I cannot rule out with scientific certainty that it does not overlap.

Q. Okay. Does 69.2 fall within 64.4 to 71?

A. Say that again, just so I see --

Q. Yeah, I'm just asking you --

A. Yeah.

Q. -- if 69.2 is between 64.4 and 71.

A. Oh, yes.

Q. Okay.

A. Yeah, yeah. I see. Okay.

Q. I just simplified it --

A. Right.

Q. -- a little bit there.

A. All right.

Q. Thanks. So -- and then vice versa. So does the estimate of White voter turnout, which you reported as 67.7, fall within the range of possible estimates that we just calculated for Black voter turnout based on the margins of errors that I represented to you, which were 74.4 to 64?

A. Yes, it does fall within that range.

Q. Okay. And what does it mean for the point estimates for Black turnout to fall within the range of possible estimates for White turnout?

A. The statement that -- the conclusion that I would say it warrants is one cannot rule out with scientific certainty the possibility that there is no

difference in turnout between the two groups or that one group exceeds the other group. And that could go either way. It could be the reverse of Whites. In other words, just -- you can't draw any conclusions from this about the difference. You can't rule out anything with scientific certainty.

Q. So Black voter turnout could be lower than White voter turnout --

A. It could be.

Q. -- in 2016?

A. You can't rule that out as a possibility from these data.

Q. Okay. Do you know, for all the other years since 2004 you report and you discuss in your report, if the point estimate for Black voter turnout or registration falls within the range of possible estimates for White voter turnout or registration?

A. I -- I know where to get those data, but that wasn't the basis on which I drew my conclusions.

Q. And sitting here today, do you -- do you know if they overlap?

A. I -- I would -- I would assume there's a reasonable possibility that they overlap quite often.

Q. Okay. And -- okay. So you drew your conclusions about the pattern you observed happening

since 2004 without looking at possible overlap between margins of error for Black voter turnout or registration and White voter turnout or registration?

A. I didn't look at the individual years themselves because that's not -- that's not what I'm basing my opinion on.

Q. Okay. So you calculated the patterns without looking at the possible range of estimates and whether they overlap?

A. No, that's -- that's not a correct statement. I used a different criterion for evaluating the historical pattern over 40 years, and it's a binary comparison.

MS. SMITH: All right. I think I'm done for now, and we can -- it's 12:30 -- it's about 12:30. So we can take our break for lunch, if that works.

MR. CARDIN: Okay.

(Recess taken from 12:31 to 1:04 p.m.)

Q. (BY MS. SMITH) All right. I'm turning back to your report, Page 4, and the third full paragraph.

A. All right.

Q. And I hear you use the -- I see you use the phrase "statistical" -- sorry. I'm in the second full paragraph, the third paragraph.

A. Uh-huh.

Q. Yeah. I see you use the phrase "statistically insignificant." What is statistical significance?

MR. CARDIN: Objection to the form. Could you restate?

MS. SMITH: Yeah, I can rephrase the question.

MR. CARDIN: Yeah. Where are you?

MS. SMITH: Page 4, the second full paragraph.

MR. CARDIN: Uh-huh.

MS. SMITH: I referenced that Dr. Morrison used the term "statistically insignificant."

MR. CARDIN: Is that in the third line of the second paragraph?

MS. SMITH: Yes, that's right.

MR. CARDIN: Is that what you're referring to?

MS. SMITH: "Statistically insignificant."

MR. CARDIN: Okay.

MS. SMITH: And I'm just --

Q. (BY MS. SMITH) My question is: What is statistical significance?

A. The word "significance" refers to the likely

reality of what appears to be a difference between two numbers. Statistically significant in that context means that when you see a difference between two numbers -- and I use an example here. Do you have a fever? You have a -- your temperature is -- should be 98.6, and the thermometer says it's 98.7. You can understand that to be an insignificant difference. And the term "statistically" would mean it's referring to a population of many people or many instances in which you see that difference. That's the only way I can explain it to you.

Q. Okay. So is it a way of demonstrating whether results from a survey are explainable by random chance or whether they're consistent with a researcher's hypothesis?

A. When you -- what did you mean by "it"? Do you mean statistical significance?

Q. Yeah. Is statistical significance a way of evaluating whether results are explainable by chance versus whether results are consistent with a research hypothesis?

A. I'd -- I'd say that's a fair statement, yes.

Q. Okay. So it helps us know whether we can draw conclusions from the difference between two estimates?

A. I would say it's the basis for drawing

conclusions.

Q. Okay. So would it be fair to say if the difference between two estimates is not statistically significant, you can't conclude with certainty which one is higher and which one is lower?

A. In the hypothetical case that you're describing here, yes.

Q. Okay. And in your field, is it important to consider whether the difference between two estimates is statistically significant?

A. It depends on what kind of conclusion I'm seeking to draw from a particular year of data.

Q. Okay. So if you're looking at two estimates, say, for one year, voter turnout by one group and voter turnout by another group, you can look to statistical significance to conclude which one is higher and which one is lower?

A. Not in a -- not necessarily in a particular year. That -- that's an important point to understand. What you may be able to do is say one number was higher than the other. With the thermometer analogy, it was 98.7, whereas it should have been 98.6. And that's all you can know from it, is that it is -- it differs in a direction rather than a quantity that would be statistically significant in that particular instance,

such as 103 versus 98.6, which would be medically significant.

Q. Okay. So in the example you just used, you would use statistical-significance testing to know whether one temperature -- an estimate of one temperature was a meaningful difference from an estimate of another temperature? Is that what you're saying?

A. No, that's not what I'm saying.

Q. Okay. Would you mind --

A. What I'm saying is simply: Is one number equal to or above or below the other number?

Q. And you use statistical-significance testing to determine that?

A. No. I -- I'm saying that's what I observe in any particular year.

Q. Uh-huh.

A. It's analogous to flipping a coin, and did it come up heads or tails. And that's the model I have in mind.

Q. Okay. Just in terms of telling the difference between two -- individual two estimates -- so taking aside the point about patterns --

A. Yeah.

Q. -- that you've made, how would you tell whether the difference between two numbers is

statistically significant?

A. You take the quantity as shown on the table, and you have to look them up in a statistical table that says: At what point did the differences attain, let's say, 80 or 90 percent significance statistically or 95 percent or 99 percent? There's a regular way of saying how confident can I be that the numbers differ for this particular year --

Q. Uh-huh.

A. -- by analogy for this particular thermometer.

Q. Okay. Are there tests that help demographers or statisticians evaluate statistical significance between survey estimates?

A. Oh, yeah. Yeah, there's -- it's a standard test that one applies.

Q. Would that be a T-test? Would that be one such type of test?

A. That's one test. I don't know if that's the one we use here, but there are a number of different tests tailored to the data that one has and the question one is asking.

Q. Okay. Just so I understand, what -- what kinds of tests might help in different situations to evaluate that?

A. I -- I taught undergraduate statistics about

three years ago, and I'd have to go back to the textbook with the appendix to see what the test is called now.

Q. Sure.

A. But I know that there is a test that would apply to each particular year that you're referring to in your hypothetical questions to me.

Q. Okay. So there are tests out there?

A. There are tests for that.

Q. Okay.

A. And then there are other tests that are designed for a series of heads or tails in a coin flip. Did it come up heads or tails? That is to say, did one group come out with a higher number than the other group over and over and over and over year by year, but before it was a reverse trend.

Q. I --

A. That's the model that I have in mind, so I'm --

Q. I understand. And what are those tests called?

A. Again, I'd -- I'd have to look back in the textbook that I used when I was teaching the course.

Q. Okay.

A. But there are -- there are tests to do that. I just have -- you know, I -- I don't remember the names

of them.

Q. You don't remember the names of them?

A. But there's -- there is an applicable statistical test that you use to judge a series of binary possibilities.

Q. Okay. So to make sure I'm understanding, there's a type of statistical test that you can run to determine whether an individual difference between two numbers is statistically significant, right?

A. In this case, in -- in one year, yes.

Q. Okay. And there's also tests that one can use to determine whether a pattern over time is statistically significant?

A. Yes, a historical pattern over many years, whether there is a statistically significant turning point or reversal.

Q. And did you run any of those tests here in -- in your --

A. I haven't yet run them, but I know -- I know for sure that what I see that -- using the flip-of-a-coin test, I can do a simple, you know, calculation that tells me this did not happen by chance.

Q. But you haven't run any tests to do that?

A. I haven't run it. I -- I intend to run the -- I intend to run the formal tests that would document

what I already know, just from my experience looking at trends like this.

Q. Why didn't you run either of those kinds of tests when you --

A. I wanted to make sure I -- I used the right test. And there was kind of a time deadline I had to get the report in, and I said the -- the test that will document the statistical significance of this is something I need to perform. I don't want to use one test when I should use, perhaps, a different test. I want to confer with a statistician colleague to find out the appropriate test that would be used, and that is a test that I will conduct now that I have some time to do it.

Q. And why didn't you do it in the last, say, six weeks or so since you submitted your report?

A. Because I had other deadlines --

Q. Okay.

A. -- and it was -- it wasn't anything I needed to get done, you know, right away, as far as I was concerned.

Q. And earlier, you testified that when you produced your report, you had all the information available that you needed to produce your report with confidence. Is that still your testimony?

A. That's still my testimony. I can tell -- without even doing the test, I can tell, looking at it and -- and doing what I would characterize as a simple calculation of a binary coin-flip test, the -- the possibility of getting -- of -- of a simple coin-flip test, which is analogous to what we have here, there's no way that the change in trend that I pointed to could have come about by chance.

Let me rephrase that. There -- I -- I can say with confidence that there has been a change in -- and -- and I think I said in my report what I knew about it at the time, which is I said at a point in time starting around -- what was it -- '22 -- 2002 to 2004 that there was a change in trend. I think I -- and I don't know where I stated it specifically, but -- actually, it's in -- on Page -- where I stated my -- let's see what page -- Page 3. I've stated it in the -- the bottom paragraph.

Q. Okay. Just give me a moment. I see -- yeah, I saw your Footnote 4 about 10 flips of the coin. What is the statistical principle you're relying on when you use this coin flip?

A. I don't -- I don't know what the name is, but it's -- it's kind of like -- you know, it's a real simple thing. What are the -- what are the odds that

you could get 10 flips of a neutral coin and they would come up heads all 10 times? The chances of that happening are quite remote.

Q. And --

A. And it's that model that I would be applying. I just want to apply the formal test so that I know what the name of the test is. It's -- it's kind of like you just think that way, as a statistician, when you've done it this way. It's a flip -- it's a binary, you know, flip-of-the-coin model.

Q. Okay. So it's your testimony that you know without doing any kinds of statistical tests whether the differences between Black voter registration and voter turnout and White voter registration and turnout that you report are significant? Is that what you're saying?

A. No, no, that's not what I'm saying. What I'm saying is a simple elementary statistical model that I can do just, you know, on the back of an envelope informs me about the conclusion I drew. Before I commit it to writing, I wanted to find out if there is a more elegant model for dealing with the pattern that I see historically that would reveal even more about it. So I have not yet done the test, but I know for -- for certain that I can state with -- with -- I -- I can state with a high degree of scientific confidence that

there was a turning point, and that was the conclusion that I had drawn at the time I drafted this report. And I will supplement it with the formal tests that a statistician would say, "That's what we use today to deal with the simple model that you have called the -- the coin-flip model."

Q. Okay. So --

A. Because there -- there may be more information that can be discerned with a more sophisticated model.

Q. So it's your testimony that you -- for your initial report, you used this coin-flip model and that you plan to offer supplemental expert opinions in this case to do formal -- more formal tests of statistical significance?

A. No. That's not my -- what I'm saying is I'm going to document it by saying the test here is known among statisticians not as the coin-flip model. It's known as the -- I don't know if it's called a T-test or an F-test or an L-test, but there is a name for the test.

Q. Uh-huh.

A. I haven't had a chance to dig out a statistics book and look it up, and I haven't had a chance to confer and confirm with a statistician colleague that this is the test one would use in this situation or

there's, perhaps, a more refined one that might reveal even more about it. But I know that the test that I have used so far is -- is one that I can rely on for scientific certainty to say that there has -- to state the conclusion -- support the conclusion as I've stated it in my report.

Q. And what is the test that you relied on?

A. I call it the coin-flip model. It's -- it's so elementary that, you know, it -- it's the way -- it's the way you test lots of things that are binary that are either -- it's either above or below.

Q. Okay. Is there any literature that you can point me to, sitting here today, about the coin-flip model?

A. I would say any introductory statistics textbook. I don't have one directly on my bookshelf; otherwise, I would have looked it up.

Q. Okay. And in using the metaphor of a coin flip, is it -- is it -- you're saying that, say, heads would be that Black voter turnout is higher and tails would be that Black voter turnout is lower than White voter turnout? Is that --

A. Or the reverse --

Q. -- the metaphor?

A. -- yeah.

Q. Okay.

A. You know, one -- one is above the other.

Q. Okay. All right. I think we'll get into that a little bit more.

Okay. So still on Page 4 of your report, which is Exhibit 2. I see you have it there. On -- you say that, quote -- and this is the same paragraph: Statistically marginal differences appearing over many successive years can substantiate an authentic pattern over time.

Right?

A. That's correct.

Q. What is an authentic pattern?

A. A gen- -- it means it really exists. It's not a mat- -- it's not -- it's not something that is a function purely of Rand and variation.

Q. Okay. And what's a statistically marginal difference?

A. That would be a difference in which the chances of it happening by chance might be 30 percent, in which case you'd say, "Well, I'm 70 percent sure that it's -- one number is higher than the other number, but there's a 30 percent chance -- or let's make it simpler. I'm 55 percent sure that one number is above the other, but there's a 45 percent chance that it's the reverse of

that. So I, basically, know nothing with any certainty. I can just observe it.

Q. Okay. So looking at Table 1 and Table 2 -- Table 1 on the previous page. Let's start there. Is it possible that some of the individual differences in White voter registration and Black voter registration and then, of course, White voter turnout and Black voter turnout are statistically marginal?

A. Oh, it's entirely probable, sure.

Q. Entirely probable. Okay. But you don't know which -- which ones are, or you haven't run any tests to calculate that?

A. I haven't -- I mean, I've -- I've looked at the confidence intervals around these numbers, and I know that they are -- that they -- they often overlap. And that's the reason that I have avoided making any statement about any particular year, because the margins of error do overlap very often.

Q. Okay.

A. So, I mean, I'm aware -- that's -- that's one of the constraints in looking at the table of data and saying, "Well, in a particular year, what do you know about that year?" And the answer is the margins of error overlap, and so it makes it very difficult to say anything more than one is above the other. But we don't

know if it is really above the other because of the margins of error overlapping.

Q. Okay. And on Page 4, again. So you say that, quote: These yearly differences -- I'm in the same paragraph as before. Quote: These yearly differences may disclose a statistically significant historic change across several decades, and short discerning meaningful patterns is an alternative approach for accommodating specific instances where respondent self-reports might be shown to have exaggerated measured rates of voter registration and/or turnout.

Right?

A. That's what I said.

Q. Okay. And you didn't run any statistical tests other than looking to the kind of coin-flip principle you discussed to discern whether there is a statistically significant historic change across several decades?

A. Well, I did do a statistical test, like I say, a back-of-the-envelope -- you know, the most elementary test you could use. As a --

Q. Okay.

A. -- an undergraduate student of statistics, you'd say, "Well, is -- is there a discernible trend here?" And the answer would be -- the only thing you

can make a clear statement about is one is above the other. But if you look at it over time as a simple -- you know, the most elementary test, you can see that the time trend over 40 years reveals a turning point.

Q. Uh-huh.

A. And that -- that -- I know that just from a back-of-the-envelope calculation. I'd like to make a more formal statement about it using the latest tests that a statistician might say, "Well, this is a -- this is an even more informative test that you should use." As I say, I haven't really put in what that test is yet, but I know -- I know that there is a significant pattern here.

Q. Is it your view that if you aggregate a number of statistically insignificant differences, that can indicate a statistically significant difference across time?

A. If you rephrase that slightly to say if you examined a number of these things over time and said with enough observations, you could make a statistically significant statement about a trend over time, the answer is yes. I think I phrased it slightly differently than you did, but, yes, that's the whole point of what I'm trying to say here.

Q. Okay. And what is the statistical principle

by which insignificant individual differences between estimates indicate a significant difference when aggregated?

A. That's what I want to put in the text as a very precise statement of -- of what we can know from a time trend. And thus far, I have tried to make it comprehensible to the average reader by saying it's the coin-flip test. How many times can you get heads on a coin before you say the coin, after 30 flips and it always comes up head, you cannot conclude that it's unbiased?

Q. All right. So back on Page 4. And I believe we've covered this, but just to make sure I'm clear. The meaningful pattern that you're observing is that, quote, the data in Table 1 strongly suggests an apparent change since 2004 in Black political participation.

A. That's what I said about Table 1. It strongly suggests it.

Q. Uh-huh. Is it possible that the meaningful pattern that you're discerning is actually a pattern of over-reporting rather than a pattern in actual voting behavior?

A. I can imagine -- I can imagine someone conjuring up that notion. It would be quite fanciful. And I also want to point out that Table 1 is a prelude

to Table 2. I went from Table 1 to Table 2 because I wanted more information. And it's actually Table 2 on which my final opinion is based.

Q. Okay. Sure, we can look at Table 2.

A. So we're -- we're talking about Table 1, saying it -- it sort of looks like something is going on here, but you need more years of data.

Q. Uh-huh.

A. Then I went and got more years of data in Table 2.

Q. Okay. So looking at Table 2, and just to make sure I'm clear, is it possible that the pattern that you discerned is actually a pattern of over-reporting? Is that a possibility?

A. Anything is a possibility, including that, yes.

Q. Okay. Rather than a pattern in actual voting behavior?

A. Yes. There -- there are ways in which that could happen that I could imagine.

Q. Okay. Would this approach you've described of discerning patterns as opposed to calculating statistical significance allow analysis in a situation where there is a systemic reason where Black voters over-report voting and registration at greater rates

than White voters?

A. I'm not sure I --

MR. CARDIN: Objection: form.

A. I -- I think it's kind of a -- I don't understand.

Q. (BY MS. SMITH) Oh, yeah, I can rephrase. Of course.

A. Yeah, rephrase it a little.

Q. So you -- you reference in your report -- I believe we talked about that you acknowledged specific instances where Black voters have over-reported turnout at greater rates than White voters, right?

A. Where they -- it appeared to be the case based upon the comparisons year by year with the margins of error.

Q. Okay. So if there were evidence of systemic over-reporting whereby Black voters over-report voting at greater rates than White voters across multiple elections, would this approach of discerning meaningful patterns account for that possibility?

A. Not if the -- if -- if the -- the scenario you've described, if that remained in place year after year without anything else changing, the answer would be no.

Q. Okay. As a demographer -- so how can you

distinguish patterns in voting behavioral change from systematic errors due to survey design?

A. Well, I have to -- I -- I have trouble answering your question because I don't know what you mean by systematic errors due to survey design. And maybe if you try rephrasing the question --

Q. Sure. Let's -- let's rephrase the question. Let's say: How can you distinguish patterns in voting behavior from systematic errors due to over-reporting of voting registration or turnout?

A. You can do so by making assumptions about what the systematic errors are and whether they continue year by year at the same level over time. If you cannot make that assumption, then you have another -- another dilemma.

Q. So did you assume when producing your report that Black voters do not systematically over-report voting and turnout on the --

A. No, I did not make that assumption.

Q. Okay. All right. So -- and just going back to the notion of kind of an authentic pattern or a meaningful pattern. So I'm back on Page 4 now. Sorry. Actually, let's turn to -- one moment. Oh, yeah. So the third full paragraph, you say that: Black voting-aged citizens report having registered to vote at

a higher rate than their White non-Hispanic counterparts in eight out of the 10 most recent biannual elections.

So I take it from that -- and please correct me if I'm wrong -- in your view, eight out of 10 is a meaningful pattern?

A. Well, it's meaningful to me. I -- I don't know whether it is -- whether it attains the level of statistical significance that I would want as shown in Table 1 --

Q. Uh-huh.

A. -- because -- well, I'm sorry -- Table 1 as opposed to Table 2, which is the more comprehensive table. So Table 1 -- I think I've answered the question about that for Table 1.

Q. Okay. So for Table 2, is your answer different?

A. I'm trying to remember what -- what it is I -- what was the -- what is it that you are --

Q. Yeah, let's --

A. -- asking me --

Q. Let's go back a little bit.

A. All right.

Q. So I'm just -- I'm just trying to understand what constitutes an authentic pattern --

A. All right.

Q. -- or a meaningful pattern.

A. All right.

Q. So it sounds like eight out of 10 times, that's a meaningful pattern, in your view?

A. Well, it -- it's -- it's a clue to wanting to have more data. And eight out of 10 is something where -- which prompted me to want to get the data in Table 2 to say I need more -- more years in which to establish the pattern. And that's why I'm basically saying Table 1 in -- which I originally put together for one reason, invited me to add on a further historical perspective going back to 1980.

Q. Oh, yeah.

A. That's -- that's the big difference.

Q. Got it.

A. And once I got that, then I have the table in Table 2 on which I base my opinion.

Q. So in Table 2, just to make sure I'm understanding this right, you looked at -- when you say eight out of 10, you're looking at the years from 2004 until 2022, and you're saying eight times, according to CPS estimates -- I'm looking at voter registration for now. According to CPS estimates for voter registration, eight times since 2004, difference between Black and White voter turnout was -- or -- sorry -- Black minus

White voter registration was a positive value eight times?

A. Eight out of whatever it was, yeah.

Q. Out of 10? Out of 10?

A. That -- that -- yeah --

Q. Okay.

A. -- that's an observation.

Q. Got it. Okay.

A. But that -- that's -- that's what I observed in Table 1.

Q. Okay. And what if, let's say, that number were seven times; would that still be a meaningful pattern?

A. When I say "meaningful," what I'm saying is it -- it looks like it might be statistically significant. "Meaningful" means it's more than just random.

Q. Okay.

A. But it's not -- "meaningful," to me, is it suggests that this might be worth nailing down with more years of data so that one can say it's not only meaningful, but it can -- one can say that it is statistically significant at a certain level, so...

Q. Okay. And what if that number were four times; would that be a meaningful pattern?

A. I'd have to think about it. I -- I -- four times out of how many did you say?

Q. Out of 10.

A. Out of 10? No. That would be pretty much random.

Q. Okay. And so we talked earlier about how you haven't calculated statistical significance for each individual year, right?

A. Correct.

Q. And you haven't looked at margins of error for any of these years, right?

A. Well, I -- I've -- I've looked at them, and I can tell right away that there -- in any given year, you can't draw any conclusions because -- because the data have margins of error that overlap. That's -- that's one of the -- that's -- that's one limitation --

Q. Sure. So taking --

A. -- to looking at any given year.

Q. Taking that into account, let's say the margins of error overlap in four of these individual years. Would there still be a meaningful pattern over time?

A. I -- I can't answer these off the top of my head because I'd have to do the back-of-the-envelope calculation, but generally -- you know, it depends on

what you think I mean by "meaningful." My concern is that there are too many comparisons that are not meaningful for me to work off of just the data in Table 1. So I needed to get the further observations to see whether that remains so or whether that filled in --

Q. Yeah, and that's fine. We can stay on Table 2. How are you sure that there is, in fact, a pattern without taking into account statistical significance of these individual differences?

A. If I can modestly say, when you've looked at data like this enough times, you can tell just by looking at it. The data here could well be attributable to statistical chance. Certainly, there is not -- it -- it appears very dubious that this would pass a recognized, you know, statistical significance test at the 95 percent level.

Q. Okay. So, in other words, you know --

A. Judgment. It's like --

Q. -- you know it when you see it?

A. Yeah. I know it when I see it, yeah.

Q. Okay. I think that concludes that conversation. I have some more questions about the pattern you observed after 2004. Let's turn back to Page 4 of your report. So your conclusion -- let's actually turn to Page 6, because I think we've -- we've

established that your conclusion is that there's been a change since 2004 in Black political participation. Right?

A. Yes.

Q. Okay. So on Page 6, you discuss this more. So you note that there's two possible explanations for this pattern. Do I have that right?

A. Tell me where on Page 6 you're --

Q. Oh, of course. Yes. So Paragraph 1, it's labeled under "Basis for Conclusions and Opinions" --

A. Uh-huh. Okay.

Q. Okay. So --

A. Yeah. Okay. I'm with you.

Q. Great. So you say the first option is, quote, a genuine break in the historical pattern of Mississippi Black voters' political participation manifested itself in these data starting around 2004. Do I have that right?

A. Yes.

Q. Okay. Are you aware of any reasons why Black voters' political behavior would have broken significantly from historical patterns starting around 2004? Any explanations?

A. No. I'm just observing that around 2004, the data tell me that there was a break -- there was an

apparent break, and that is all that I'm documenting. And I don't have an explanation for it other than something changed.

Q. Something changed. Okay. And then the other option that you note is that the apparent break arose through a behavioral change but only among Black eligible voters, whereby Blacks, but not Whites, began over-reporting that they were registered to vote, and especially, that they have turned out to vote.

A. Right.

Q. Okay.

A. That's what I said.

Q. That's what you said. Okay. So those are, in your view, the two possible interpretations for the change you saw in 2004?

A. Those are two possibilities. I don't know if they're the only possibilities, but those are two contrasting interpretations.

Q. And those are the two that you considered?

A. That's right, the competing -- the competing explanations.

Q. And did you consider any other possible reasons or explanations?

A. Well, you can consider -- you could consider that Whites changed but Blacks didn't change. Blacks

changed but Whites didn't change. Blacks and Whites both changed in opposite directions. I mean, there's some logical possibilities.

Q. Uh-huh.

A. And -- and you can exhaust the logical possibilities, some of which are -- I would describe them as fanciful.

Q. Uh-huh.

A. Or you can imagine them. But does anybody have any evidence that they might conceivably exist?

Q. Uh-huh.

A. And so this is -- this is how one might speculate thinking most broadly about what -- what could account for this.

Q. Okay. Did you consider -- other than those, did you consider any other possible explanations?

A. Not that I recall, no.

Q. Okay. And you conclude that it was Black citizens' actual voting behavior that changed?

A. Yes.

Q. Okay. I want to introduce another exhibit. All right. So I'll represent to you -- oh, sorry. I'm going to mark Exhibit 15.

(Exhibit 15 marked.)

Q. (BY MS. SMITH) All right. So, again, I'll

represent to you that I went to the CPS website that you linked in your report below Table 1, so the Census website, and I clicked "historical reporting voting rates," and then I selected Table A-4 called "Reported Voting and Registration for Total and Citizen Voting Age Population for Congressional Elections" be- -- and then this is between 1978 and 2022. All right?

A. Uh-huh.

Q. So this is CPS data. Does that sound --

A. All right.

Q. Okay. Could you turn this paper over for me, and then, could you read for me after the word -- the first time -- after "note because of changes"? Just read that sentence for me.

A. You're saying at the top of the notes here?

Q. No. So I guess it's the fifth --

A. Oh, I see.

Q. -- one down.

A. Okay.

Q. "Note because --

A. "Note because" -- I see it.

Q. -- of changes." Yeah.

A. Yeah, the second paragraph. "Note" -- okay. Just a second. Right. Yeah, I'm -- I'm familiar with this --

Q. Okay. So could you --

A. -- change.

Q. -- just read the -- the statement after the word "note" there, "note because of changes"?

A. Sure. Do you want me to read it out loud?

Q. Yeah, or I can. So --

A. "Note federal surveys"?

Q. No. Sorry. "Note because of changes."

A. "Because of changes in the Current Population Survey, race categories beginning in 2003, 2004 through 2022 data on race are not directly comparable with data from earlier years."

Q. Okay. So would you dispute that here, the Census Bureau is saying that pre-2004/post-2004 data are not directly comparable?

A. That's what they say, yes.

Q. Okay. Because the race categories changed in 2003?

A. That's correct.

Q. And that change started being reflecting -- reflected in the 2004 --

A. Yes.

Q. -- data? Okay.

And do you agree with me that here, the CPS -- or the Census is informing people of a limitation

in how you can draw conclusions from its data?

A. They simply said they're not directly comparable. That doesn't --

Q. Okay.

A. -- mean that you can't draw conclusions. The -- what they're referring to is the respondents who have the option of reporting more than one race.

Q. Uh-huh.

A. And what effect that has is it means that numbers -- the number that would have been collected under the old protocol would not exactly equal the number collected under the new protocol if it had been done in the old way. That doesn't mean that it invalidates a comparison one makes in a place where multiracial Blacks are a large share of the Black population. Now, admittedly, that is a -- that is a caveat, and I would not regard that as invalidating the comparisons that I've made. And if -- if anything, I would say you -- you could -- you could draw a num- -- you could probably draw several conclusions from it that might go either way in terms of what I've concluded in my -- in my paper, in my report.

Q. Okay. So just quickly. So I believe you didn't agree that this is a limitation in CPS data. Would you call it a caveat?

A. It's a caveat.

Q. It's a caveat?

A. And it -- I mean, it -- it doesn't limit my ability to draw conclusions. It is a caveat that is worth my noting.

Q. Okay. And you said earlier that one should consider the Census' own descriptions of its data, right?

A. Say that again.

Q. Earlier, we talked about how one should take the Census' own description of --

A. Yes.

Q. -- its limitations and its caveats, per se, seriously. Right?

A. Yeah.

Q. Okay. So did you consider how the race categories changed in 2003 when you conducted your analysis?

A. I didn't at the time, but I can't see how they would -- how they would change my conclusion if they are a more genuine portrait of what's going on today as opposed to what was going on from 1980 to 1996 or -- or from 1980 to 2002.

Q. Okay. So you didn't consider how changes in the current population -- the CPS race categories

beginning in 2003, whether that might have caused the differences you observed in the pre-2004 and post-2004 reported Black voter turnout and registration?

A. Well, in -- in just looking at the table, I can -- I can see what effect it would have. It would -- it would mean that Blacks were equal to or exceeded Whites starting in an earlier point in time.

Q. Did you consider -- I think my question was a little bit different. Did you consider it when you were producing your report in this case?

A. No, I -- I didn't consider it, no.

Q. Okay. And did your report acknowledge this caveat from the CPS anywhere?

A. No, I don't believe I did acknowledge it in any footnote anywhere.

Q. Okay. Would you -- would you say that changing how race is categorized so that people can list more than one race instead of just one is a major change in a survey method?

A. It depends on -- on -- it's a -- it's -- it's -- it's a major -- it has a major effect in certain parts of the United States.

Q. Okay.

A. It could have. In the case of Mississippi, just looking at it now, I would say it doesn't change

my -- my overall conclusion. And if anything, it would reinforce it further.

Q. And did you consider that this change in race categories might account for the, quote, historic break you observed in 2004?

A. I want to be clear that when I say a "historic break in 2004," I'm not saying it happened in that year. I'm saying it manifests itself in the data in that year. But I'm not saying it happened in 2004. I'm saying it wasn't there before, and it is there now, ever since, with virtually no exceptions. And that's my -- that's -- that's what I -- what I -- what I mean when I say there was a historic break, and it occurred around 2004.

Q. Did you consider whether this manifestation of a historic break is due to the change in race categories?

A. I -- I can consider it right now and say it -- it --

Q. But did you consider it --

A. Oh, did I consider it?

Q. -- for -- yeah.

A. No, I did not.

Q. Okay. All right. So I want to talk a little bit more about how the race categories changed in 2003.

So if I can please mark the next exhibit. This is going to be Exhibit 16.

(Exhibit 16 marked.)

Q. (BY MS. SMITH) And this is a publication called "Revisions to the Current Population Survey Effective in January 2003," written by employees of The Bureau of Labor Statistics. All right?

A. Uh-huh.

Q. Great. So let's turn to Page 5. And on the left-hand side, under "Changes in Race and Hispanic Origin Data," it says, "Starting in January 2003," and -- and then it lists some changes that were made in 2003. All right?

A. Yeah.

Q. And then on the fourth bullet point down, it lists that the following change was made, quote: Individuals are allowed to choose more than one race category. Prior to January of 2003, individuals who considered themselves to belong to more than one race were required to select a single primary race.

Right?

A. Yeah.

Q. So that's the change?

A. Right.

Q. Okay. So let's turn to the next page in the

document, in the chart here. So I'll represent to you the CPS -- sorry -- the -- the Bureau of Labor Statistics reports that this is the CPS questions about race before January 2003 and then starting in January -- after January 2003 --

A. Right.

Q. -- right?

All right. So just to sum up, before January of 2003, people could choose one race among these four options: White, Black, and then American-Indian, Eskimo or Aleut, and then Asian or Pacific Islander. Those are the four?

A. Right.

Q. Okay. And then after January 2003, the column to the right of that, people could select multiple. So they could choose one or more?

A. Show me where the mult- -- oh.

Q. "Choose one or more." Do you see that?

A. Oh, all right. Yeah, I see what you're -- right, right.

Q. Okay.

A. "Choose one or more." Okay. I get you.

Q. Okay. So they can say they're Black or White after 2003?

A. Uh-huh.

Q. Or they can choose both Black and White?

A. Correct.

Q. Or they could choose any other combination of races?

A. Correct.

Q. Okay. All right. So if we could turn back, please, to Exhibit 14, which is your underlying data there.

A. (Handing.)

Q. Oh, I have one, too.

A. Okay.

Q. I was just -- I was just pointing --

A. All right.

Q. -- to it. If we could look at that.

A. Yeah.

Q. All right. I just want to flip to 2002.

A. All right.

Q. All right. In the leftmost column, it looks like in line with what we've just discussed, people are listed as one race or another but not multiple. Right?

A. That's my understanding, yes.

Q. Okay. And then you compared among those categories non-Hispanic White with Black, right? Those are highlighted there?

A. Yes.

Q. Okay. Now let's look at the next page, which is 2004.

A. Yeah.

Q. Okay. Here now people are listed as White alone or in combination or Black alone or in combination, right?

A. Yes.

Q. Or Black alone or White alone, right?

A. Right.

Q. So people can be listed as having one race or two or multiple --

A. Yes.

Q. -- in line with that change in survey methods we talked about, right?

A. Right.

Q. Okay. So I see here White non-Hispanic alone and Black alone or in combination are highlighted, because those are the two categories that you were comparing, right?

A. Yes.

Q. So why did you choose those two categories to compare, White alone versus Black alone or in combination?

A. For the year 2004?

Q. Yeah, so in the year 2004, when it started to

be possible to have a combination of races.

A. If you look at Table 2 where -- in my report, the top, where it says "% Black (AP)" --

Q. Uh-huh.

A. -- that refers to any part Black.

Q. Uh-huh.

A. And I'm saying it was any part -- in other words, I -- I did include those.

Q. Yeah.

A. Yeah.

Q. Yeah, so you included people who were --

A. Any part Black.

Q. -- any part Black versus people --

A. As soon as the Census -- as -- as soon as I could.

Q. Okay. Yes, versus people --

A. Right.

Q. -- who were only White?

A. And your --

Q. Right?

A. Now -- and -- and what is your question about why I did it?

Q. Yeah, I suppose to rephrase my question: Why not compare, let's say, White alone versus Black alone, or in com- -- or, as an alternate, Black alone or in

combination to White alone or in combination?

A. Okay. Now I see what you're asking. The answer is very simply that I wanted to remain current with people who reported themselves being Black even though they were multiracial.

Q. Uh-huh.

A. So what we have here is a secular trend over time in which the Census Bureau is starting in -- I think 2002 was the year -- beginning to acknowledge that there are people who are racially Black and are multiracial and they want to express their self-identity to a question that acknowledges the way they see themselves. And this is exactly the kind of secular change that could account for what -- what I'm displaying here is a transformation in how people envision themselves. And I would note the -- in the 2002 table that you refer to in Exhibit -- what exhibit is this?

Q. 14.

A. -- 14. 14.

Q. Yeah.

A. There's a very informative comparison that one could make here just by looking at the table --

Q. Uh-huh.

A. -- which is the -- I'm sorry. In 2- -- for

the year 2004, when that change was first made, if you look at the "Total" column under "Population 18 and Over," you will see -- that's the left column.

Q. Uh-huh.

A. Black alone, the population that was -- that they -- they included for this particular, you know, weighted sample, 698 Black alone, and there were 700 people, two more in their sample, who were identifying as Black alone or in combination.

Q. Uh-huh.

A. So we have two out of 700. That would make maybe a quarter of 1 percent or a fifth of 1 percent of the respondents were picking up on this. And I look at the next year, 2006, and I see that the -- the numbers here are Black alone, 718; Black alone or in combination --

Q. Uh-huh.

A. -- 718.

Q. They're the same. Okay.

A. And so, I mean, there's a -- there's a -- that's -- that's a clue as to what's going on. It's undoubtedly statistically meaningless, but it says that there are some people who are beginning to pick up on the notion that they are multiracial --

Q. Okay.

A. -- back in 2002-2004.

Q. Okay. So just to make sure I'm understanding, let's say someone took the CPS in 2002 and one were mixed race, so identified as Black and White. They would have had the option to choose Black or White on the CPS, right?

A. Say that again. I'm --

Q. So if I -- if one is mixed race and identified --

A. Yeah.

Q. -- as Black and White in 2002 --

A. Right.

Q. -- on the CPS, they'd have the option to choose either Black or White, right?

A. Or --

Q. Or another --

A. Yeah, yeah. Right, right.

Q. But they could choose one?

A. Right.

Q. And then after 2003, so from 2004 on, you can choose both Black and White?

A. That seems to be the way this was set up with the ACS. I'd -- I'd have to study -- I mean with the CPS. I'd have to study it more -- more closely, but just as I look at the data, I see evidence that the --

the way the question was reworded starting in that year was consistent with everything that I have said about a developing change at that particular point in time, and it does coincide with this change in definition. And I haven't looked at the rest of the data, but it --

Q. Yeah.

A. -- it -- it's all consistent with my notion that there was a change in the awareness of Blacks who were being surveyed as to what they -- what they regarded their identity as being.

Q. Okay. I think we can move on.

So you talked earlier about how you've cited and reviewed some studies about over-reporting of voter turnout and registration on surveys, right?

A. I've reviewed the political-science literature that I could readily access and that was -- I deemed to be the most timely and significant.

Q. Okay.

A. And my caveat here is that I'm not a political scientist, but I want to know what political scientists are saying that might afford me a different way of viewing the data that I'm looking at as a demographer.

Q. Okay. So in your report, you've cited -- and I'm looking at Footnote 7 here on Page 6 still.

A. Okay. Footnote 7 on Page 6 of my report, did

you say?

Q. Yes. Page 6 of your report and at Footnote 7.

A. I'm sorry. I've got -- I've got the other case.

Q. Oh, yeah. No worries.

A. Sorry.

Q. Take your time.

A. Here we go.

Q. A lot of paper.

A. Okay. Footnote 7. Now --

Q. Yeah.

A. Okay. What's your question?

Q. So you cited -- on the issue of over-reporting, you have cited a piece by Satoshi Kanazawa called, "Who Lies on Surveys, and What Can We Do About It?" Right?

A. Yes.

Q. And you cite also a series of articles by Abramson and Claggett from 1984 through 1991?

A. Yes.

Q. Okay. And the Kanazawa piece, that's from 2005?

A. Right, right.

Q. Okay. And then in the following footnote, you cite the Berent, Krosnick and Lupia working paper from

2011 that we talked about a little bit earlier?

A. That's the one that has -- was the basis for the subsequent article that I said was in a peer-reviewed journal.

Q. Okay. And -- and then you mentioned today that you would additionally like to rely on the 2016 piece by those same three authors?

A. Correct.

Q. Okay. Did you rely on any other literature to draw conclusions about over-reporting on surveys than those that we've just discussed?

A. No. I -- I want to clarify that I -- the point I was trying to make here was not that I was an authority on what political scientists -- the -- the latest word among political scientists about over-reporting. What I wanted to make was simply the point that this is a controversial issue, and the controversy extends back to studies that were done a long time ago. And in the case of Footnote 8, there was a massive study, and now that it's been published, the controversy continues on among academics to this date.

Q. And when you say there's a controversy, are you referring to other studies that are not cited in this report, or are these -- are these reflective of the controversy that you mention --

A. Well --

Q. -- the ones that you cite?

A. -- I'm -- I'm saying that in my re- -- in my cursory review of the political-science literature, virtually every author acknowledges that some people say this is happening; other people say not. And then they report that they did a study in a particular place at a particular time, and they found something further to add to the controversy. So it only makes it an ongoing controversy among political scientists. Latest word, still controversial.

Q. Late- -- okay. So --

A. Latest word, still controversial, so...

Q. Okay. So I --

A. That's what I know.

Q. Here's how I understand the controversy as you described it. So on one side of the controversy, you have Berent, Krosnick and Lupia saying that there is not systematic over-reporting of voting or turnout or registration, potentially; and on the other side, there are other authors saying that there is. Can you point me to authors other than Berent, Krosnick and Lupia who would contest the over-reporting on voting surveys -- self-reported voting surveys occurs?

MR. CARDIN: Object to the form.

You can answer the question.

A. I don't profess to be an authority on the political-science literature in this -- on -- on this topic. What I am convinced of is that it remains controversial based upon the most recent study that I have seen, which is the one that was -- the published version of Berent, Krosnick and Lupia, who acknowledged that there is a controversy. And they seem to make the case that it's hard to say, but this could -- this doesn't look like it's what other people are saying it is, but we don't know.

So my conclusion is this is a healthy discussion of what you find when you look at all the different specific studies of specific elections at specific points in time, and you find that sometimes things occur and sometimes things don't occur, and it leaves you wondering if -- well, maybe there is no constant conclusion you can draw about there being over-reporting or underreporting.

Q. (BY MS. SMITH) All right. So just to clarify one point, so the most recent study that you've reviewed on this topic was 2016?

MR. CARDIN: Object to the form.

You can answer the question.

A. I -- I would say the most recent study I've

reviewed is the Berent, Krosnick and Lupia study that was published, and I regard that as a most informative study that now is -- if I were to refer someone to what is the current state of the controversy, I would say read their recently published peer-reviewed study. That's kind of where the controversy stands among political scientists today.

Q. (BY MS. SMITH) Got it. And then, can you point me to, sitting here today, any other academics that have published articles supporting Berent, Krosnick and Lupia's view in --

A. No, I can't, and I -- I'm not a political scientist.

Q. Okay. Thank you. So let's -- I want to walk through some of the articles that you cite here.

MS. SMITH: So if you can please mark the next exhibit. And this will be Exhibit 17 in the record.

(Exhibit 17 marked.)

Q. (BY MS. SMITH) Okay. And this is an article called, "Who Lies on Surveys, and What Can We Do About It?" by Satoshi Kanazawa, published in fall 2005.

A. Uh-huh.

Q. All right. So you cite this article in your report?

A. Yes, I do.

Q. As a study suggesting that Black respondents on the CPS over-report registering or turning out to vote, right? Or for what proposition?

A. My -- my reading of this article is the title says all that I need to know.

Q. Have -- have you read this article?

A. I scanned through it. I notice that it is now approximately 24 years ago.

Q. Okay.

A. So it's not something that bears directly on what I'm considering here.

Q. But you --

A. I -- I -- I wanted to get the flavor of what the controversy is. And this is an article that starts with the premise that people do lie on surveys. And I'm not interested in knowing -- I'm not really terribly interested in knowing much more about it other than that it documents that as of 2005 -- or, actually, before that, when the study was still under review to be published, it was believed that people lie on the surveys. And then I would say this -- this is probably representative of what political scientists were considering at that time. It is a -- sort of a historical document, but of no immediate relevance to

me, other than to flag it as one side of a controversy that traces back to 2005.

Q. All right. And so you reviewed it when you prepared your report?

A. I reviewed the abstract and I scanned through it. I didn't see anything of -- of relevance to me in terms of what I was doing.

Q. All right. Did you find it to be a reputable article on the topic of over-reporting?

A. I can't say I read it with that in mind, so I can't give you an opinion on that.

Q. Okay. But you relied on it in your report?

A. I cited it as an example. I didn't -- I didn't re- -- I -- I can't say that I relied upon it. I simply said this is an example of what political scientists were considering as -- in the controversy over do people lie about things like this.

Q. And do you agree with the author's conclusions here about Black voters over-reporting turnout on surveys?

A. I -- I can't answer the question because I haven't read it carefully enough.

Q. Okay. And do you disagree with anything that they said in this article that you remember?

A. The same answer.

Q. Okay. I think we're done with that article.

Let's talk now about Berent, Krosnick and Lupia's working paper from 2011. I know that you also looked at the 2016 version, and I believe we'll get to that, as well, but let's start with this one --

A. All right.

Q. -- the one that you cited.

All right. So I'll mark as Exhibit 18 a working paper called "The Quality of Government Records and Overestimation of Registration and Turnout in Surveys: Lessons from the 2008 ANES Panel Study's Registration and Turnout Validation Exercises."

(Exhibit 18 marked.)

Q. (BY MS. SMITH) There you go.

A. Thank you.

Q. Okay. So this is a report from 2011, so a little over a decade ago?

A. Yeah.

Q. And it's a working paper, and you know it was eventually published in 2016. Just to make sure I'm clear on the record, why didn't you rely on the published version in your report initially?

A. Because I was unaware of it having been published until just a matter of days ago, when I was reviewing my file in advance of the deposition, and I

noticed that there was a reference to this by the same authors as having been published. And it was now in a peer-reviewed journal as opposed to a lengthy technical report.

Q. Uh-huh.

A. I had studied the lengthy technical report in great detail because I was very impressed by the thoroughness of it.

Q. Uh-huh.

A. The exposition of it in terms of how it was written is -- you know, left something to be desired because it was -- was a whole lot of words for what it found. And nonetheless, I read it very carefully, and I -- I -- I realized that there were some important conclusions that were derived from this very careful analysis.

Q. Okay. And this working paper is based on a data source from 2008 to 2009?

A. Yes. It's some panel study that the -- that political scientists were looking at and was uncommonly useful and informative to a political scientist who had the time to really analyze the data.

Q. Okay. And that's the American National Election Study survey?

A. That's correct.

Q. And that's another survey, where, like the CPS, people report their voting behavior?

A. I'd have to review the details of it, but I know that it was a very prominent data- -- dataset that was used and it was a study that had great relevance for the questions that I had.

Q. Okay. And in your report, at Page 7, when you conclude that the historic break in the CPS data that you observe in 2004 whereby Black citizens start to report higher turnout in registration than White citizens, you're citing this paper to conclude that that change, quote, cannot be attributed to just the speculative claim of differential over-reporting by Blacks, right?

A. Tell me what paragraph that is.

Q. Yes.

A. This is on Page 7?

Q. This is on Page 7. I'm at Paragraph 5.

A. All right.

Q. Quote: The break itself, though, cannot be attributed just to the speculative claim of differential over-reporting Blacks.

A. Right. I see where --

Q. I assume "by Blacks" is what --

A. Yeah. Right.

Q. Okay. And then you cite to this Berent study?

A. Yes.

Q. Okay. So it's fair to say that the Berent study at the time you wrote the report was your basis for concluding that the break you observed after 2004 was not due to over-reporting?

MR. CARDIN: Object to the form.

You may answer the question.

A. What I'm paying attention to is the portion in Paragraph 5 that's italicized: The apparent success of turnout validation exercises in producing aggregate turnout rates that are closer to reported official turnout rates appears to occur not simply because the exercises weed out liars but because the unrecognized downward bias due to errors in government records is stronger than the unrecognized upward bias in the actual rate of turnout amongst survey participants.

Q. (BY MS. SMITH) Okay. So that statement by Berent, et al. was the basis for concluding that, quote, the break itself, though, cannot be attributed just to the speculative claim of differential over-reporting by Blacks?

MR. CARDIN: Object to the form.

You may answer the question.

A. It's a succinct statement of a much broader

consideration of that issue.

Q. (BY MS. SMITH) Okay.

A. I cite that simply because it -- it encapsulates what they -- what they had to say in their original report.

Q. Are there other bases for your conclusion that, quote, the break itself, though, cannot be attributed, just the speculative claim -- claim of differential over-reporting by Blacks cannot be attributed -- sorry. Are -- are there other bases for that statement cited in your report?

A. Well, certainly, the -- the more elegant statement of the point I just quoted that was in their published report -- if you hand it to me, I can tell you that that further confirmed what they were saying.

Q. Other than -- let me rephrase my question.

Other than this working paper and the 2016 published version of it, are you relying on any other literature to conclude that over-reporting did not account for that break?

A. I'm -- I'm not relying on anything directly. I am acknowledging the fact that there is a controversy among political scientists. And my view of the evidence is that the published report by -- published report by Berent and Krosnick and Lupia is probably the most

informative current study as to what is at issue in that controversy. And I don't profess to be -- to be an authority on the political science that has been done on both sides, but I know that it is an issue that is controversial among political scientists and that it gives me grounds for having considerable doubts about what some people are attributing this change to other than what I'm attributing it to.

Q. Okay. In looking at this working paper, does this paper look at whether there is a racial disparity in over-reporting?

A. I'd have to go through the details. If you're talking about an observed racial disparity in over-reporting -- well, let me -- let me see if I can state this correctly. We don't know if there is an over-reporting unless we know what the true report was. So I guess I can't answer your question as there is an assertion that there is over-reporting.

Q. So let me rephrase it. So this article is looking at a method for validating a survey of respondents' answers as to whether they registered or voted against official government records, right?

A. That's not actually what they did.

Q. Okay.

A. That's not the comparison they made.

Q. All right. Put more simply, does this article address whether Black and White voters might over-report voting at differential rates? Is that the topic of this article?

A. Say the question again, please.

Q. Whether Black and White voters over-report voting at differential rates, is that the focus of this article?

A. I wouldn't say it's the central focus. It's -- it's an issue that enters in. And they have addressed the issue as best they can with the data that they have at their disposal.

Q. Where is the -- where is the issue of Black and White voters' over-reporting voting differential rates discussed in this article? I didn't see it addressed, but if you could point me to anything.

A. The -- I'm not sure that I can point to exactly where they said something about something, but the explanation that -- that they gave for the observation that it appears that there's over-reporting is picked up in the last paragraph of their unpublished report on Page 8. And I'm going to read it into the record: Taken together, this evidence suggests that a major factor driving turnout overestimation in Internet surveys may not be respondent lying. It may be the fact

that people who choose to participate in such surveys also choose to participate in elections at higher rates than do people who do not participate in surveys. Traditional approaches to turnout validation do not solve this problem; they only mask it.

Now, that -- that's saying, basically, there's something else very important going on here. And in their published version, they have stated more succinctly what one can conclude.

Q. So I didn't hear anything about race in that passage, right, that you just read?

A. No, not about race. It's -- it's about differential self-selection of those who report accurately -- or -- or I'm sorry -- who are inclined to report. This is not the only paragraph I relied on.

Q. So did they evaluate levels of over-reporting by race in their study?

MR. CARDIN: Object to the form.

You may answer the question.

A. I don't recall that they addressed it directly. They -- they addressed the circumstances that might give rise to it and call them into question.

Q. (BY MS. SMITH) Okay. Let's move on to Page 29 of this piece now.

A. All right.

Q. Looking at the second full paragraph, I see that they looked at government records of registration and turnout from -- I believe it's six states listed here.

A. Yes.

Q. Okay. And now let's turn to Page 66.

A. All right.

Q. I want to look at the discussion under the subheading "The Impact of Survey Mode."

A. Okay. I'm with you.

Q. Okay. So here, it says that their conclusions, quote, might seem to contradict evidence, unquote, by other authors.

A. Where is that?

Q. "Our conclusion" -- just the first sentence --

A. Yeah. Okay.

Q. -- after --

A. All right.

Q. -- "the impact of survey mode."

A. Oh, I see. Okay. "Might seem to contradict evidence."

Q. So "might seem to" --

A. Yeah.

Q. Okay.

A. Right.

Q. And that other report, quote, found that turnout reports were, indeed, intentionally inflated due to social desirability response bias, unquote?

A. Uh-huh.

Q. Okay. Is that a yes?

A. Yes.

Q. Okay. The next sentence, it goes on to say, quote: That evidence came from a telephone survey and, therefore, converges with other evidence suggesting that social desirability pressures can, indeed, distort reports collected by telephone.

A. Yes, I see that.

Q. Okay. And then the authors say in the next sentence that by contrast, quote, the 2008/2009 ANES panel study, which is the dataset they're relying on, involved data collected exclusively via self-completion on computers and submitted via the Internet, a mode that has been shown to be largely immune to social desirability pressures in reports of turnout.

A. Yes.

Q. So the authors are saying their conclusion showing what they say is high accuracy of the ANES, an Internet-based survey, is actually consistent with other literature about inflated reports of voting and registering in telephone surveys?

MR. CARDIN: Object to the form.

You may answer.

A. It -- I'm -- I'm -- I read this as they're saying this is -- this is one of the things that people are saying based on the research they did. I can't say that I endorse it or, you know, they're right about it and everything else is wrong, but, yeah, that's what they said. I -- I --

Q. (BY MS. SMITH) That's what they said?

A. I don't dispute that they said it --

Q. Okay.

A. -- in this unpublished version.

Q. Okay. And earlier, we talked about how the CPS is conducted over the phone. Do you remember that?

A. All right. If you say that's true, I'll -- I'll go with it.

Q. Okay. Is it fair to say that based on this analysis from Berent and his coauthors, the CPS, which they're not discussing here in this paragraph, is less immune to social desirability bias because it's done over the phone?

A. I would say it's one study that would point in -- point towards that conclusion, but --

Q. All right.

A. -- it doesn't, by any means, mean it's true.

Q. So according to what they say here, that would be the case?

A. Yeah, they're saying this is one -- one point that would be favoring that interpretation.

Q. Okay. And that's the conclusion of Berent and his coauthors here --

A. That's correct.

Q. -- in the report that you rely on to come to your conclusions --

A. Yes.

Q. -- about over-reporting on the CPS?

A. Right.

Q. All right. Let's see. All right. So since 2011, you're aware that other academics have -- are you aware of whether other scholars have looked at Berent and Krosnick's conclusions to see if they're accurate?

A. I have not pursued the political-science literature since my initial foray into it, except to get the published version of the -- whatever the title of it is -- of the Berent, Krosnick and Lupia study, because I found that to be the most comprehensive and informative about what the literature was claiming to know at the point it was published and had been peer-reviewed and condensed down to firm conclusions.

Q. Okay. Do you know if other methods have

become available to study the same questions?

A. I -- I do not. I can't say that I'm up to speed on the latest studies. I'm -- as I say, I don't stay current on political science as my primary field.

Q. Okay. So you didn't look into whether other reports were more comprehensive than this one?

A. I -- I know that if there had been important studies that had been published, I would have caught them in the last two months, but this is what I worked with when I examined the literature.

Q. All right. So I want to introduce another article about over-reporting. All right. And I'll mark this as Exhibit 20 in the record. This is an article called --

MR. BERRY: Just to be clear.

MS. SMITH: Of course.

MR. BERRY: I think maybe it's 19.

MS. SMITH: Oh, I'm sorry about that. Yeah, you're absolutely right. Thank you.

(Exhibit 19 marked.)

Q. (BY MS. SMITH) All right. So this is an article called "Validation: What Big Data Reveal About Survey Misreporting and the Real Electorate" by Stephen Ansolabehere and Eitan Hersh at Harvard University and Yale University -- University, respectively, published

in Political Analysis in 2012. All right?

A. Uh-huh.

Q. Are you familiar with the journal Political Analysis?

A. I am not familiar with it. I assume it's a reputable journal.

Q. Okay. Looking at the abstract here, I see that Ansolabehere and Hersh are looking at surveys and, they are, quote -- I'm reading off of the third line: Leveraging developments in technology and improvements in public records, we conduct the first ever 50-state vote validation. We parse over-reporting due to response by us from over-reporting due to inaccurate respondents. We find that nonvoters who are politically engaged and equipped with politically relevant resources consistently misreport that they voted. This finding cannot be explained by faulty registration records, which we measure with new indicators of election administration quality. Respondents are found to misreport only on survey items associated with socially desirable outcomes.

All right?

A. Yes.

Q. All right. So they're conducting -- looking down here under "Introduction," I see it mentions,

fourth line down, that they're also looking at the 2008 national election study.

A. Yes, I see that.

Q. Okay. So would it be fair to say that, based on what we just looked at, they're using data from all 50 states?

A. Well, that's what they appear to say in the abstract, yes.

Q. Okay. And they're looking at over-reporting and whether it can be attributed to faulty registration records?

A. If that's what it says in the abstract. That's all I know about the study. I haven't read it.

Q. Okay. You haven't read this? Then you didn't come across this in your review?

A. No. I mean, I can --

Q. Okay.

A. -- only comment -- I can only answer your questions that you're asking me about a paper that I haven't read yet, so...

Q. Okay. I understand. Thank you. And as I read that abstract that we just went over, they conclude that misreporting accounts for evidence of over-reporting, not faulty registration records?

A. If that's what it says, that's what they

found.

Q. Okay. At the bottom of that page, do you see that they say, quote: A new era characterized by high-quality public registration records, national commercial voter lists and new technologies for big data management creates an opportunity to revisit survey validation? Right?

A. Yes.

Q. All right. And staying on Page 438, where we are now, going to the third full paragraph down --

A. All right. The one that begins "in demonstrating"?

Q. Yes.

A. Okay.

Q. So I'll just point you to that paragraph and say that they state here, quote: This analysis reaches different conclusions than a recent working paper of the ANES, which asserts that self-reported turnout is no less accurate than validated turnout and, therefore, that survey researchers continue to rely on reported election behavior.

And they're citing the 2011 working paper from Berent, Krosnick and Lupia, right?

A. Yes.

Q. All right. So they reached different

conclusions than those offered by Berent, Krosnick and Lupia?

A. Yes.

Q. All right.

A. And this study reinforces my conclusion, which is that this is an actively controversial issue among political scientists who are coming up with evermore studies that bear on the controversy.

Q. Uh-huh. Okay. And at the beginning of the next paragraph, they say here, quote -- they're using -- sorry -- quote, the new validation -- a new validation method that addresses the problems that have plagued past attempts at validating political surveys?

A. Yes.

Q. Okay. And earlier, we discussed how a 2011 working paper from Berent, Krosnick and Lupia used data from six states?

A. I don't remember the details, but I'll take your word for it --

Q. Okay.

A. -- if that's what they said.

Q. Yeah. And that's what we discussed a moment ago. And here, they're using data from all 50 states?

A. That's what they say.

Q. And that's more than what Berent, Krosnick and

Lupia did?

A. That -- it's -- this study is including all states, not just a subset of states.

Q. Okay. Thank you. So I know we've talked about the 2016 Berent and Krosnick piece where they reiterated some of the same conclusions, right?

A. Yes.

Q. Okay. So could I mark as the next exhibit, please...

(Exhibit 20 marked.)

Q. (BY MS. SMITH) All right. So I'm marking as Exhibit 20 in the record a piece called "Measuring Voter Registration and Turnout in Surveys: Do Official Government Records Yield More Accurate Assessments?" It's in Public Opinion Quarterly, August 2016, with three authors, Matthew Berent, Jon Krosnick, Arthur Lupia. Okay? Here you are.

All right. I don't think we need to spend long on this one. I just wanted to give you an opportunity to look over it and confirm this is the 2016 paper that you additionally relied on in preparation for your deposition today.

A. Yes, I -- yes. Let me just make sure this is the one.

Q. Yeah, please.

A. Yes, this is the one that I noted came out in a peer-reviewed journal. I discovered that footnoted last week, and it is the study that I have been referring to as the published version that is -- and when was it published? August 2016.

Q. Okay. And they're using the same dataset and offering similar conclusions?

A. The only thing I know about this published version is I've compared it with the original technical study. And the -- this is a more refined exposition of that original study. This is not an update of what they did; this is simply a -- transforming a technical report into a publishable journal article that says this is what we found in that technical study framed in a way that it relates to issues that political scientists can understand. And I would point to the abstract, which begins on the first page and continues onto the second page at the top, where they say: As a result, when validated turnout estimates appear to be more accurate than self-reports because they produce the -- produce lower turnout estimates, the apparent accuracy is likely an illusion.

Q. Okay. I think that concludes our discussion on that. I just wanted to make sure we had an agreement on what the 2016 piece was.

A. Sure.

Q. I want to introduce another article about over-reporting. This will be Exhibit 21 in the record.

(Exhibit 21 marked.)

Q. (BY MS. SMITH) This is an article called "Validating Self-Reported Turnout by Linking Public Opinion Surveys with Administrative Records" by Ted Enamorado, a professor of political science at the University of North Carolina at Chapel Hill, and Kosuke Imai, a professor of government and statistics at Harvard. And it's in Public Opinion Quarterly.

A. All right.

Q. And I take it you're not familiar with this article because you mentioned you haven't reviewed anything since 2016?

A. I certainly haven't seen this one.

Q. Okay. Do you dispute that it was published in 2019 in Public Opinion Quarterly?

A. I agree that that's what it says, yes.

Q. Okay. And I believe you testified earlier that Public Opinion Quarterly is a reputable peer-reviewed academic journal?

A. It is.

Q. Okay. And that's the same journal that the Berent, Krosnick and Lupia piece was published in?

A. I'd have to check, but I'll take your word for it.

Q. Okay. And we talked earlier about this, but you've cited Dr. Imai before in your 2017 article?

A. I just want to make sure that I gave the correct answer to this.

Q. Oh, yeah.

A. You said it was published in -- I didn't keep track of which journal it was published in, but can you --

Q. Oh, yeah. So looking back at the Berent --

A. Yeah.

Q. -- piece in Public Opinion Quarterly --

A. Okay. Yeah, that -- that's the same one. Right.

Q. -- Exhibit 20, if you want to --

A. All right.

Q. All right.

A. Okay. I'm -- you're correct.

Q. Okay. Great.

A. Now, what's your question?

Q. Have you cited Dr. Imai before?

A. Not to my knowledge, no.

Q. We talked earlier about how in the East Ramapo School District opinion, the Court referenced that you

cited Dr. Imai in a 2017 article that you published.

A. I may well have cited it. I -- I don't keep track of everyone I cite.

Q. Okay.

A. If you have a record of that, then I would revise my -- my answer --

Q. Okay. Sure.

A. -- and say, well --

Q. That was --

A. -- you've proven the point.

Q. That was the article --

A. Yeah.

Q. -- about BISG that we talked about.

A. Oh, the BISG, yeah.

Q. Yeah.

A. Sure.

Q. That's the same person?

A. Right.

Q. All right. So I want to turn to Page 745 here. We're going to look at the discussion after the word "Conclusion."

A. All right.

Q. So Imai and Enamorado write, starting here: The availability -- over the last decade, the availability of large-scale electronic administrative

records has enabled researchers to study important questions by creatively merging them with other datasets.

Right?

A. Yes, at least that's what they say.

Q. So new methods of merging large-scale administrative records with other datasets have become available since 2011. That's what they're saying?

A. Correct.

Q. All right. And those methods, as I understand this, can be used to evaluate self-reporting on surveys?

A. If -- if you have the right -- if you have the right administrative record data that is proven to be accurate and timely.

Q. Okay.

A. If you merge it with -- with garbage data, you will have garbage in and garbage out. So that -- I mean, the point here is that it's easier to merge data -- scientific data with administrative record data.

Q. Okay. Let's turn back a few pages to 742.

A. All right.

Q. And I'm looking at the second full paragraph here, and the last two sentence -- last three sentences of this paragraph. So do you see that the researchers say, quote, our finding contradicts the claim put forth

by Berent, Krosnick and Lupia in 2016 that survey respondents do not often over-report turnout?

Do I have that right?

A. That's right.

Q. Okay. And that's because, quote, these authors show that matched respondents tend not to over-report; however, they did not separate matched voters from matched nonvoters and, as a result, overlooked the tendency of matched nonvoters to over-report?

A. I see that.

Q. Okay. So they're contesting Berent, Krosnick and Lupia's 2016 article because their study did not separate matched voters from matched nonvoters?

A. Yes.

Q. And -- because matched nonvoters do tend to over-report voting. That's what it says here?

A. That's what it says.

Q. All right. And you -- you didn't consider this critique of the Berent, Lupia and Krosnick study before you relied on it?

A. I can consider it right now before -- as we speak.

Q. But I'm not -- not asking about right now; I'm just asking about --

A. Okay.

Q. -- when you were preparing the report.

A. I didn't consider it, but it -- it only reinforces my earlier conclusion that this is an actively controversial topic that is the subject of research among political scientists.

Q. Okay.

A. And it sounds like it is -- it is very controversial, and they are making progress over time.

Q. Making progress over time. That's what this reflects?

A. In -- in what can be known and what cannot be known.

Q. Okay. Do you know if Berent, Krosnick and Lupia have responded to this article?

A. I -- I know that if they did respond, it wouldn't yet be in print because the -- the time to respond to a study of this vintage would require another study that could take at least several years to get the study started, the funding for it. And then it would have to go through the peer-review process. So if it had been addressed, I would be surprised if there was anything published yet about it.

Q. Do they have any working papers?

A. I haven't -- I haven't really looked to see if

they have any. As I said, I didn't do the most comprehensive search that a political scientist might have done.

Q. Okay. And you don't know if they're working on any response to this?

A. No.

Q. All right.

A. I don't have any knowledge about that.

Q. I suppose taking the timing issues aside of getting a survey like this prepared, which I take your point, does not responding in the academic literature to a critique like this imply any concession of its validity?

A. Oh, no. This is -- this is just another contribution to a controversy. You know, you -- when you do a study like this by -- in a published -- peer-reviewed and published in a reputable journal, it says, "We did a study, and we found something different."

Q. And --

A. And it has the same status that -- the other study that was published that said, "We found something earlier that you didn't find."

Q. And so --

A. And so the ideas compete, and time passes.

And over time, one weighs the evidence and says, "Well, there's -- this is a controversial topic." And I know from my personal experience that whenever you work with administrative record data, as soon as you're talking about administrative record data for all states, you're getting into a huge problem area where the quality of administrative records on voting behavior varies immensely from state to state. And I know that from firsthand experience because I have evaluated that. That's within my area of expertise. And I can say if these two authors think that they have discovered the truth and they have been working with administrative record data, I want to see some kind of a book published on how they know that the administrative records that they have for all of the states for each state have passed muster, because I know that -- I know that that just doesn't -- that doesn't ring true.

Q. Okay. Sure. But you didn't read this article?

A. I didn't read it, but the premise here is that there's no problem with the administrative record data we used. And I say, well, granting -- granting you the most generous, most charitable assumption that you didn't get into any trouble with states that don't do a good job, you -- you haven't -- you haven't discovered

the -- the ultimate truth here. This is another worthy study that adds to the controversy and informs us, and it --

Q. But you didn't read their discussion of the quality of administrative records?

MR. CARDIN: Object to the form.

You may answer the question.

A. I -- I didn't read their -- I didn't read what they said about it, but I can tell you that there is no way -- there is no humanly possible way that anybody could certify that all of the administrative records on the elections in all the states that they got their hands on were perfect. What they did say, apparently, is that there are ways to integrate these that can be done very efficiently. But it's the quality of the data that I would say -- without even reading this, I can say, "I need to read what you did for quality assurance on the data."

Q. (BY MS. SMITH) Okay. So you would need to read the article?

A. I'd need to read this.

Q. Okay.

A. And -- and I don't have any opinion on this other than to say that it's another contribution --

Q. Got it.

A. -- to the debate.

Q. Okay. I think that concludes our discussion of that article. And I want to shift gears a little bit.

MS. SMITH: I don't think I have too many more questions, so if anyone needs a break, we can take one, but I want to be mindful of --

THE WITNESS: Sure.

MS. SMITH: -- folks getting to the airport and all. So I -- I would like to just keep going.

MR. CARDIN: Keep going.

THE WITNESS: Fine with me.

MS. SMITH: Great.

Q. (BY MS. SMITH) Okay. So I want to -- you testified earlier that you reviewed the report that Dr. D'Andra Orey submitted in this case?

A. You'll have to refresh my memory on --

Q. Sure.

A. Are -- is he the opposing expert?

Q. Yes.

A. Yes, I -- I scanned through it, yes.

Q. Okay. So I'm now going to mark the first report that Dr. Orey submitted in this case.

MS. SMITH: If I can please get...

(Exhibit 22 marked.)

Q. (BY MS. SMITH) All right. So I'm marking as Exhibit 22 the amended expert report of Dr. Byron D'Andra Orey, and that's dated -- I actually don't see a date on this, so I apologize, but this is the first amended expert report of Dr. Byron D'Andra Orey. All right?

A. All right.

Q. And feel free to take a moment to look at it, but is -- is this the report that you reviewed?

A. As best as I can determine from looking at this.

Q. Okay.

A. Let me just take a quick look through it.

Q. Yeah.

A. When -- when was this report submitted?

Q. I believe it would have been August --

MR. CARDIN: Let's -- let's go off the record for a second.

MS. SMITH: Let's go off the record.

(Recess taken from 2:57 to 3:05 p.m.)

Q. (BY MS. SMITH) All right. So just to clarify, Dr. Morrison, you don't offer any opinions about the conclusions that Dr. Orey came to in his original, first or second amended Senate Factor 5

report?

A. I -- that's correct.

Q. Okay. And so you don't offer any opinions in this case about any of the methods Dr. Orey used?

A. Not at this time, no.

Q. Okay. Okay. And you didn't review any of those three reports?

A. Not to my knowledge, no.

Q. Okay. But you did review Dr. Orey's rebuttal report served on November 22nd, 2023?

A. My recollection is I took a cursory look at it, yes.

Q. Great. So let's mark that into the record.

(Exhibit 23 marked.)

Q. (BY MS. SMITH) So this is the responsive expert report of Dr. Byron D'Andra Orey. Here you are.

A. Let me just take a moment to look at this so I can be sure this is the one I looked at.

Q. All right.

A. Okay. Yes, I remember reviewing this, yes.

Q. Okay. So you did review this report?

A. Yeah, I gave it a cursory read, and I got the -- the sense of what he was saying about my report. And let me just finish so I can refresh my memory here.

Q. Sure.

A. Okay. I -- I remember reviewing the portion where he was talking about my report, yes. So I'm -- I'm ready.

Q. Thank you. All right. I want to pull out another recent academic study on the over-reporting issue. And I -- I realize you didn't review this, but I'll represent to you that it was cited in Dr. Orey's initial reports. This is an article called "The Current Population Survey Voting and Registration Supplement Overstates Minority Turnout" by Stephen Ansolabehere from Harvard University, Bernard Fraga from Emory University and Brian Schaffner from Tufts University. I'm going to mark this as Exhibit 24.

(Exhibit 24 marked.)

Q. (BY MS. SMITH) There you are.

A. Thank you.

Q. Okay. And you haven't reviewed this article before?

A. No, I've not seen this before.

Q. All right. Would you agree with me that this was published in 2022 in -- I believe it's The Journal of Politics --

A. Yes.

Q. -- at the bottom?

A. Yes.

Q. Okay. Do you -- are you familiar with The Journal of Politics?

A. I know of it. I've heard of it. It's a reputable journal.

Q. Okay. Reputable political science journal?

A. Yes.

Q. All right. Let's turn to -- we're still on Page 1. I'm just looking at the summary text here. And on the third line, it says that this -- these authors are, quote, comparing CPS estimates to official voter turnout records from 2008 to 2018 and document consistent significant discrepancies that call into question the reliability of CPS turnout statistics.

A. I see that.

Q. You see that? Okay.

And it concludes in the next sentence that, quote, specifically, the CPS overestimates Black and Hispanic turnout relative to non-Hispanic Whites, whether relying on turnout rates as a share of eligible citizens or the racial/ethnic composition of the voting population.

Do you see that?

A. Yes.

Q. All right. And then turning to the next page, under "Comparing Voter File and CPS Turnout Estimates,"

I see here it says, quote, we compare turnout for different racial groups as estimated by the CPS with turnout for those same groups based on voter files.

All right?

A. Yes.

Q. And then about four lines down from there, it says they relied on data from six southern states?

A. Yes.

Q. Okay. And then beginning of the following paragraph, it says that they used voter file data collected by a voter file firm that has an established track record of producing estimates of the total number of voters closely aligned with semiofficial statistics?

A. Yes.

Q. And then turning to Page -- the third page in this document, so the next page -- thank you -- the right-hand side at the top reports their findings. It says, quote, 2016, the turnout rate among Whites was 10.8 percentage points higher than the turnout rate among Blacks. 2018, the gap in turnout rates was 8.6 percentage points. Yet, researchers relying on the CPS to examine turnout rates in these six states would find a gap in participation rates of just 3.7 points in 2016 and 2.5 points in 2018.

A. Yes.

Q. Do I have that right? Okay.

Based on their study, then they conclude in the following paragraph, quote, the CPS consistently overstates the participation rate among Blacks and Hispanics while it sometimes underestimates participation among Whites.

A. I see that, yes.

Q. And they're looking specifically at the CPS?

A. Yes.

Q. And just to go back for a moment to our discussion earlier about the literature you cited in your report, do you remember if any of those studies looked specifically at the CPS as opposed to the ANES?

A. I don't recall offhand. I -- I don't think I can answer your question offhand. I just -- I'm -- I'm paying attention to what you've got here --

Q. Of course.

A. -- and I'm wondering: What does this have to do with Mississippi now?

Q. It's a study showing over-reporting.

A. In?

Q. In the CPS, which is the --

A. Right.

Q. -- data source that you relied on in your report.

A. But in other states, not Mississippi, though. Is -- have I got that correct?

Q. The authors are making conclusions about the CPS at large.

A. Yeah. Okay. But Mississippi was not part of their study.

Q. No, but you used the CPS in your --

A. Yeah, I -- I realize that, but I'm just saying this is about states other than Mississippi. And so I just want to be clear that there's no direct connection with what's going on in Mississippi as opposed to what's going on in some other collection of states currently.

Q. Earlier, we looked at the states that Berent, Lupia and Krosnick discussed. Did they look at Mississippi specifically?

A. I -- I don't know. I'm just -- I'm focusing on this --

Q. Okay.

A. -- particular one. But anyhow. Go ahead. I'm just -- I'll answer the questions as best I can.

Q. So you don't know if Berent, Krosnick and Lupia looked at Mississippi specifically?

A. I'd have to look at it, but I'm just saying in this one -- you're asking me about this study, which has the virtue of being current, timely, and they have done

a study about the CPS, and they've looked at it in a half a dozen states, as I -- as I review -- read it.

Q. Would -- would -- just to make sure I'm understanding your point about Mississippi's inclusion in the data source, if Berent, Krosnick and Lupia did not look at Mississippi, would you discount the relevance of that study to your report?

A. I wouldn't discount the relevance. I would just say it's a qualification that this paper is about what they found occurring in states other than Mississippi and -- which brings into my mind, well, there's a big caveat here. You know, you have to assume that people in Mississippi behave the same way as the people in these six states. I'm just saying that's a caveat that I took note of and an important one that would -- would make this a study that I would want to know about, but I wouldn't -- I wouldn't --

Q. But you don't --

A. -- place a whole lot of weight on it, even though it's quite -- quite timely. And again, I would say it's another contribution to a controversial issue. They're saying in some states that aren't Mississippi, which is my focus, they're finding something that is important and informative about the CPS. And I also know that, you know, the CPS, unlike any other data

source that anybody has, covers 42 years of history, and none of these studies do.

Q. Okay.

A. So that's what I'm weighing, you know.

Q. Okay. But you haven't reviewed this before?

A. I -- I haven't -- I haven't reviewed it carefully. I -- I can just say that I'm -- I -- I guess I'm aware of it now.

Q. You're aware of it now, but you weren't aware of it before now?

A. I --

Q. Or were you aware of it?

A. I don't think I was aware of this.

Q. Okay. Let's finish up with this article. The end -- so going to the fifth page, the very last sentence of the article --

A. All right.

Q. -- the author -- the authors say they, quote, suggest that analysts use caution when making inferences about variation in turnout rates by ethnic and rac- -- racial and ethnic groups. Is that right?

A. Yes.

Q. Okay. Do you agree that reputable scholars here have pointed out that analysts should use caution when making inferences based on the CPS?

A. I think that's a -- it's a good conclusion to reach based on what you've shown me here. To conclude that after doing this research, you ought to use caution. That's about the right calibration --

Q. Okay. Understood.

A. -- or an opinion.

Q. Thank you. Let's talk about one more article. And thank you for your patience today.

(Exhibit 25 marked.)

Q. (BY MS. SMITH) So marked as Exhibit 25 is an article called "Vote Over-Reporting While Black: Identifying the Mechanism Behind Black Survey Respondents' Vote Over-Reporting." This is by Clinton Jenkins, Ismail White, Michael Hanmer and Antoine Banks, who are professors at -- or academics at Birmingham-Southern College, Princeton University and University of Maryland. It was published in American Politics Research in 2021.

A. I see that, yeah.

Q. Okay. And this was cited in the Orey rebuttal report that you reviewed --

A. Uh-huh.

Q. -- is that right?

A. If you say it's true, I'll -- I'll take your word for it.

Q. So we can -- we can take a look, if you'd like.

A. Okay.

Q. And turning back to the Orey rebuttal report --

A. Okay.

Q. -- I'll point to Page 1, Footnote --

A. Yeah.

Q. -- 1.

A. Uh-huh.

Q. Do you see it cited there?

A. Yes.

Q. Okay. But you haven't read this article before?

A. I -- I guess I'm aware of its existence as a recent article, but I haven't really reviewed it.

Q. Okay. You haven't reviewed it. Is that right?

A. That's correct.

Q. Okay. Do you know of the journal American Politics Research?

A. I don't know of it, but it sounds like it's one of a number of journals that are peer-reviewed.

Q. Okay. Would you agree that it's a paper in a reputable academic journal for political science?

A. I -- I -- I don't have enough knowledge to say if this is, you know, a top journal or, you know, just another journal. I see it's associated with Sage, which Sage Publications has a lot of journals where academics publish things so they can say, "I published something." But I'll take -- I'll assume it's a reputable journal.

Q. Okay. Okay. So looking at the abstract right here --

A. Uh-huh.

Q. -- it says here that this paper is looking at the fact that it -- okay. Quote: It is now a well-documented fact of survey research that Black survey respondents over-report turning out to vote at higher rates than many of their peers of other racial and ethnic backgrounds.

Is that what --

A. Yes.

Q. Okay. Quote: We bring renewed attention to this phenomenon by investigating how the ways in which the race of the interviewer might influence a Black respondent's propensity to over-report turning out to vote?

A. Yes, I see it.

Q. All right. And then just going to the left-hand side, bottom of that page, about three lines

from the bottom, it says they find, quote, that the need to conform to norms of Black political behavior activated by the presence of Black interviewers appears to be the chief causal mechanism underlying Black respondents over-reporting in the ANES. Right?

A. Yes.

Q. Okay. And then they say that these results suggest that the common practice of race-matching Black interviewers with Black respondents may greatly inflate Black voter turnout in surveys?

A. Yes.

Q. Okay. So these authors in a reputable journal are concluding that a couple mechanisms could lead to differential over-reporting by Black voters --

A. That -- that's what they're saying, yes.

Q. -- on self-reported voting surveys?

All right. We're almost done, Dr. Morrison. I want to look back at Exhibit 18 for just a moment, which is the 2011 Berent, Krosnick and Lupia working paper that you relied on --

A. Yes.

Q. -- to support your conclusions about over-reporting on surveys. I'd like to turn to Page 29 of that article.

A. All right. I've got it here.

Q. What states' government records did Berent, Lupia and Krosnick evaluate to match voters on the ANES in their study?

A. I -- I can't answer that question, as we sit here, without reading it and figuring out. What states?

Q. Yeah. So which six states are listed there?

A. Oh. Oh, you're asking me what --

Q. Yes.

A. Yeah, it says right here.

Q. Yeah, it says right there.

A. California, Florida, New York, North Carolina, Ohio and Pennsylvania.

Q. Is Mississippi one of those states?

A. No, it's not.

Q. Does that affect the weight that you placed on the survey when you came to your conclusions?

A. No, because -- no, it doesn't. I mean, it -- it has uncovered anomalies that could exist anywhere, and it has offered an alternative explanation for something that is happening. And this is the -- this is not the published version, so it's not as elegantly explained. But I take this as -- despite its not including Mississippi being a -- signaling a cautionary note about concluding that what's going on here is as simple as some other published -- published versions are

making out, that it's this -- this is what's causing some problem or that's what causing it. It's a very complicated thing, and different people are finding evidence of different things.

Q. Okay. I think --

A. And --

Q. Oh, yeah. Go on.

A. I mean, so -- and so, you know, each one of these papers kind of contributes to the debate among academics, but none of them has a 42-year continuous record of data that had been scientifically collected and evaluated and whose limitations are understood according to Census Bureau standards, and that's -- that's my unique strength in my study.

Q. Okay. And earlier, you testified that the 2022 Ansolabehere article in -- I believe it was published in 2022 -- that we should caveat those results because Mississippi was not one of the states that they specifically looked at?

A. Yes, I -- I would say it -- it -- it's not based on experience in Mississippi, and I -- I would say that Mississippi's experience, I think, is understood among historians. I'm just speaking as a -- as a layperson. Historians regard Mississippi's experience as rather distinctive in the United States.

Q. Does the same caveat apply to the article that you relied on, this working paper by Berent, Lupia and Krosnick?

MR. CARDIN: Object to the form.

You may answer.

A. I don't think I can answer that question. I -- I -- I just -- I -- I -- I can't give you an honest answer. I -- I'm not sure what I would have to say about that at this point.

Q. (BY MS. SMITH) Okay. I think that concludes my questions.

MS. SMITH: Do you have any?

MR. CARDIN: We have no questions.

MS. SMITH: All right. Thank you, Dr. Morrison, for your time today.

THE WITNESS: You're very welcome.

MS. SMITH: That concludes the deposition today.

THE REPORTER: And did you want the witness to read and sign?

MR. CARDIN: Yes.

(Deposition concluded at 3:27 p.m.)

(Review was requested pursuant to Federal Rule of Civil Procedure 30(e)(1).)

STATE OF TEXAS)

COUNTY OF DALLAS)

I, Stacy L. Jordan, Certified Shorthand Reporter, in and for the State of Texas, certify that the foregoing deposition of PETER A. MORRISON, PH.D. was reported stenographically by me at the time and place indicated, said witness having been placed under oath by me; that review was requested pursuant to Federal Rule of Civil Procedure 30(e)(1); and that the deposition is a true record of the testimony given by the witness.

I further certify that I am neither counsel for nor related to any party in this cause and am not financially interested in its outcome.

Given under my hand on this the 20th day of December, 2023.

_____

Stacy L. Jordan, CSR, RPR, CRR, CLR
Shorthand Reporter No. 7499
My commission expires 10-31-25
Buell Realtime Reporting
1325 Fourth Avenue, Suite 1840
Seattle, Washington 98101
800.846.6989

Time used by each party:
Ms. Casey Smith - 5:22

EXHIBIT C

From: Cindy Grantham
To: Joshua Tom; Ari Savitzky; Ming Cheung; erosenberg@lawyerscommittee.org; jnwachukwu@lawyerscommittee.org; David Rollins-Boyd; "Robert B. McDuff"; "Carroll Rhodes"; Lavelle, Jr., John P.; Jordan, Drew Cleary; "michael.keramidas@morganlewis.com"; Bhamdeo, Benjamin
Cc: Ryan Beckett; Tommie Cardin; Parker Berry; "Rex Shannon"; "Mike Wallace"; "Charles Cowan"
Subject: MS NAACP v. SBEC, No. 3:22-cv-00734-DPJ-HSO-LHS (S.D. Miss.) - Morrison Supplemental Report [IWOV-BUTLERSNOW.FID7560002]
Date: Monday, December 11, 2023 4:54:15 PM
Attachments: Morrison Supplemental Expert Report 12.11.2023.pdf

This Message Is From an External Sender
This message came from outside your organization.

Counsel,

Attached please find the Supplemental Expert Report of Peter A. Morrison, Ph.D. regarding the above-referenced matter. The only substantive changes to Dr. Morrison's report are as follows:

- Addition of FN 11; and
- Appendix C.

The Notice of Service for same will be served shortly via ECF notification from the Court.

Thank you.

Cindy Grantham
Paralegal
Butler Snow LLP

D: (601) 985-4326 | F: (601) 985-4500
1020 Highland Colony Parkway, Suite 1400, Ridgeland, MS 39157
P.O. Box 6010, Ridgeland, MS 39158-6010
Cindy.Grantham@butlersnow.com | vCard

Twitter | LinkedIn | Facebook | YouTube

CONFIDENTIALITY NOTE: This e-mail and any attachments may be confidential and protected by legal privilege. If you are not the intended recipient, be aware that any disclosure, copying, distribution or use of the e-mail or any attachment is prohibited. If you have received this e-mail in error, please notify us immediately by replying to the sender and deleting this copy and the reply from your system. Thank you for your cooperation.

EXHIBIT D

UNITED STATES DISTRICT COURT
FOR THE SOUTHERN DISTRICT OF MISSISSIPPI
NORTHERN DIVISION

MISSISSIPPI STATE CONFERENCE OF THE NATIONAL ASSOCIATION FOR THE ADVANCEMENT OF COLORED PEOPLE; DR. ANDREA WESLEY; DR. JOSEPH WESLEY; ROBERT EVANS; GARY FREDERICKS; PAMELA HAMNER; BARBARA FINN; OTHO BARNES; SHIRLINDA ROBERTSON; SANDRA SMITH; DEBORAH HULITT; RODESTA TUMBLIN; DR. KIA JONES; ANGELA GRAYSON; MARCELEAN ARRINGTON; VICTORIA ROBERTSON,

Plaintiffs,

vs.

STATE BOARD OF ELECTION COMMISSIONERS; TATE REEVES, *in his official capacity as Governor of Mississippi*; LYNN FITCH, *in her official capacity as Attorney General of Mississippi*; MICHAEL WATSON, *in his official capacity as Secretary of State of Mississippi,*

Defendants,

AND

MISSISSIPPI REPUBLICAN EXECUTIVE COMMITTEE,

Intervenor-Defendant.

Case No. 3:22-cv-734-DJP-HSL-LHS-FKB

SUPPLEMENTAL EXPERT REPORT OF PETER A. MORRISON, Ph.D.

December 11, 2023

I am an applied demographer and President of Peter A. Morrison & Associates. I am retired from The RAND Corporation, where I was Senior Demographer and the founding director of RAND's Population Research Center. I have provided testimony in litigation pertaining to the Voting Rights Act and districting plans and have constructed and/or evaluated numerous proposed local redistricting plans. I have made invited presentations on demographic aspects of redistricting to members and/or staff of the U. S. House of Representatives Subcommittee on the Census; the County Counsels' Association of California; League of California Cities; National League of Cities; and at professional meetings of academic demographers (Population Association of America and the Southern Demographic Association).

I have served on the U.S. Census Bureau Advisory Committee on Population Statistics, 1989-1995; and as an invited participant on the Bureau's Working Group on 2010 Race and Ethnicity. I have been elected as President of the Southern Demographic Association and to the Board of Directors of the Population Association of America, which are the two leading associations of professional demographers; and have taught students at the RAND Graduate School. I am being compensated at a rate of $350/hour for my work in reviewing the materials and preparing this report. I will be compensated at a rate of $500/hour for any testimony by deposition or at trial.

Attached **Appendix A** lists all cases in which I have testified by declaration, deposition, or at trial in the past four years. Attached **Appendix B** summarizes my academic background, including all publications in the last ten years.

I. SUMMARY OF CONCLUSIONS AND OPINIONS

1. I have been asked to opine on the level of political participation of Black eligible voters in Mississippi relative to that of the state's White eligible voters. "Political participation" here refers to the percentage of eligible voters who were registered to vote and who turned out to vote in a specific election or elections. I have accessed relevant data published by the US Census Bureau and report here what those data show.

2. To form my opinion, I have accessed and reviewed academic research on political participation by Mississippi voters. I also have assembled and analyzed data from U.S. Census Bureau's Current Population Survey (CPS), which publishes biennial data of high scientific quality. These CPS data enable me to compare the self-reported political participation of Black and White Mississippi voters in elections spanning a 42-year period. This CPS time-series of data affords a uniquely informative perspective on the central question I address: *Has the political participation of Black eligible voters changed over time relative to that of White nonHispanic eligible voters in Mississippi?* The CPS data afford me a four-decade historical perspective based upon published data from the US Census Bureau, the nation's recognized source of high-quality data.

3. Over a 42-year period, a distinct break occurred in the historical pattern of political participation by Mississippi voters. From 1980 through 2002, the political participation of Blacks trailed that of Whites, virtually without exception. From 2004 onward, that pattern reversed, such that Black political participation has *exceeded* that of Whites in most years. This break is authentic, irrespective of any apparent overreporting of registration or turnout on the CPS.

4. Based upon the entirety of these data and other research, it is my opinion that the level of Black political participation in terms of voter registration and turnout has exceeded that of Whites in most

years since 2004. This has been the case in every year since 2012 except one year when it was virtually equal.

II. DETAILED FINDINGS: MISSISSIPPI VOTER REGISTRATION AND TURNOUT

The U.S. Census Bureau's Current Population Survey (CPS) publishes biennial data of high scientific quality with which to compare the political participation of Black and White Mississippi voters. Like many published Census Bureau data products, the CPS is a well-documented sample survey, with known statistical and measurement limitations.[1] Federal agencies rely upon these high-quality data for a broad spectrum of policymaking and resource allocation decisions. For my purposes, the CPS affords me a consistent time-series of self-reported political participation over the 25-year period shown in Table 1:

Table 1. Political Participation by Race, Mississippi, 1998-2022

Voter Registration (Citizens 18+)				Voter Turnout (Citizens 18+)			
Year	% White (NH)	% Black (AP)	Black minus White	Year	% White (NH)	% Black (AP)	Black minus White
1998	75.8%	71.3%	-4.5%	1998	41.1%	40.4%	-0.7%
2000	73.1%	73.6%	0.5%	2000	62.4%	58.4%	-4.0%
2002	72.1%	69.4%	-2.7%	2002	44.6%	41.0%	-3.6%
2004	73.9%	76.1%	2.3%	2004	60.2%	66.6%	6.4%
2006	71.0%	72.2%	1.2%	2006	39.9%	50.5%	10.6%
2008	75.0%	81.9%	6.9%	2008	68.4%	73.1%	4.7%
2010	74.2%	73.6%	-0.6%	2010	47.7%	48.1%	0.4%
2012	82.4%	90.8%	8.4%	2012	71.8%	82.7%	10.9%
2014	72.8%	83.2%	10.4%	2014	40.3%	46.6%	6.3%
2016	78.8%	81.3%	2.5%	2016	67.7%	69.2%	1.5%
2018	71.8%	77.9%	6.1%	2018	51.7%	59.8%	8.1%
2020	79.2%	83.4%	4.2%	2020	69.8%	72.9%	3.1%
2022	74.3%	72.2%	-2.1%	2022	47.6%	47.0%	-0.6%

Source: U.S. Census Bureau, Current Population Survey (annual data). Reporting is consistent from 2006 onward.
Accessed at: Website: https://www.census.gov/data/tables/time-series/demo/voting-and-registration/p20-585.html

My specific focus is whether the political participation of Black eligible voters has changed relative to that of White nonHispanic eligible voters in Mississippi. *Political participation* means the rate at which eligible voters (citizens 18 and older) were registered to vote and turned out to vote after 2002. The CPS time-series data in Table 1 and Figure 1 afford a uniquely informative perspective. The data show a conspicuous pattern of change over the most recent 19-year period (2004 through 2022) compared with the preceding five-year period (1998 through 2002). The shaded cells highlight those election years in

[1] First, each individual percentage in Table 1 is a sample-based measure, accompanied by a margin of error (MOE). Second, studies have documented specific instances where respondents' self-reports appear to have exaggerated actual measured rates of voter registration and/or turnout.

which self-reported registration or turnout was likelier *lower* for Blacks than for Whites.[2] For voter registration, there were four such years (1998, 2002, 2010, and 2022); for voter turnout, there were four such years (1998, 2000, 2002, and 2022). For voter turnout, the overall pattern suggests that Blacks have turned out at rates typically above those of Whites since 2004.

What does this 25-year historical time-series reveal about the comparative political participation of Mississippi's Black and White voters since 2002? First, one must recognize the statistical and measurement limitations that accompany these CPS measures. Each individual percentage in Table 1 is a sample-based measure, with a statistical margin of error (MOE).[3] In general, the smaller the "Black minus White" percentage difference, the less meaningful the difference is statistically, i.e., the greater the likelihood it appears by chance.

Statistically marginal differences (merely "likelier than not") appearing over many successive years can substantiate an authentic *pattern* over time.[4] The multiple individual differences shown in the "Black minus White" columns of Table 1 may be statistically insignificant (as when a coin tossed comes up heads four successive times). However, those yearly differences may disclose a statistically significant historic change across several decades. In short, discerning meaningful patterns is an alternative approach for accommodating specific instances where respondents' self-reports might be shown to have exaggerated measured rates of voter registration and/or turn out.[5]

Mindful of these qualifications, I offer the following observations about the historical record from 1998 through 2022 documented in Table 1, based upon data that are strictly consistent: (1) Black voting-age citizens report having *registered to vote* at a higher rate than their White non-Hispanic counterparts in 8 of the 10 most recent biennial elections (2004 through 2022); and (2) Black registered voters report having *turned out to vote* at higher rates than their White non-Hispanic counterparts in 9 of those 10 most recent elections.

The data in Table 1 strongly suggest an apparent change since 2004 in Black political participation. First, Black eligible voters have registered to vote and turned out to vote at higher rates than White eligible voters have. Second, this pattern differs markedly from the pre-2004 pattern. I do not disregard the possibility of overreporting of registration or turnout by Black voters on the CPS. However, I do question attributing this historical break to a presumed *differential* overreporting on the part of Black voters relative to Whites.

To expand my 25-year historical perspective, I next included all the preceding years for which CPS data are available (1980 through 1996). Table 2 shows this entire time series, offering a 43-year historical

---

[2] I simply distinguish negative (shaded) values from positive (unshaded) values, irrespective of *how likely* that difference is statistically significant. My focus at this point is discerning overall patterns of positive or negative differences that are statistically "likelier than not" authentic differences (as distinct from purely random).

[3] "Margin of error" (MOE) is used in research to determine the precision of a specific result or a pattern of results in a scientific study. Expressed as +/- percentage points, a MOE tells us the degree to which a sample-based result may differ from the underlying true result, based upon 100% of the population. A smaller margin of error suggests the survey's results are more precise.

[4] As a simple example: 10 flips of a coin will often produce up to 7 heads simply by chance. However, 9 heads in 10 flips of a coin would offer proof with reasonable scientific certainty that the coin is biased.

[5] Like many published Census Bureau data products, the CPS is a well-documented sample survey, with well-understood statistical and measurement limitations. First, each individual percentage in Table 1 is a sample-based measure, accompanied by a margin of error (MOE). Second, studies have documented specific instances where respondents' self-reports appear to have exaggerated actual measured rates of voter registration and/or turn out.

perspective extending beyond what is shown in Table 1. One should note that from 1980 through 1996, the referent population was "persons ages 18+" rather than "citizens ages 18+". This definitional refinement has virtually no bearing on the appearance or magnitude of a racial difference between Black and White voters in Mississippi.

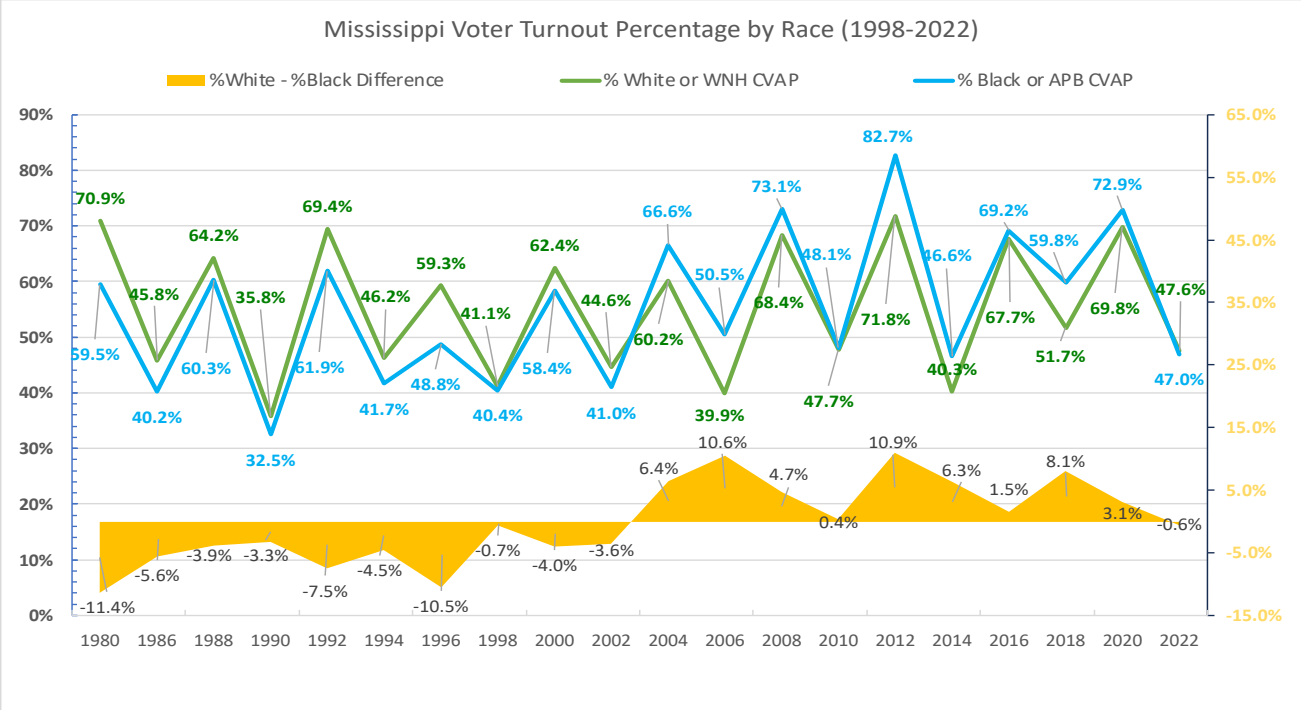
Table 2. Political Participation by Race, Mississippi Since 1980

Voter Registration (Persons 18+)				Voter Turnout (Persons 18+)			
Year	% White (NH)	% Black (AP)	Black minus White	Year	% White (NH)	% Black (AP)	Black minus White
1980	**85.2%**	**72.2%**	-13.0%	1980	**70.9%**	**59.5%**	-11.4%
1986	**77.3%**	**75.9%**	-1.4%	1986	**45.8%**	**40.2%**	-5.6%
1988	**80.5%**	**74.2%**	-6.3%	1988	**64.2%**	**60.3%**	-3.9%
1990	**70.8%**	**71.4%**	0.6%	1990	**35.8%**	**32.5%**	-3.3%
1992	**80.2%**	**78.5%**	-1.7%	1992	**69.4%**	**61.9%**	-7.5%
1994	**74.6%**	**46.2%**	-28.4%	1994	**69.9%**	**41.7%**	-28.2%
1996	**75.0%**	**59.3%**	-15.7%	1996	**67.4%**	**48.8%**	-18.6%
(Citizens 18+)				(Citizens 18+)			
1998	75.8%	71.3%	-4.5%	1998	41.1%	40.4%	-0.7%
2000	73.1%	73.6%	0.5%	2000	62.4%	58.4%	-4.0%
2002	72.1%	69.4%	-2.7%	2002	44.6%	41.0%	-3.6%
2004	73.9%	76.1%	2.3%	2004	60.2%	66.6%	6.4%
2006	71.0%	72.2%	1.2%	2006	39.9%	50.5%	10.6%
2008	75.0%	81.9%	6.9%	2008	68.4%	73.1%	4.7%
2010	74.2%	73.6%	-0.6%	2010	47.7%	48.1%	0.4%
2012	82.4%	90.8%	8.4%	2012	71.8%	82.7%	10.9%
2014	72.8%	83.2%	10.4%	2014	40.3%	46.6%	6.3%
2016	78.8%	81.3%	2.5%	2016	67.7%	69.2%	1.5%
2018	71.8%	77.9%	6.1%	2018	51.7%	59.8%	8.1%
2020	79.2%	83.4%	4.2%	2020	69.8%	72.9%	3.1%
2022	74.3%	72.2%	-2.1%	2022	47.6%	47.0%	-0.6%

Source: U.S. Census Bureau, Current Population Survey (annual data). Reporting is consistent from 2006 onward. Accessed at: Website: https://www.census.gov/data/tables/time-series/demo/voting-and-registration/p20-585.html

The overall historical time series in Table 2 and Figure 1 present a remarkable pattern of change over this 43-year historical period for which CPS data are available:

Figure 1. Historical Change in Voter Turnout by Race, Mississippi Since 1980



Source: Table 2 above.

Figure 1 displays a remarkably consistent difference between self-reported registration and turnout by Blacks and Whites from 1980 through 2002 (highlighted by the negative orange values). The opposite pattern emerged thereafter: mostly *positive* orange values, highlighting successive years when Black turnout exceeded that of Whites beginning in 2004.

Two interpretations are possible here. Either a genuine break in the historical pattern of Mississippi Black voters' political participation manifested itself in these data starting around 2004; or alternatively, the apparent break arose through a behavioral change—but only among Black eligible voters. Under this latter fanciful interpretation, Blacks (but not Whites) began overreporting that they were registered to vote and (especially) that they had turned out to vote.

As of this writing, I am unaware of any study offering me the historical depth and continuity of the Census Bureau's 43-year CPS survey, which might challenge my conclusion that a genuine break did occur.

III. BASIS FOR CONCLUSIONS AND OPINIONS

1. The data and research I have relied upon present two alternative possibilities. First, a genuine break may have occurred, as shown in the Current Population Survey's historical record of Mississippi Black voters' political participation since around 2004.[6] Alternatively, the apparent break may be only the byproduct of Black respondents having overreported registering and/or turning out to vote, as various studies suggest.[7] Note that these two possibilities are not mutually exclusive.

[6] See preceding Tables 1 and 2 and Figure 1.
[7] See, for example, Kanazawa, Satoshi, "Who Lies on Surveys, and What Can We Do About It?" *Journal of Social, Political and Economic Studies* 30 (Fall 2005): 361-370; and a series of articles by Abramson and Claggett (1984, 1986, 1989, 1991)

2. A recent comprehensive evaluation based upon the American National Election Studies (ANES)[8] puts these competing interpretations to a test. Its "Summary of Findings" on page 13 casts doubt on the second alternative (overreported registration and/or turnout) [*emphasis added below*]:

> "From these analyses, we conclude that the benefits of turnout validation are quite limited *and that factors other than respondent lying are a substantial cause of turnout overestimation.* We base these conclusions on four key findings. Three of these findings pertain to the quality of government records:
>
> First, official government records of registration and turnout behavior contain errors that make it difficult to accomplish accurate turnout validation.
>
> Second, the character and frequency of such errors varied substantially across states. These differences occurred, in part, because states kept and updated registration and turnout records in very different ways.
>
> Third, state-level differences in government records, including differences in types of errors, caused procedures that were apparently successful in matching survey respondents to government records in one state to be very unsuccessful in other states. This finding suggests that one-size-does-not-fit-all when it comes to the best way to match registration and turnout records to respondents across the states.
>
> Fourth, for survey respondents whose government records can be located, there are extraordinarily high rates of agreement between their self-reports and what their government records indicate. Indeed, people who participated in the 2008 ANES Panel Study, and whose self-reports could be matched to government records, genuinely turned out to vote at a higher rate than the general vote-eligible population. *This finding implies that lying contributed less to turnout over-estimation than is commonly thought.* This evidence suggests that surveys yield higher levels of apparent turnout than official vote tallies because people who choose to anticipate in surveys about elections are also more likely to participate in elections themselves."

3. Support for the latter alternative would call for a long-term detailed study comparable to the ACS, in which each Black respondent's *reported* turnout was matched with that same respondent's *actual* turnout at various points in the past. As of this writing, I know of no study with anywhere near the historical depth and continuity of the Census Bureau's 43-year CPS survey which might challenge my interpretation that the apparent break is genuine.[9]

---

in *Journal of Politics* using voter validation data from the National Election Studies (NES), suggesting that Blacks overreport voting at higher rates than do Whites.

[8] M. K. Berent, J. A. Krosnick, and A. Lupia, *The Quality of Government Records and Over-estimation of Registration and Turnout in Surveys: Lessons from the 2008 ANES Panel Study's Registration and Turnout Validation Exercise.* August 2011. Working Paper no. NES012554. Ann Arbor, MI and Palo Alto, CA: American National Election Studies. Access at: http://www.electionstudies.org/resources/papers/nes012554.pdf

[9] Studies purporting to show that Black respondents overreport registering and/or turning out to vote have limitations; most are highly specific and therefore cannot be generalized. The years analyzed by Abramson and Claggett are those for which voter validation was conducted (extending as far back as 1964); validation studies were not carried out after each election. The study by Kanazawa (2005) pools results only for years in which the ANES carried out validation; it relies upon estimated logistic regression models to estimate both registration and turnout.

4. The CPS self-reported data indicate that since 2004, Black eligible voters having turned out to vote at rates that generally *exceed* their White counterparts. Prior to 2004, this was rarely so.

5. Based upon the entirety of what I have reviewed, it is my opinion that a genuine break did occur in the historical pattern of Mississippi Black voters' political participation. In reaching this conclusion, I do not discount the possibility of ongoing overreporting of registration or turnout on the CPS.[10] The break itself, though, cannot be attributed just to the speculative claim of *differential* overreporting Blacks. As Berent et al. observe: *"The apparent success of turnout validation exercises in producing aggregate turnout rates that are closer to reported official turnout rates appears to occur not simply because the exercises weed out liars, but because the unrecognized 'downwards bias' due to errors in government records is stronger than the unrecognized 'upwards bias' in the actual rate of turnout amongst survey participants."* (p. 15).

6. It is therefore my opinion that Black voter registration and turnout has exceeded that of Whites in most years since 2004, and this represents a significant increase in parity of political participation between Blacks and Whites occurring during the past 43 years in Mississippi. I hold this opinion with reasonable scientific certainty, based upon the Current Population Survey.[11] I reserve the right to amend or supplement my report based on additional facts, materials or testimony that might become available.

[10] Any method that effectively and accurately matches respondents living in one state to available government records will not necessarily be as accurate in respondents living in another state. As Berent, Krosnick, and Lupia note (at p. 65): "Both the ANES 2008 Panel Study and the CPS data for November 2008 indicated that there are real demographic differences among people living in different states, and these demographic differences may impact the effectiveness of various matching methods."

[11] See Appendix C for tests of statistical significance.

Pursuant to 28 U.S.C. 1976, I declare under penalty or perjury that foregoing is true and correct according to the best of my knowledge, information and beliefs.

Peter A. Morrison

December 11, 2023

Appendix A
Cases Testified in Since 2018 by Declaration, Deposition, or at Trial

Peter A. Morrison, Ph. D.

1. EVENWEL v. PERRY, U.S. DISTRICT COURT FOR THE WESTERN DISTRICT OF TEXAS. Declaration on behalf of Plaintiffs seeking to enjoin Texas from conducting further state Senate elections under Plan S172 and asking the court to require the Texas Legislature to reapportion state senatorial voting districts in conformity with the Fourteenth Amendment.
2. EVENWEL et al. v. ABBOTT et al., UNITED STATES SUPREME COURT. "Brief of Demographers Peter A. Morrison, et al. as *Amici Curiae* in Support of Appellants," in Evenwel et al. v. Abbott et al., U.S. Supreme Court.
3. DR. PANKAJ JAIN, Plaintiff v. COPPELL INDEPENDENT SCHOOL DISTRICT, et al., U.S. District Court, Northern District of Texas, Dallas Division. Declaration on behalf of Defendant.
4. Glatt v. City of Pasco, et al., U.S. District Court, Eastern District of Washington. Declaration on behalf of Defendant.
5. Feldman et al. v. Arizona Secretary of State's Office et al., U.S. District Court, Arizona District. Declaration on behalf of Defendant.
6. Timothy Dadey et al. v. City of Costa Mesa, Case No. 30-2014-00757962-CU-CR-CJC and Timothy Dadey et al. v. City of Costa Mesa, Case No. 30-2014-00758104, pending in California Superior Court, Orange County. Deposition testimony.
7. Anne Harding et al. v. County of Dallas, Texas et al. U.S. District Court, Northern District of Texas, Dallas Division. C.A. No. 3: 15-CV-00131-D. Deposition and trial testimony on behalf of Plaintiffs.
8. Pico Neighborhood, et al. v. City of Santa Monica, et al. Superior Court of the State of California for the County of Los Angeles, No. BC616804. Deposition and trial testimony on behalf of Defendant.
9. NAACP et al. v. East Ramapo School District. United States District Court for the Southern District of New York. Expert report on behalf of Defendant; testimony at trial.
10. Joseph Thomas et al. v. Phil Bryant et al., Civil Action No. 3: 18cv 441-CWR-FKB in U. S. District Court for Southern District of Mississippi, Northern Division. Deposition and trial testimony on behalf of Defendants. Case appealed and subsequently dismissed.
11. S&R Development Estates, LLC v. Town of Greenburgh et al. in United States District Court, Southern District of New York. Declaration on behalf of Defendant. Case settled.
12. Holloway, et al. v. City of Virginia Beach, et al. Expert report on behalf of Defendant; deposition testimony.
13. Johnson et al v. Ardoin, Middle District of Louisiana, U. S. District Court. Expert report on behalf of Defendant Louisiana Department of Justice.
14. Vaughan v. Lewisville Independent School District et al., United States District Court, Eastern District of Texas, Sherman Division. Expert report on behalf of Defendant; deposition testimony.
15. Suresh Kumar v. Frisco Independent School District et al., United States District Court, Eastern District of Texas. Expert report on behalf of Defendant. Civil Action # 4:19-cv-00284.
16. Benisek v. Lamone, U.S. District Court, Maryland District. Case # 13-cv-3233. Expert Report.
17. Robert Ware v. City of Long Beach, California Superior Court, Los Angeles County. Case # 20STCV44216. Expert Report; deposition testimony.
18. NAACP v. East Ramapo Central School District, U.S. District Court, Southern District of New York, Case # 17-cv-08943-CS. Testified at trial.
19. Christian Ministerial Alliance, et al. v. Asa Hutchinson, et al. U.S. District Court, Eastern District of Arkansas, Central Division. Case # 4:19-cv-00402-JM. Declaration; Expert Report.
20. Thomas et al. v. Bryant et al. (Mississippi). Expert Report; testimony at trial.
21. Bohren v. Grocery Outlet. U.S. District Court, Northern District of California. Case # 4:20-cv-07085-KAW. Declarations.
22. Atkins et al. v. Sarasota County, FL. U.S. District Court, Case # 8:19-cv-03084-WFJ-CPT. Declaration.
23. Dixon v. Lewisville Independent School District et al. Declaration on behalf of Defendant supporting Motion to Strike.

(Updated: October 9, 2023)

Appendix B
Academic Background and Publications

Peter A. Morrison, Ph. D.

EMAIL: PETERMORRISON@ME.COM *VOICE*: (310) 266-9580

EDUCATION

B.A., Sociology, 1962, Dartmouth College
Ph.D., Sociology, 1967, Brown University

PROFESSIONAL EXPERIENCE

2009-present — President, Peter A. Morrison & Associates, Inc., Nantucket, MA
1969-2009 — Senior Staff Demographer and Resident Consultant, The RAND Corporation, Santa Monica, California
1979-1990 — Founding Director, Population Research Center, RAND
1967-1969 — Assistant Professor, Department of Sociology, and Research Associate, Population Studies Center, University of Pennsylvania, Philadelphia

AREAS OF EXPERTISE

Dr. Morrison's principal expertise centers on applications of demographic analysis to redistricting; tracking demographic trends; and envisioning consequences of demographic change for public policy and business.

Domestic applications include demographic analysis for electoral redistricting; store site selection; human resource analysis; evaluating employment discrimination and disparate impact claims, minority representation within jury pools, and school desegregation remedies; forecasting school enrollments; and using census and administrative data to monitor local community demographic contexts.

International applications include business concerns with corporate strategic planning, globally emerging middle-class consumer markets, and demographic precursors of expanding consumer markets; comparing and evaluating individual markets; and identifying potential business opportunities spurred by forthcoming demographic change.

Dr. Morrison conducts studies for the private sector and offers executive briefings on these topics through his consulting firm, founded in 1984. Clients have included American Express, American Stores, Corning, Inc., Ford Motor Co., Marriott International, NBC, New Directions for News, Times Mirror, University of California, and CIBC Securities (Canada).

Formerly a faculty member at the University of Pennsylvania, Dr. Morrison has taught periodically at UCLA, the RAND Graduate School, and the Helsinki School of Economics. He also lectures before academic and business audiences and has given invited testimony before subcommittees of the U.S. Senate and House of Representatives.

He has made invited presentations to the National Science Board, the Conference Board, the National League of Cities, the National Conference of State Legislatures, the University of California Management Institute, the American Bar Association, American Society of Newspaper Editors, newsroom seminars for the Casey Journalism Center, County Counsels Association of California, American College of Surgeons, National Association of Homebuilders, Missouri Legislative Forum, World Future Society, and Volunteers of America.

He has served as advisor to the Committee for Economic Development, the Congressional Research Service, and committees of the National Academy of Sciences, U.S. Census Bureau, Department of Agriculture, National Institutes of Health, California Energy Commission, California Governor's Council on Growth Management, Center for California Studies, and United Way.

PROFESSIONAL ORGANIZATIONS/HONORS

Advisory Board, Penn State University's online MA Program in Applied Demography

Invited participant, U.S. Census Bureau Working Group on 2010 Race and Ethnicity

Member, L.A. Unified School District Enrollment Analysis Technical Advisory Committee

Visiting Lecturer, Helsinki School of Economics and Business Administration, summer 2001

U.S. Census Bureau Advisory Committee on Population Statistics, 1989-1995 (Chair, 1990).

Population Association of America: Board of Directors, 1978-1980; Public Affairs Committee, 1979-1986; Chair, Nominations Committee, 1981-1982; annual Program Organizing Committee, 1995, 1998; Local Arrangements

Committee, 2000; Committee on Applied Demography, 1995-1999, Chair, 1998; Development Committee, 2006-2012.

Southern Demographic Association: Board of Directors, 1999-present; Vice President, 2001; President, 2003.

International Association of Applied Demographers (officer)

Center for Spatially Integrated Social Science, UC Santa Barbara: Advisory Board, 2000-

Research Advisory Board, Committee for Economic Development, 1988-1991.

Regents' Lecturer, UCLA, Spring 1987.

Social Science Research Council's Committee on Survey of Income & Program Participation, 1985-88.

National Advisory Child Health & Human Development Council, NIH, 1984-1987.

Population Research Committee, National Institute of Child Health & Human Development, 1977-79.

Committee on Behavioral and Social Aspects of Energy Consumption and Production, National Academy of Sciences, 1980-1982.

Committee on Urbanization and Population Redistribution, International Union for Scientific Study of Population, Chairman, 1976-1979.

Advisory Subcommittee for Applied Social and Behavioral Sciences, NSF, 1978-1981.

Future of Rural America Advisory Committee, FHA, 1978-1981.

Editorial Advisory Committee, *Urban Studies,* 1985-1995.

Editorial Advisory Board, *Journal of the Australian Population Assoc., 1995-1998.*

RECENT MEDIA APPEARANCES/COVERAGE:

Interviews: CNBC; New York Times; Los Angeles Times; USA Today; Time Magazine; Seattle Times; AMA/Marketing News

Commentary: New York Times; Wall Street Journal; Washington Post; International Herald Tribune; Pittsburgh Post-Gazette; Los Angeles Times; Atlanta Constitution; Houston Chronicle; San Jose Mercury News; Providence Journal; San Antonio Express-News

Articles: "United Nations of Nantucket," *N Magazine* (Winter 2016).
(access at: www.n-magazine.com/united-nations-nantucket/)

RECENT PRESENTATIONS:

May 11, 2022: Presentation of recommended redistricting plan to City Council, Mount Vernon, WA
Access at: https://www.youtube.com/watch?v=wLJ3CvxbmMI (starts: 36:35 - ends: 58:45)

February 2, 2022: Population Association of America, Applied Demography Conference (virtual):
"Redistricting 101: A Tutorial for Beginners," with Thomas M. Bryan & William A. V. Clark
Access at: https://www.youtube.com/watch?v=D22le1URCi4

February 2-4, 2021: Population Association of America, Applied Demography Conference (virtual):
"**New Technical Challenges in Post-2020 Redistricting**," with T. M. Bryan
"**Tutorial on Local Redistricting**," with T. M. Bryan
"**Learning to Live With COVID19: Anticipating Local Outbreaks**," with D. A. Swanson10/24/2019:

2019: Moderater, *"Border Walls: Exclusionary and Ineffective,"* 2019 AAAS annual meetings, DC.
Access at: https://aaas.confex.com/aaas/2019/meetingapp.cgi/Session/21451

2019: "**Demographic Constraints on Minority Voting Strength in Local Redistricting Contexts**," presented at 2019 Southern Demographic Association meetings, New Orleans (coauthored with Thomas Bryan). ***Terrie Award for Meeting's Best Research Presentation.***

10/24/2019: "**Prisoner Populations and Redistricting: Counting vs. Discounting**," presented at 2019 Southern Demographic Association meetings, New Orleans (coauthored with Thomas Bryan).

01/24/2019: **"Big Data for a Small Island,"** lunch hour talk at Nantucket Saltmarsh Center
https://www.youtube.com/watch?v=ZqqJ9STcMwE

10/13/2016: "**A Demographic Accounting Model for Class Action Litigation,**" presented at 2016 Southern Demographic Association meetings, Athens, GA (coauthored with Thomas Bryan).

10/22/2015: At Nantucket Historical Association's "Food for Thought" series:
"Immigration on Nantucket: What You Should Know"
https://www.youtube.com/watch?v=u17rINVweZs (Morrison presentation starts at minute 2:10)

2015: City of Waterbury, CT presentations **"Alderman by District Reapportionment Commission"**
https://www.waterburyct.org/content/33396/33400/33431/default.aspx

01/08/2014 meeting: https://www.youtube.com/watch?v=aj6qE3JECg0&feature=youtu.be
(Morrison presentation start at minute 23:10)
01/14/2015 meeting: https://www.youtube.com/watch?v=98Vp4y11_sc
(Morrison presentation starts at minute 9:10)

2014: **"Investing in Nantucket's Future"** http://vp.telvue.com/preview?id=T02542&video=223735
(Morrison presentation starts at minute 1:30)

2013: **"Growing Old: How Aging Populations Will Transform Our Lives and Times"**
http://www.youtube.com/watch?v=kJvS_hhgLDk&feature=c4-overview-vl&list=PLjgJVmnztYsTqYVn_ijBhCGxA5-7DMtGw (Morrison presentation starts at minute 1:05)

TOP CITED PUBLICATION (GOOGLE SCHOLAR)

Peter A. Morrison

RAND; Morrison & Associates
Demography
Redistricting

	All	Since 2015
Citations	3258	529
h-index	30	11
i10-index	61	12

TITLE	CITED BY	YEAR
Return and other sequences of migration in the United States JS DaVanzo, PA Morrison Demography 18 (1), 85-101	272	1981
Chronic movers and the future redistribution of population: a longitudinal analysis PA Morrison Demography 8 (2), 171-184	196	1971
Duration of residence and prospective migration: the evaluation of a stochastic model PA Morrison Demography 4 (2), 553-561	172	1967
Rural renaissance in America? The revival of population growth in remote areas. PA Morrison, JP Wheeler Population Reference Bureau, Inc., 1337 Connecticut Avenue, NW, Washington …	164	1976
The Los Angeles riots: Lessons for the urban future M Baldassare, DO Sears, EW Butler, PA Morrison Routledge	161	2019
Teenagers willing to consider single parenthood: Who is at greatest risk? AF Abrahamse, PA Morrison, LJ Waite Family Planning Perspectives, 13-18	156	1988
A new method for estimating race/ethnicity and associated disparities where administrative records lack self-reported race/ethnicity MN Elliott, A Fremont, PA Morrison, P Pantoja, N Lurie Health services research 43 (5p1), 1722-1736	131	2008
Using the Census Bureau's surname list to improve estimates of race/ethnicity and associated disparities MN Elliott, PA Morrison, A Fremont, DF McCaffrey, P Pantoja, N Lurie Health Services and Outcomes Research Methodology 9 (2), 69	118	2009
The changing demographic and economic structure of nonmetropolitan areas in the United States KF McCarthy, PA Morrison	98	1977

BOOKS

Morrison, P. A. and T. M. Bryan, ***Redistricting: A Manual for Analysts, Practitioners, and Citizens*** (Springer, 2019).
Preview at: https://www.amazon.com/Redistricting-Manual-Analysts-Practitioners-Citizens/dp/3030158268

Morrison, P. A., ed. ***A Taste of the Country: A Collection of Calvin Beale's Writings*** (Penn State Univ. Press, 1990).
Preview at: https://www.amazon.com/Taste-Country-Collection-Writings-Studies/dp/0271006315

Morrison, P. A., co-ed. ***Demographics: A Casebook for Business and Government*** (Westview Press, 1994). *Access at:* https://www.rand.org/pubs/monograph_reports/MR904.html

Morrison, P. A., ed. ***Population Movements: Their Forms and Functions in Urbanization and Development*** (IUSSP, Ordina Editions, Liege, Belgium, 1983).

Morrison, P. A. ***Demographic Information for Cities: A Manual for Estimating and Projecting Local Population Characteristics*** (Santa Monica, CA: RAND Corporation, R-618, 1971).
Access at: https://www.rand.org/pubs/reports/R0618.html

SELECTED PUBLICATIONS/PAPERS/POLICY BRIEFS/OP-EDs/ ORAL HISTORIES

Three of my Nantucket oral histories are accessible as podcasts at:
https://podcatr.com/narrative/documentaries/history/american-history/all-ears-nantucket/
Select: "From Chalatenango"; "Mrs. Whyte"; and "Two New Yorks: Episode 1"

Most of my publications (or abstracts) are accessible at these sites:

https://www.researchgate.net/profile/Peter_Morrison2/publications?sorting=newest&page=2

www.rand.org/pubs/authors/m/morrison_peter_a.html

"Chap. 6. An Early-Warning Covid-19 Alert and Response Protocol for Seasonal Resort Communities," David Swanson and Peter Morrison; and "Chap.16. America's Post-Pandemic Future," (coauthor). Forthcoming in: D. Swanson & R. Verdugo, eds., *Socio-Demographic Perspectives on the COVID-19 Pandemic* (Information Age Publishing, 2023).

"America's Post-Pandemic Future: A Demographic Perspective," in *PAA Affairs,* 2022 (coauthor).
Access at: https://www.populationassociation.org/blogs/david-swanson/2022/01/04/americas-post-pandemic-future-a-demographic-perspe

"The contribution of first-name information to the accuracy of racial-and-ethnic imputations varies by sex and race-and-ethnicity among Medicare beneficiaries," (coauthor). *Medical Care* 60(8):556-562, August 2022.
Access at: www.lww-medicalcare.com

"America's Post-Pandemic Future: A Demographic Perspective," *PAA Affairs* (coauthor), 2022.
Access at: https://www.populationassociation.org/browse/blogs?CommunityKey=a7bf5d77-d09b-4907-9e17-468af4bdf4a6

"Sanctuary Cities Get a Census Bonus," op-ed in *The Wall Street Journal*, July 16, 2019.
https://www.wsj.com/articles/sanctuary-cities-get-a-census-bonus-11563318817?fbclid=IwAR3Ygf2TAeqLjsUc_hbu3GS1775Zd9iGG3dIgWcMF1DQPv95jsTFBPtdHOY

"Small-Area and Business Demography" (coauthor) Chapter 31 in Dudley L. Poston, Jr. (editor). *Handbook of Population*. 2nd edition. Cham, Switzerland: Springer Nature.

"A border wall won't stop people from coming here illegally," op-ed in *The Bryan-College Station (TX) Eagle,* March 19, 2019 (co-author). *Access at:*
https://www.theeagle.com/opinion/columnists/a-border-wall-won-t-stop-people-from-coming-here/article_5b5e7216-4551-582c-9e82-0f5adf37896d.html

"Demographic Approaches to Unveiling a Partisan Gerrymander," presented at the 2019 Population and Public Policy Conference, Albuquerque, NM.

"Estimating Nantucket's Effective Population," *Population Research & Policy Review,* 2020 (coauthor). *Access at:* https://link.springer.com/article/10.1007%2Fs11113-019-09565-8

"Small-Area and Business Demography," chapter in D. Poston, ed., *Handbook of Population (*Springer, 2019), coauthored with Stan Smith & Thomas Bryan.
Access at: https://link.springer.com/chapter/10.1007/978-3-030-10910-3_32

"Distinguishing 'False Positives' Among Majority-Minority Election Districts in Statewide Congressional Redistricting," 2017 Southern Demographic Association meetings (coauthor).

"A Comparison of Methods for Classifying and Modeling Respondents Who Endorse Multiple Racial/Ethnic Categories: A Healthcare Experience Application," (coauthor) *Medical Care* 57(6) 2019. *Access at:* https://www.ncbi.nlm.nih.gov/pubmed/30439794

"Can Puerto Ricans Spark a Latino Political Backlash?" op-ed in *San Antonio Express-News*, February 13, 2018 (coauthored with Charles S. Bullock, III).
Access at: https://www.researchgate.net/publication/323200663_Can_Puerto_Ricans_spark_a_Latino_political_backlash

"Focus on Teaching: The Legend of the Calamity-Induced Baby Boom," PAA Affairs, Spring 2017.
Access at: https://www.researchgate.net/publication/315683457_Focus_on_Teaching_The_Legend_of_the_Calamity-Induced_Baby_Boom

"The Demography of Trump's Wall," *N-IUSSP*, April 3, 2017 (coauthor).
Access at: www.niussp.org/article/demography-trumps-wallle-mur-de-trump-et-ses-consequences-demographiques/
Russian translation: https://demreview.hse.ru/article/download/8667/9249/

"Three Myths of U.S. Immigration," op-ed in *San Antonio Express-News*, March 4, 2017 (coauthored with Dudley L. Poston, Jr.).
Access at: www.mysanantonio.com/opinion/commentary/article/Three-myths-of-U-S-immigration-10975928.php

"From Legal Theory to Practical Application: A How-To for Performing Vote Dilution Analysis," *Social Science Quarterly* 99(2): 536-552 (2018), coauthor.
Access at: https://www.researchgate.net/publication/315631377_From_Legal_Theory_to_Practical_Application_A_How-To_for_Performing_Vote_Dilution_Analyses_From_Legal_Theory_to_Practical_Application

"Foreward" to D. A. Swanson, ed., *The Frontiers of Applied Demography* (2017)
Assess at: https://www.researchgate.net/publication/311486631_Foreward_to_The_Frontiers_of_Applied_Demography_2017

"Projecting Future Demand for Assisted Living in the US: A Case Study," chapter 6 in D. A. Swanson, ed., *The Frontiers Applied Demography* (2017).
Access at:
https://www.researchgate.net/publication/311800586_Projecting_Future_Demand_for_Assisted_Living_chap_6_in_THE_FRONTIERS_OF_APPLIED_DEMOGRAPHY

"Health Care Access: The Hollow Promise," op-ed in *Starkville Daily News*, 10/18/2016 (coauthored with Ron Cossman).
Access at: https://www.researchgate.net/publication/309458235_Health_Care_Access_The_Hollow_Promise

"Our Island Home's Future: A Demographic Perspective," white paper for Town of Nantucket, 12/08/2015. *Access at:* https://records.nantucket-ma.gov/WebLink/DocView.aspx?id=122533&dbid=0&repo=TownofNantucket&cr=1

"We have the data to make voting fair. Let's use it." op-ed in *The Washington Post,* 10/22/2015
Access at: http://www.washingtonpost.com/news/in-theory/wp/2015/10/22/we-have-the-data-to-make-voting-fair-lets-use-it/

Supreme Court of the United States. "Brief of Demographers Peter A. Morrison, Thomas M. Bryan, William A. V. Clark, Jacob S. Siegel, David A. Swanson, and The Pacific Research Institute as *Amici Curiae* in Support of Appellants," in Evenwel et al. v. Abbott et al.
Access at: http://www.scotusblog.com/wp-content/uploads/2015/08/Demographers-Amicus.pdf

"Exploring the Blizzard Babies Phenomenon," op-ed in *Providence Journal*, March 3, 2015.
Access at: www.providencejournal.com/article/20150303/OPINION/150309836

"A Method to Forecast Hispanic Voting Strength at Local Scales," presented at Applied Demography Conference, San Antonio, Texas, January 8-10, 2014.

"Quantifying the Effect of Age Structure on Voter Registration," *Social Science Quarterly* (2014).
Access at: http://onlinelibrary.wiley.com/doi/10.1111/ssqu.12059/abstract

"Forecasting Hispanics' Ripening Voting Strength at Local Scales," presented at 2012 Annual Meeting of Southern Demographic Association, Williamsburg, VA

"Gauging Hispanics' Effective Voting Strength in Proposed Redistricting Plans: Lessons Learned Using ACS Data," (coauthored with T. Bryan), for National Academy of Sciences Workshop on the Benefits (and Burdens) of the American Community Survey, Case Studies/Agenda Book, chap. 5 (2012). *Access at:* http://sites.nationalacademies.org/cs/groups/dbassesite/documents/webpage/dbasse_073124.pdf

"Chinese Workers Could Replace Mexican Immigrants," op-ed in *Houston Chronicle*, Aug. 12, 2011 (coauthored with Dudley Poston, Jr.).
Access at: www.chron.com/opinion/outlook/article/Chinese-workers-could-replace-Mexican-immigrants-2077827.php

"Integrating Census Data to Support a Motion for Change of Venue," *Population Research & Policy Review* (coauthored with Dean Judson), 2011. *Access at:* http://paa2011.princeton.edu/papers/111043

"An Evaluation of Additive and Hierarchical Classifications of Race/Ethnicity as Measured on Census 2000," coauthor (under review).

"Using the Census Bureau's Surname List to Improve Estimates of Race/Ethnicity and Associated Disparities," *Health Services and Outcomes Research Methodology* 9(2), pp.69-83 (coauthor). *Access at:* www.rand.org/pubs/external_publications/EP20090611.html

"Teaching Business Demography Using Case Studies," presented at the International Union for the Scientific Study of Population Seminar on Applications of Demography in Business, Sydney Australia, October 2007 (coauthor). Appears in *Population Research & Policy Review.*
Access at: http://link.springer.com/article/10.1007/s11113-009-9155-4

"Targeting Spatial Clusters of Elderly Consumers in the USA," presented at the International Union for the Scientific Study of Population Seminar on Applications of Demography in Business, Sydney Australia, October 2007 (coauthored with Thomas Bryan). Appears in *Population Research & Policy Review. Access at*: http://link.springer.com/article/10.1007/s11113-009-9149-2

"Assessing the Need for a New Medical School: A Case Study in Applied Demography," *Population Research & Policy Review* 2010 (coauthor). *Access at:* https://www.researchgate.net/publication/226767472_Assessing_the_Need_for_a_New_Medical_School_A_Case_Study_in_Applied_Demography

"A New Method for Estimating Race/Ethnicity and Associated Disparities Where Administrative Records Lack Self-Reported Race/Ethnicity," coauthor, *Health Services Research Journal* 43(5), Oct. 2008. *Access at:* http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2653886/

"Forecasting the Supply of and Demand for Physicians in the Inland Southern California Area" (coauthor), RAND Technical Report TR524, 2007.

"Evaluating a Claim of Discriminatory Annexation Using Demographic Analysis: An Instructional Case," at 2005 annual Southern Demographic Association meetings.

"Evaluating Evidence of Discrimination in Multi-Ethnic Housing Markets," *Population Research & Policy Review,* 2008 (coauthored with William A. V. Clark).
Access at: https://link.springer.com/article/10.1007/s11113-007-9066-1

"Methods for Gauging the Target Populations that Community Colleges Serve," *Population Research & Policy Review* 26(1), 2007 (coauthored with L. Santibañez, G. Gonzalez, S. J. Carroll).
"Lingering Effects of Discrimination: Tracing Persistence Over Time in Local Populations," *Population Research & Policy Review*, 2006. *Access at:* https://link.springer.com/article/10.1007/s11113-006-0005-3

"Understanding the Antecedents of Underage Drinking," at 2005 annual Southern Demographic Association meetings, Durham, NC (coauthored with Allan Abrahamse).

"China: Bachelor Bomb," op-ed appearing in *New York Times*, International Herald Tribune 09/14/2005 (coauthored with Dudley Poston)
Access at: https://www.nytimes.com/2005/09/14/opinion/china-bachelor-bomb.html

"Small-Area and Business Demography," chapter in D. Poston and M. Micklin, *Handbook of Population*, 2005 (coauthored with Stan Smith).

"Future Demographic Challenges to California School Districts," presented at 2005 annual Population Association of America meetings, session on School Demography.

"Demographic Overview of California's K-12 Public School Student Population," chap. 2 in S. J. Carroll et al., *California's K-12 Public Schools: How Are They Doing?* RAND MG-186, 2005.

"Counting on Demography: Fostering Applications of the Social Sciences," invited plenary address at the 2005 Southwestern Social Science Association meetings, New Orleans

"How Migration Flows Shape the Elderly Population of Metropolitan Pittsburgh," at 2004 annual Southern Demographic Association meetings, Hilton Head, SC (coauthored with Chris Briem)

"The Bright Lights in Pittsburgh's Future," op ed appearing in *Pittsburgh Post-Gazette*, Sept. 19, 2004 (coauthored with Barry Balmat)

"New Approaches to Spotting Enclaves of the Elderly Who Have Aged in Place," presented at 2004 Population Association of America meetings (coauthored with Tom Bryan).

"Developing an Arab-American Surname List: Potential Demographic and Health Research Applications," at 2003 Southern Demographic Association meetings (coau. with B. Kestenbaum, D. Lauderdale, A. Abrahamse, S. El-Badry).

"A Demographic Overview of Metropolitan Pittsburgh," RAND Issue Paper IP-256 (2003).

"Confronting a Race-Based School Admissions Policy," *Chance* 16(1), 2003.

"An Overview of Business Demography in the U.S.A.," invited paper for the Australian Population Association's 11th Biennial Conference, Sydney, October 2002.

"Internal Migration and Short-Distance Mobility," Chapter 19 in D. Swanson, et al., *The Methods and Materials of Demography*, rev. ed., 2003 (coau. with T.M. Bryan and D.A. Swanson).

"Business Demography," in P. Demeny and J. McNicholl, eds., *Encyclopedia of Population*, 2003 (coauthored with Stan Smith).

"A National Legacy of Migration," in Carla Blank, *Rediscovering America* (2003).

Review of J. S. Siegel, *Applied Demography: Applications to Business, Government, Law, and Public Policy* in *Population and Development Review* 28(1), 2002.

"A Demographic Perspective on Our Nation's Future," RAND Documented Briefing, 2001.

"Using First Names to Estimate Racial Proportions in Populations," (coauthored with D.I. Word & C.D. Coleman), presented at the 2001 Population Association of America meetings.

"At-Large Elections Under Legal Challenge: Where Demographic Analysis Fits In," presented at the 2000 Population Association of America meetings.

"Meeting Local Information Needs: A Case Study in Team Applied Demography," *Applied Demography Newsletter*, Population Association of America, Spring 2002 (coauthored).

"Gauging Future Prospects for a Neighborhood Vehicle: Where Demographic Analysis Fits In," at 1999 Southern Demographic Association meetings, San Antonio.

"Forecasting Enrollments for Immigrant Entry-Port School Districts," *Demography*, Nov. 2000.

"Charting Alternatives to a Segregated School Admissions Policy: Where Demographic Analysis Fits In," at 1998 Population Association of America meetings, Chicago (abridged version appears in *Chance*).

"Unveiling the Demographic 'Action' in Class Actions," *Population Research and Policy Review*, 1999. *Access at:* https://link.springer.com/article/10.1023/A%3A1006381629603

"Family Policies and Demographic Realities," chapter in J.W. Hughes and J.J. Seneca, eds., *America's Demographic Tapestry: Baseline for the New Millennium*, Rutgers Univ. Press, 1999.

"Applying Demographic Analysis in Affirmative Action Disputes: An Instructional Case," *Population Research and Policy Review*, 1998.
Access at: https://link.springer.com/article/10.1023/A%3A1006017911057

"Demographic Influences on Latinos' Political Empowerment: Comparative Local Illustrations," *Population Research and Policy Review*, 1998.
Access at: https://link.springer.com/article/10.1023/A%3A1005914503677

"Demographic Change and School District Response: Assessing Alleged Discriminatory Effects of Boundary Changes," under review (with W.A.V. Clark).

"Forecasting Enrollments During Court-Ordered Desegregation," *Population Research and Policy Review*, 1996.

"Applying Demographic Analysis to Store Site Selection," *Population Research and Policy Review,* 1996 (with A. F. Abrahamse).

"Tracking Growth of Emerging Consumer Markets Worldwide: Where Demographic Analysis Fits In," presented at Sixth International Conference on Applied and Business Demography, Bowling Green, OH (coauthored).

"Tying Knots in the American Tapestry," Op-ed article, *Los Angeles Times,* Sept. 18, 1995.
Access at: http://articles.latimes.com/1995-09-18/local/me-47167_1_ethnic-identity

"Broadening Client Perspectives on Business Concerns," *Applied Demography*, Summer 1995.

"Demographic Foundations of Political Empowerment in Multi-Minority Cities," *Demography*, May, 1995 (with W.A.V. Clark).

"Demographic Perspectives on the Voting Rights Act," RAND P-7905, 1995 (briefing cohosted by U. S. House Subcommittee on Census and The Population Resource Center, Oct.19,1994).

Demographics: A Casebook for Business and Government, Westview Press, 1994 (coeditor).

"Empowered or Disadvantaged? Applications of Demographic Analysis to Political Redistricting," chapter in *Demographics* (cited above).

"A Riot of Color: The Demographic Setting of Civil Disturbance in Los Angeles," RAND P-7819 (with Ira S. Lowry). Condensed version appears in Mark Baldassare (ed.), *The Los Angeles Riots: Lessons for the Urban Future*, Westview, 1994.
Access at: https://www.researchgate.net/publication/311800927_A_Riot_of_Color_The_Demographic_Setting

"Surname Analysis for Estimating Local Concentration of Hispanics and Asians," *Population Research and Policy Review*, 1994 (with A. F. Abrahamse).
Access at: https://www.researchgate.net/publication/270279296_Surname_Analysis_for_Estimating_Local_Concentrations

"The Demographic Context of Army Family Support Policy," chapter in M.J. Eitelberg and S.L. Mehay (eds.), *Marching Toward the 21st Century* (Greenwood Press, 1994).

"Strategic Sleuths," *Forecast Magazine*, Nov/Dec 1993.

"Congress and the Year 2000: Peering into the Demographic Future," *Business Horizons*, Nov/Dec 1993 (condensation of RAND N-3279 cited below).

"A California That Can Work: People, Productivity, and Energy," RAND P-7828 (invited testimony before the California Energy Commission, June 1993).

"Goodbye Past, Hello Future: California's Demographic Shift," Op-ed article, *Los Angeles Times*, September 13, 1993.

"More than Meets the Eye," *Chance*, May 1993.

"Employment Discrimination: How Demographic Analysis Fits In," presented at Fourth International Conf. on Applied Demography, Bowling Green, Ohio, September 1992.

"Is 'Aging in Place' a Blueprint for the Future?" Association of American Geographers Meeting, San Diego, RAND, P-7794, 1992.

"Gauging Hispanic Voting Strength: Pitfalls and Paradoxes," *Population Research and Policy Review*, 1992 (with W.A.V. Clark).

"Local Redistricting: The Demographic Context of Local Boundary Drawing," *National Civic Review*, Winter/Spring 1992 (with W.A.V. Clark).

"Mirroring the Mosaic: Redistricting in a Context of Cultural Pluralism," RAND, P-7789, 1992.

"Testimony before House Subcommittee on Census and Population," RAND, P-7784, 1992.

"Healthier Childhoods and Family Responsibility: Two Issue Papers," RAND, P-7788, 1992.

"How Demographic Analysis Supports Redistricting," for Mandatory Continuing Legal Education course sponsored by County Counsels Association of California, January 1992.

"California's Future: More to Come," Op-ed article, *The Los Angeles Times*, Dec. 3, 1991.
Access at: http://articles.latimes.com/1991-12-03/local/me-416_1_future-growth

Soldiers' Families: Tracking Their Well-Being During Peacetime and War, RAND, N-3405-A, 1992 (coauthor).

"California's Demographic Outlook: Implications for Growth Management," RAND, P-7738, 1991.

"The Changing Demographic Context of Postsecondary Education," RAND, P-7737, 1991.

"The Demographer's Role in the Local Boundary-Drawing Process," RAND, P-7711, 1991 (coauthor).

"Looking In From Outside: Enhancing Demographic Perspectives on Business Concerns," given at 1991 Population Association of America meetings.

"Demographic Paradoxes in the Los Angeles Voting Rights Case," *Evaluation Review*, 1991 (with W.A.V. Clark).

"Future Images—Childhood, The Workplace, Our Communities," RAND P-7656, 1990.

"The Changing Demographic Context of Municipal Governance," RAND P-7654, 1990.

"Pitfalls in Estimating Eligible Voters Among Hispanics," coauthored, given at 1990 Population Association of America meetings.

"Demographic Factors Reshaping Ties to Family and Place," *Research on Aging*, Dec. 1990.
Access at: https://journals.sagepub.com/doi/pdf/10.1177/0164027590124002

"Applied Demography: Its Growing Scope and Future Direction," *The Futurist*, 24(2): 9–15. March/April 1990.

"A Demographic Perspective on Future Issues," *Congressional Research Service CRS Review*, Jan/Feb 1990.

"Leaving School Early: 'Stopping Out' and Dropping Out Among American Youth," given at the 1989 American Sociological Association meetings (with Jane Mauldon).

Families in the Army: Looking Ahead, RAND, R-3691-A, 1989 (coauthor).

"Quantifying Legal Standards in Section 2 Voting Rights Cases," paper given at Population Association of America.

Congress and the Year 2000: A Demographic Perspective on Future Issues, RAND, N-3279, March 1991.

"What Tomorrow's Demographers Will Be Called Upon to Do," RAND P-7469, 1988.

Beyond Stereotypes: Who Becomes a Single Teenage Mother?, RAND R-3489, 1988 (coau.).

"Government Must Help Families With Long-term Care for Elderly," op-ed article, *The Atlanta Constitution*, April 19, 1988.

"Teens Willing to Consider Single Parenthood: Who is at Greatest Risk?" *Family Planning Perspectives*, Jan/Feb, 1988 (coauthor).

The Current Demographic Context of Federal Social Programs, RAND, N-2785, 1988.

"Demographic Factors Reshaping the U.S. Market for New Housing," RAND, P-7467, 1988.

"Applied Demography: Its Current Scope and Future Direction in the United States," RAND Paper, 1988.

Public Libraries Face California's Ethnic and Racial Diversity, RAND, R-3656, 1988 (coauthor, Chapter 4).

"Changing Demographics: What to Watch For," *Business Economics*, 1987.

"Continuity and Change Across the Population Sciences," RAND, P-7281, 1986.

"Pro-Family Laws May Miss the Mark," op-ed article in *The Wall Street Journal*, Dec. 5, 1986.

Changing Family Structure: Who Cares for America's Dependents? RAND, N-2518, 1986.

"Accounting for the Educational Shortfalls of Mothers," *Journal of Marriage and the Family*, 1986 (coauthored).

"The Prism of Migration," *Social Science Quarterly*, 1986 (with Julie DaVanzo).
Access at: https://www.researchgate.net/publication/284957921_The_prism_of_migration_Dissimilarities_between_return_and_onward_movers

How Demographic Shifts Will Affect the IRS and Its Mission, RAND, P-7170, 1985.
Access at: http://www.popline.org/node/421417

"Characteristics of Migrants from Metropolitan to Nonmetropolitan Areas in the U.S.A.," *Espace Populations Societes*, 1985 (with Kevin McCarthy).

Demographics and Business Decisionmaking: Prospects and Possibilities for the 1980s, RAND, P-7017, 1984. Appears in *Marketing Review*, Fall 1985.

"Tracking People," *Group Practice Journal*, July/August 1984.

Demographic Forces Reshaping Small Communities in the 1980s, RAND, N-1887, 1982 (coauthor). Appears in *Southwestern Review of Management and Economics*, 1984.

Population Movements: Their Forms and Functions in Urbanization and Development (Ordina: International Union for the Scientific Study of Population, 1983). Editor and author of Chap. 1.

Current Demographic Trends and Federal Policy: An Overview, RAND, N-2030, 1983.

"Is Population Deconcentration Lengthening Commuting Distances?" *Population Research and Policy Review*, 1983 (with Kevin McCarthy).

Migration Sequences: Who Moves Back and Who Moves On?, RAND, R-2548-NICHD, 1982 (with Julie DaVanzo).

Demographic Challenges in America's Future, RAND, R-2911, 1982 (with William P. Butz).

"Different Approaches to Monitoring Local Demographic Change," chapter in E. S. Lee and H. F. Goldsmith, eds., *Population Estimates: Methods for Small Area Analysis*, Sage, 1982.

"The Energy Situation and the World of Californians," in *Regional Perspectives on Energy Issues*, (The Conference Board, July 1982).

Demographic Certainties and Uncertainties in the Future of Social Security, RAND, N-1742-NICHD, 1981 (invited Senate testimony). Appears in *Challenge: The Magazine of Economic Affairs*, Jan.-Feb., 1982.

"There Are Just Too Many Uncertainties," op-ed article, *The Sacramento Bee*, 9/20/81.

Teenage Parenthood: A Review of Risks and Consequences, RAND N-1714, 1981 (coau.).

Teenage Parents: Their Ambitions and Attainments, RAND, R-2771, 1981 (coau.).

"Return and Other Sequences of Migration in the U.S.," *Demography*, 18 (1): 85-101 1981 (coau.).

"How Demographers Can Help Legislators," *Policy Analysis*, 1980.

Accommodating the Demography of the 1980s, Midcontinent Perspective Series, Midwest Research Institute, December 1980.

City Data: A Catalog of Data Sources for Small Cities, RAND, R-2612, 1980 (coauthored).
Access at: https://www.rand.org/content/dam/rand/pubs/reports/2008/R2612.pdf

Effects of Postsecondary Experiences on Aspirations, Attitudes, and Self-Conceptions, RAND R-2616, 1980 (coauthor).

Consequences of Parenthood in Late Adolescence: Findings from the National Longitudinal Study of High School Seniors, RAND, N-1343-NICHD, 1979 (coauthored).

"Demographic Trends Impinging on Energy Use," chapter in Charles T. Unseld et al., *Sociopolitical Effects of Energy Use and Policy*, National Academy of Sciences, Washington, D.C., 1979.

The Future Demographic Context of the Health Care Delivery System, RAND, N-1347, 1979.

"The Transition to Zero Population Growth in the Midwest," chapter in C. C. Roseman (ed.), *Population Redistribution in the Midwest*.

"Current Demographic Change in Regions of the United States," chapter in V. L. Arnold (ed.), *Alternatives to Confrontation: A National Policy Toward Regional Change*; condensed version appears in *American Demographics*, May 1979.

Overview of Demographic Trends Shaping the Nation's Future, RAND, P-6128, 1978 (testimony before Joint Economic Committee of Congress).
Access at: http://www.popline.org/node/440950

The Current Demographic Context of National Growth and Development, RAND, P-5514, 1975 (Congressional testimony); published in condensed form in L. S. Bourne and J. W. Simmons (eds.), *Systems of Cities*, Oxford Univ. Press, 1978, Chap. 6.6.

"Emerging Public Concerns Over U.S. Population Movements in an Era of Slowing Growth," in T. Espenshade and W. Serow (eds.), *The Economic Consequences of Slowing Population Growth*, 1978.

"The Image of 'Elsewhere' in the American Tradition of Migration" (coauthored), in W. H. McNeill and R. S. Adams (eds.), *Human Migration: Patterns, Policies, Implications*, Indiana University Press, Bloomington, Indiana, 1978.

"New York State's Transition to Stability: The Demographic Outlook," in Ben Chinitz (ed.), *The Declining of New York in the 1970s: A Demographic and Economic Analysis*, Praeger, 1978.

Toward A Policy Planner's View of the Urban Settlement System, RAND, P-5357, 1975; condensed version appears in L. S. Bourne and J. W. Simmons (eds.), *Systems of Cities*, Oxford University Press, 1978, Chap. 7.3.

"The Changing Demographic and Economic Structure of Nonmetropolitan Areas in the U.S.," *International Regional Science Review*, 2(2), 1977 (with Kevin McCarthy).

"Forecasting Population of Small Areas: An Overview," in *Population Forecasting for Small Areas*, Oak Ridge Associated Universities, Oak Ridge, Tennessee, 1977.

"Demographic Trends That Will Shape Future Housing Demand," *Policy Sciences*, 1977.

"The Functions and Dynamics of the Migration Process" (Chap. 4); and "Urban Growth and Decline in the U.S.: A Study of Migration's Effects in Two Cities" (Chap. 14), in A. Brown and E. Neuberger (eds.), *Internal Migration: A Comparative Perspective*, Academic Press, 1977.

San Jose and St. Louis in the 1960s: A Case Study of Changing Urban Populations, RAND, R-1313-NSF, 1973; adaptation appears in S. Goldstein and D. Sly (eds.), *Patterns of Urbanization: Comparative Country Studies*, International Union for Scientific Study of Population, Liege, Belgium, 1977.

Rural Renaissance in America? The Revival of Population Growth in Remote Areas, Population Reference Bureau, Inc., 1976.

National Longitudinal Study of High School Seniors: An Agenda for Policy Research, RAND, R-1964-HEW, 1976 (coauthored).

The Demographic Context of Educational Policy Planning, Occasional Paper of the Aspen Institute for Humanistic Studies, 1976.

Mental Health and Mental Retardation Services in Nevada. Santa Monica, CA: RAND Corporation, 1976 (coauthor). Access at: https://www.rand.org/pubs/reports/R1800.html

"A Method for Monitoring Small-Area Population Changes in Cities," *Review of Public Data Use*, April 1975 (coauthored).

Recent Research Insights into Local Migration Flows, RAND, P-5379, 1975 (coauthored).*Population Movements and the Shape of Urban Growth: Implications for Public Policy*, RAND, R-1072-CPG, 1972 (Commission on Population Growth and the American Future, *Research Reports*, Vol. V, 1973); adaptation appears in J. Friedmann and W. Alonso, *Regional Policy: Readings in Theory and Applications*, MIT Press, 1975.

"Urban Growth and Decline: San Jose and St. Louis in the 1960s," *Science*, 1974.

Review of Federal Programs to Alleviate Rural Deprivation, RAND, R-1651, 1974 (coauth.).

"Guiding Urban Growth: Policy Issues and Demographic Constraints," RAND P-5212, 1974.
Access at: https://www.academia.edu/29836028/Guiding_urban_growth_Policy_issues_and_demographic_constraints

"A Demographic Assessment of New Cities and Growth Centers as Population Redistribution Strategies," *Public Policy*, 1973.

Dimensions of the Population Problem in the United States RAND, R-864-CPG, 1972 (Comm. on Population Growth and the Amer. Future, *Research Reports*, Vol. V, 1973).

How Population Movements Shape National Growth, RAND, P-5007, 1973 (Congressional Seminar on National Growth Policy).

Migration from Distressed Areas: Its Meaning for Regional Policy, RAND, R-1103, 1973.

"Theoretical Issues in the Design of Population Mobility Models," *Environment and Planning*, 1973.

"The Impact and Significance of the Rural-Urban Migration in the United States," RAND, P-4752, 1972 (testimony before U.S. Senate Subcommittee on Migratory Labor and Public Welfare).

"The Changing U.S. Population and Future Demand for Air Travel," RAND, P-4938, 1972. https://www.rand.org/pubs/papers/P4938.html

"Chronic Movers and the Future Redistribution of Population," *Demography*, 1971.

"The Role of Migration in California's Growth," in K. Davis and F. Styles (eds.), *California's Twenty Million: Research Contributions to Public Policy*, Institute of International Studies, University of California, Berkeley, 1971.

"Duration of Residence and Prospective Migration," *Demography*, 1967.

APPENDIX C

TESTS OF STATISTICAL SIGNIFICANCE

My conclusions and opinions in this Report rely upon two separate tests of statistical significance, each of which confirms the existence of this apparent reversal in political participation after 2002.[12]

The first test is the K-means cluster analysis test of voter registration rates shown in Table 2 of my Report. This test rules out the null hypothesis here with strict scientific certainty ($p < 0.001$). Accordingly, I conclude with scientific certainty that the 1980-2002 voter registration rates correspond to one cluster and the 2004-2022 voter registration rates correspond to a different cluster. The K-means cluster analysis has the distinctive strength of focusing on the possibility that the time series is no more than a succession of annual voter registration rates with no underlying racial dimension of change over time. For voter registration, an underlying pattern surely exists. Technical details of the K-means cluster analysis are documented in Appendix Figure 1.

Turning next to the voter turnout rates in Table 2 of my Report, I have conducted a difference of proportions test pertaining to statistical significance. For initial clarification, Figure 1 in my report highlights the dominant four-year cyclical pattern associated with the regular cycle of presidential and nonpresidential elections held every four years. This cyclical pattern is apparent in the pronounced saw-tooth visualization of the dominant voter turnout pattern in Figure 1 over the entire 42-year period from 1980 to 2022.

At the bottom of Figure 1, we see (in orange) a visualization of just the *racial difference* in each biennial election (apart from the dominant cyclical component). For example, the "-11.4%" shown at the lower left corner of Fig. 1 represents the difference in the 1980 election between the 59.5% of Blacks who turned out that year and the 70.9% of Whites who turned out. This orange visualization shows "*valleys"* on the left, which denote 10 successive election years when Black voter turnout trailed White voter turnout (1980-2002); and "*hills"* on the right, which denote 9 successive years when Black voter turnout exceeded White voter turnout (2004-2020). The question I pose here is whether the sequence of numerical differences shown at the bottom of Figure 1 (-11.4%, -5.6%, -3.9% . . . +1.5%, +8.1%, +3.1%) document a genuine reversal in the underlying pattern.

Here I rely upon a difference of proportions test (the Fisher's Exact Test). This test rules out the null hypothesis with strict scientific certainty ($p < 0.001$). Accordingly, I conclude with scientific certainty that this apparent reversal of the racial difference in turnout (from Black turnout trailing that of Whites from 1980-2002 to the reverse thereafter) surely is real. Technical details of the Fisher's Exact Test are documented in Appendix Figure 2.

[12] These tests were conducted at my direction by two colleagues, Prof. David Swanson and Dr. Jeff Tayman. As an applied demographer, it is common practice to collaborate with other demographers and statisticians who can advise me on the use, application, and performance of statistical significance tests.

APPENDIX FIGURE 1: TECHNICAL DETAILS FOR K-MEANS CLUSTER ANALYSIS

K-Means Cluster Analysis Report

Dataset Untitled

Minimum Iteration Section

Iteration No.	No. of Clusters	Percent of Variation	Bar Chart of Percent
1	2	24.58	|||||||

Iteration Section

Iteration No.	No. of Clusters	Percent of Variation	Bar Chart of Percent
1	2	24.58	|||||||
2	2	24.58	|||||||
3	2	24.58	|||||||

Cluster Means

Variables	Cluster1	Cluster2
C3	0.4368	0.6644
Count	10	10

Cluster Standard Deviations

Variables	Cluster1	Cluster2
C3	0.05485091	0.07981395
Count	10	10

F-Ratio Section

Variables	DF1	DF2	Between Mean Square	Within Mean Square	F-Ratio	Prob Level
C3	1	18	0.2590088	0.004689444	55.23	0.000001

APPENDIX FIGURE 2: TECHNICAL DETAILS FOR FISHER'S EXACT TEST

Fisher's Exact test. Over the 42 years from 1980 to 2022, the voting patterns of White and Blacks are not stable. They have reversed from a higher percentage of White than Black voters turning out between 1980 and 2002 to a higher percentage of Black than White voters turning out since 2002. A difference of proportions test (Fisher's Exact test) indicates with more than 99% certainty that this shift is not due to chance.

Chi-Square Tests

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)	Point Probability
Pearson Chi-Square	16.364[a]	1	.000	.000	.000	
Continuity Correction[b]	12.929	1	.000			
Likelihood Ratio	21.024	1	.000	.000	.000	
Fisher's Exact Test				.000	.000	
Linear-by-Linear Association	15.545[c]	1	.000	.000	.000	.000
N of Valid Cases	20					

a. 2 cells (50.0%) have expected count less than 5. The minimum expected count is 4.50.

b. Computed only for a 2x2 table

c. The standardized statistic is -3.943.

EXHIBIT E

RE: Dr. Morrison Supplemental Report [IWOV-BUTLERSNOW.FID7560002]

Parker Berry <Parker.Berry@butlersnow.com>
Fri 12/22/2023 9:52 AM
To:Ari Savitzky <asavitzky@aclu.org>;Tommie Cardin <Tommie.Cardin@butlersnow.com>
Cc:Casey Smith <csmith@aclu.org>;Ming Cheung <MCheung@aclu.org>

This Message Is From an External Sender
This message came from outside your organization.

Ari,
Regarding the below, for #1 there is no file, and the answer is no to both in #2.

Thx,

B. Parker Berry
Butler Snow LLP

D: (601) 985-4402 | F: (601) 985-4500
1020 Highland Colony Parkway, Suite 1400, Ridgeland, MS 39157
P.O. Box 6010, Ridgeland, MS 39158-6010
Parker.Berry@butlersnow.com | vCard | Bio

Twitter | LinkedIn | Facebook | YouTube

From: Ari Savitzky <asavitzky@aclu.org>
Sent: Thursday, December 21, 2023 1:42 PM
To: Parker Berry <Parker.Berry@butlersnow.com>; Tommie Cardin <Tommie.Cardin@butlersnow.com>
Cc: Casey Smith <csmith@aclu.org>; Ming Cheung <MCheung@aclu.org>
Subject: RE: Dr. Morrison Supplemental Report [IWOV-BUTLERSNOW.FID7560002]

Hi Parker,

Thanks for the below. A few follow up questions.

(1) Can you provide a file which links the cluster assignments for the K-Means test (i.e., outputs of the analysis) to the respective election years?

(2) Did Dr. Morrison, or the individuals working for him, run K-Means cluster analysis on voter turnout rates? Or Fisher's exact test on voter registration rates? If so, please provide the results for those tests.

Thanks,

Ari

Ari Savitzky
Senior Staff Attorney, Voting Rights Project
American Civil Liberties Union
125 Broad St., New York, NY 10004
212.549.2681 | 401.529.3982 (cell) | asavitzky@aclu.org
Pronouns: he, him, his

aclu.org

This message may contain information that is confidential or legally privileged. If you are not the intended recipient, please immediately advise the sender by reply email that this message has been inadvertently transmitted to you and delete this email from your system.

From: Parker Berry <Parker.Berry@butlersnow.com>
Sent: Friday, December 15, 2023 1:13 PM
To: Casey Smith <csmith@aclu.org>
Cc: Tommie Cardin <Tommie.Cardin@butlersnow.com>
Subject: Dr. Morrison Supplemental Report [IWOV-BUTLERSNOW.FID7560002]

Casey,

For Dr. Morrison's Supplemental Report, we are advised that there is no "code" for the K-Means Cluster Procedure. NCSS uses "boxes" and "point and click" to run procedures, which are listed in the output as "commands." The URL to the NCSS "K-means cluster analysis" (https://www.ncss.com/wp-content/themes/ncss/pdf/Procedures/NCSS/K-Means_Clustering.pdf) sets forth how the K-means cluster procedure operates in NCSS, along with a copy of the attached NCSS output which shows the "commands" on the last page.

The same is true for the Fisher's exact test. It is implemented as a point-and-click procedure in SPSS 25. Below is a link on how to do the test in SPSS
https://ezspss.com/how-to-do-fisher-exact-test-in-spss/

B. Parker Berry
Butler Snow LLP

D: (601) 985-4402 | F: (601) 985-4500
1020 Highland Colony Parkway, Suite 1400, Ridgeland, MS 39157
P.O. Box 6010, Ridgeland, MS 39158-6010
Parker.Berry@butlersnow.com | vCard | Bio

Twitter | LinkedIn | Facebook | YouTube

CONFIDENTIALITY NOTE: This e-mail and any attachments may be confidential and protected by legal privilege. If you are not the intended recipient, be aware that any disclosure, copying, distribution or use of the e-mail or any attachment is prohibited. If you have received this e-mail in error, please notify us immediately by replying to the sender and deleting this copy and the reply from your system. Thank you for your cooperation.

CONFIDENTIALITY NOTE: This e-mail and any attachments may be confidential and protected by legal privilege. If you are not the intended recipient, be aware that any disclosure, copying, distribution or use of the e-mail or any attachment is prohibited. If you have received this e-mail in error, please notify us immediately by replying to the sender and deleting this copy and the reply from your system. Thank you for your cooperation.