Action No.: 2001-14300 E-File No.: CVQ22INGRAMR Appeal No.:

IN THE COURT OF QUEEN'S BENCH OF ALBERTA JUDICIAL CENTRE OF CALGARY

BETWEEN:

REBECCA MARIE INGRAM, HEIGHTS BAPTIST CHURCH, NORTHSIDE BAPTIST CHURCH, ERIN BLACKLAWS and TORRY TANNER

Applicants

and

HER MAJESTY THE QUEEN IN RIGHT OF THE PROVINCE OF ALBERTA And THE CHIEF MEDICAL OFFICER OF HEALTH

Respondents

HEARING (Excerpt)

Calgary, Alberta February 10, 2022

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TABLE OF CONTENTS

Description		Page
February 10, 2022	Morning Session	1
Discussion		1
Opening Statement by Mr. Rath		19
Opening Statement by Mr. Grey		29
JAYANTA BHATTACHARYA, Swoi	rn, Examined by Mr. Grey (Qualification)	37
Submissions by Mr. Grey (Qualification)	43
Submissions by Mr. Parker (Qualification	on)	43
Ruling (Qualification)		44
The Witness Cross-examined by Mr. Par	rker	44
Certificate of Record		50
Certificate of Transcript		51
February 10, 2022	Afternoon Session	52
JAYANTA BHATTACHARYA, Previ	iously Sworn, Cross-examined by Mr.	52
Parker		
Discussion		116
Certificate of Record		121
Certificate of Transcript		122

1 2	Proceedings taken in the Court of Queen's Bench of Alberta, Courthouse, Calgary, Alberta	
3		
4	February 10, 2022	Morning Session
5	•	
6	The Honourable Justice Romaine	Court of Queen's Bench of Alberta
7		
8	J.R.W. Rath (remote appearance)	For R. Ingram
9	K.E. Newton (remote appearance)	For R. Ingram
10 11	L.B.U. Grey, QC (remote appearance)	For Heights Baptist Church, Northside Baptist Church, E. Blacklaws, and T. Tanner
12	N. Parker (remote appearance)	For Her Majesty the Queen in Right of the
13		Province of Alberta and The Chief Medical
14		Officer of Health
15 16	B.M. LeClair (remote appearance)	For Her Majesty the Queen in Right of the Province of Alberta and The Chief Medical
17		Officer of Health
18	N. Trofimuk (remote appearance)	For Her Majesty the Queen in Right of the
19		Province of Alberta and The Chief Medical
20		Officer of Health
21	M. Palmer	Court Clerk
22		
23		
24		
THE COURT: So good morning. We proceedings in the matter of Ingram and Her Majesty the Queen. I e present in Court, but I do not see anyone, so perhaps we could state inform me if they are online, and introduce me the other members of 30		one, so perhaps we could start by having counsel
31	So I think I see Mr. Parker?	
32		
33	MR. PARKER:	You do, Justice Romaine, good morning. Can
34	you hear me okay?	
35	THE COLD T	T
36	THE COURT:	I can, that is great.
37	MD DADKED.	Co the magnetation and managed to the magnetic
38 39	MR. PARKER: Niels Perker and my colleagues Proof	So the respondents are represented by myself,
39 40 41	remotely. And that's the counsel today for the respondents.	

1	THE COURT:	Okay, thank you.
2	THE COURT.	Okay, mank you.
3	Mr. Rath, are you online?	
5	MR. RATH:	I am, Madam Justice. We sent an email into the
6	Court yesterday advising that we'd be ap	pearing online, just out of concern for document
7 8	production and the efficiency of the proc	eedings.
9	THE COURT:	Okay.
10	THE COURT.	Okuj.
11	MR. RATH:	We were uncertain how it was going to work
12	with having one counsel in Court or two	counsel in Court trying to put documents to the
13	_	I opted to appear virtually, so thank you for that,
14	My Lady.	
15		
16	THE COURT:	Okay.
17		
18	MR. RATH:	I am here with Katherine Newton of my office.
19		
20	THE COURT:	Ms. Newton.
21	MD DATH	
22	MR. RATH:	And she is appearing alongside of me. So thank
23	you, Madam Justice.	
24	THE COLID T.	Olzav, thank you
2526	THE COURT:	Okay, thank you.
27	And, Mr. Grey?	
28	rind, wir. Grey:	
29	MR. GREY:	Good morning, Madam Justice.
30		0 0 0 d 11101111118, 1120 d 11110 d 111100
31	THE COURT:	And do you have other members of your team
32	online as well?	·
33		
34	MR. GREY:	I do have my assistant, Lesley Doucette
35	(phonetic), who is listening in, but she's i	not on camera.
36		
37	THE COURT:	Okay. But none of the other, Mr. Kitchen,
38	Mr. Cameron (phonetic), no 1st else is or	nline with you?
39	MD CDDW	
40	MR. GREY:	No. Mr. Kitchen is no longer involved in the
41	proceedings.	

1	THE COURT.	Oh alvary	Thoulesson
2 3	THE COURT:	On, okay.	Thank you.
4	So even though this proceeding is being	conducted	in a hybrid manner actually it may
5	be less hybrid and more by Webex, both		
6	and courtesy to Court staff and other of t		•
7	,	1 1	8
8	In order to ensure this, I am going to m	nake three o	orders now, the breach of which could
9	result in judicial sanctions.		
10			
11	First, there is to be no image capture,	screenshots	s, or photography taken of me, as the
12	Judge, the Court staff, and any of the leg	gal counsel	or witnesses.
13			
14	Secondly, there is to be no recording of	_	<u> </u>
15	recording. This does not mean that the		s are not open. And if I would like to
16	obtain an official transcript, these are av	ailable.	
17	771 41: 1 1: 4: T 1111 4 1	• 4	6 1 1 1 1
18	The third direction I would like to make		•
19	line that the part of the Webex process		
20 21	intended for Court business only, to be u	ised by the	lawyers and courtroom start.
22	I would like to ask whether anybody is a	rranging fo	r daily transcripts on this? No? Okay
23	1 would like to ask whether any body is a	iranging 10	daily transcripts on this. Two. Okay.
24	MR. RATH:	Madam Jı	ustice, this is Mr. Rath speaking, I saw
25	my friend, Mr. Parker's lips moving, bu		_ _ _ _
26	answer that.		1 , 2
27			
28	THE COURT:	Oh, okay.	
29			
30	Mr. Parker?		
31			
32	MR. PARKER:	Do you he	ear me Justice Romaine?
33			
34	THE COURT:	Yes, I hea	ar you. I do not see you on the screen,
35	but I hear you.		
36	MD DADVED.	Ol. I -1	
37	MR. PARKER:		uld be on the screen, my apologies. I
38 39	turned off my camera because I was exp Can everybody else see me?	bettencing I	eg cramps. Dut i snould be back now.
39 40	Can everybody eise see lile?		
41	MR. RATH:	I can.	
1.1	WILL IN IIII	ı can.	

1		
2	THE COURT:	Yes.
3		
4	MR. PARKER:	Okay. And you can hear me, Mr. Rath?
5	MD DATH	37
6 7	MR. RATH:	Yes.
8	MR. PARKER:	I just said we were looking into it, but we hadn't
9		naine. I'm not sure we will, given the cost.
10	unining of outside J or, 1/1000011 of 000100 11011	
11	THE COURT:	Okay. I may make the arrangements for that
12	myself, so I will let you know if I do.	
13		
14	MR. PARKER:	Thank you.
15	THE COLDT	
16 17	THE COURT: the witness list by appearance?	The other thing is have the parties decided on
18	the withess list by appearance:	
19	MR. PARKER:	We did send one, Mr. Trofimuk sent one last
20		and he sent it again this week. And so we have
21	agreed on it, subject to the Pickford issue	_
22		
23	THE COURT:	Okay. Let me tell you, unfortunately this
24		lerable change in the Court's technology. Tonight
25		be frozen, they are going to migrate to a new
2627		ll hoping that this will go smoothly, but it may last week that the Court staff is working hard to
28	address.	last week that the Court start is working hard to
29	address.	
30	Some of those issues have already turned	d up, in that I have not been receiving emails from
31	some of the parties in this case and in	fact, I was completely shut out of the Court email
32		I think that has been resolved, and we hope that
33		ut I do have to warn you that if sometimes you
34		in the next few days have to concede that we have
35	not received it. We will get you know as	s we go.
3637	So I have not seen the witness list but y	you said that you sent it last week, and then again
38	this week? Mr. Parker, can you tell me v	•
39	and week. Will I aiker, can you tell life v	
40	MR. PARKER:	Yes. I'm going to let my apologies, Justice
41	Romaine, I'm having severe pain in my l	egs here I'm going to let Mr. Trofimuk speak to

1 2	this, and I'm going to stay off-camera wh	ile I resolve this.
3	THE COURT:	Okay, no problem.
5	MR. PARKER:	My apologies.
7 8	THE COURT:	Mr. Trofimuk?
9 10 11	MR. TROFIMUK: was sent to Angela last week, Angela Wr	So, yes, thank you, Justice Romaine. So that right (phonetic).
12 13	THE COURT:	Okay.
14 15 16	MR. TROFIMUK: name this week, but I can quickly doub	And again to Christina I can't recall her last ble-check that.
17 18 19	THE COURT: During the break, I will try to contact bot	Right, okay. Well, don't you worry about that. th of them and see what is happening, okay.
20 21 22	MR. TROFIMUK: to do so.	And if you need me to re-send, I will be happy
23 24	THE COURT:	Okay.
25 26 27 28	Because I do not have the witness list, I do not know what you had proposed for today. I have read all of your pretrial briefs. Did you intend to make opening statements to supplement those briefs, or were you just going to get into calling witnesses?	
29 30 31	MR. PARKER: mind, and just run through what we had a	So let me, I'll jump in, if my colleagues don't agreed to.
32 33 34	So we had written on what we had so Romaine directs.	ent to you brief opening statements, if Justice
35 36	THE COURT:	Okay.
37 38 39 40 41	Rule 8.10 by analogy to these proceeding	And we had had some discussions with my directed, today. Our preference would be to apply ags those are the trial rules and recognizing in, and we are here for cross-examination. tomorrow morning.

Then we were moving to Mr. Redman, and he will be cross-examined.

3 4

The witness, the third witness for the applicants, Dr. Kirball, there is going to be no cross-examination of him.

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And then we move into Friday afternoon, our witnesses, the respondent's witnesses, starting with Scott Long. One of the five applicants, Ms. Ingram, has objected to him being qualified, and so there will be argument about his qualifications; and if he is accepted, then there will be cross-examination.

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Our request -- and our friends disagree with it -- is that we make our opening statement when all our cross-examination of the applicant's witnesses is done. So that would be tomorrow before Mr. Long takes the stand.

14 15

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16 THE COURT: Okay.

Mr. Grey, Mr. Rath?

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20 MR. RATH:

It was our intention today, My Lady, to make a brief opening statement. I believe it was Mr. Leighton's intention as well. I think the joint position of all of the applicants that Alberta should provide its opening statement this morning, and not after having had the benefit of being able to tailor their opening remarks to the evidence of Dr. Bhattacharya and Mr. Redman and Mr. Long, but we're in the Court's hands on that.

25 26 27

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And as well, what we're adding, I have a brief housekeeping matter, and it has to do with the pretrial reply factum of the applicant. So in preparing for this proceedings today, (INDISCERNIBLE) filed --

29 30

31 THE COURT: I am sorry, Mr. Rath. When your head goes

down, I cannot hear you.

32 33

> MR. RATH: 34

And I'll endeavour to speak more loudly as well,

35 Madam Justice.

36

37 So there's a housekeeping matter involving our pretrial reply factum, and specifically, from the records of our office, we determined that the matter was, it was sent in for filing, 38 it was served on all of my friends, but we never received a filed copy of it back from the 39 40 Court. So I was concerned as to whether or not it made it to your file or not. And so if 41 you can take a look at some point in a break later today and let us know if you haven't

1 2 3	received a copy of it, we would provide you a copy of the filed copy that was returned to our office.	
4	THE COURT:	I believe that I
5 6 7	— · — · — · — · — · — · — · · — · · · ·	Or, sorry, a copy of the document, not the filed ent, but we never received a filed copy back from
8 9	the clerk.	
10 11 12	THE COURT: seen it, okay.	I will check that, Mr. Rath. I think that I have
13 14 15 16 17	With respect to the opening statements, I normally give counsel a choice of whether they want to make their opening statement at the same time the respondent counsel if they want to make their opening statement at the same time as the plaintiff's, or when they open their case.	
18 19	So since Mr. Parker would like to defer	until he opens his case, I am fine with that.
20 21 22 23 24 25 26	With respect to, I think Mr. Parker, you also mentioned something that we will have to deal with, and that is Mr. Leighton and Mr. Rath's application with respect to Mr. Pickford. I have received, of course, letters of they are in the nature of briefs from all three parties on this. Is this a matter that you all would like to make oral argument on, or do you want me to make a decision on the basis of the written documents that you have provided me?	
27 28 29	MR. PARKER: have you make a decision on the written	From the respondent's position, we're fine to a submissions.
30 31	THE COURT:	Okay.
32 33	Mr. Grey? Mr. Rath?	
34 35 36 37	MR. GREY: content, I agree with Mr. Parker, that we written materials that have been submitted.	Madam Justice, it's Leighton Grey here. I am we can have you make a decision based upon the ted.
38 39	THE COURT:	Okay.
40 41	MR. RATH:	I concur with my friends, Madam Justice.

THE COURT: Okay. I will try to do that, if not by tomorrow, 2

by Monday I will give you my decision on that.

3 4

1

Okay. So I think -- is there anything else of a housekeeping nature?

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MR. GREY: Madam Justice, it's Leighton Grey here. With respect to Dr. Bhattacharya, who will be cross-examined at some point today and tomorrow, as Mr. Parker said, I just want to clarify -- and I seek some direction from the Court in this regard -- in the witness list, and the schedule that you have not seen, there was contemplation of qualification of the witnesses. This is something that we had corresponded with the Alberta lawyers about, but I want to be clear about this, because I expect you have read, for example, Dr. Bhattacharya's case, his first affidavit, which was filed in January of last year, is an 18-paragraph submission which goes into replete detail of his qualifications and so on, and attaches his report. I would think that -- and again, I seek direction in this regard -- it would be somewhat redundant to go through all of that. As you have said, you have read it.

16 17 18

So I guess I just want some clarification on that point.

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Secondly, I think, I hope all counsel can agree that unfortunately due to the adjournment that occurred last September, some of the evidence is a little bit dated. Dr. Bhattacharya's case, his first affidavit was filed more than a year ago. His most recent one was filed last August. I think in fairness to each of the witnesses, it might be useful to give all of them an opportunity to update their opinion, especially given the reality that we all know, and that is that COVID-19 and the pandemic is a developing situation, in constant flux, and that many of the things that were attested to in the affidavits, or deposed to in the affidavits, perhaps are no longer applicable or need to be modified.

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So what I would like to do is, I would like to seek the position of the Alberta counsel with respect to that, and it certainly would guide me in terms of my, whatever brief questioning I do do of Dr. Bhattacharya today. But I think it would be fair and useful for all the witnesses to be given this opportunity to perhaps provide a brief update of their evidence.

32 33 34

But I seek your direction in relation to those two matters.

35

37

36 THE COURT: Okay. Let us talk about the qualifications first.

I understand that, Mr. Parker, that the defendants do not contest the doctor's qualifications; is that correct?

38 39

40 MR. PARKER: That's right. But the reason I brought it up to

Mr. Grey last year was I had the pleasure of watching the *Gateway* proceedings in 41

Manitoba, and Chief Justice Joyal. Same situation, all parties had agreed, no objections. 1

2 3

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5

But there was a fairly lengthy cross-examination of Dr. Bhattacharya and his qualifications, and it went to weight. And during the proceedings, Chief Justice Joyal asked about the area of expertise and indicated he might want to know something about what it is proposed to be, because obviously he has to consider issues of weight.

6 7 8

And so it was in that context that I raised it with my friends and suggested it's something that we could discuss with you, whether it would be beneficial or not with you.

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My proposal for the majority of my witnesses would be very brief, if anything. I mean, we are putting up Dr. Kindrachuk on Monday. He is a virologist, and I don't think there is a whole lot of qualifications to get into, meaning his expertise is virology, and we feel his evidence is squarely within that expertise. But that's the reason I raised it is that there will be cross-examination that goes to weight in terms of the area of expertise, particularly of Dr. Bhattacharya.

16 17 18

The second point I can address now, or after you have resolved this issue.

19 20

21

THE COURT:

Okay. Let us talk about this issue.

22 From what I hear you saying, Mr. Parker, Mr. Grey would present the doctor and propose an area of expertise, and you would not object to him being qualified. You may have 23 objections with respect to the area of expertise, do I take it, or the scope of his expertise? 24

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I'm -- no, it's not my intent to object to MR. PARKER: expertise, it's simply to argue that it's going to go to weight. And it simply, would the Court benefit from having an idea what Dr. Bhattacharya says his area of expertise is? If not, I'm fine, as I say. We've not taken any objection with any of the evidence going in in terms of expertise, but that doesn't mean we're not going to argue weight, and particularly, with Dr. Bhattacharya.

31 32 33

34

THE COURT:

Okay. So it seems to me that the qualification stage will be relatively quick, and then we will get into, Mr. Grey will get right into his -well, whatever you need to do to set up the cross-examination of the doctor, Mr. Grey.

35 36 37

And then it will be a matter of cross-examination with respect to his qualifications after he has qualified, relating to the matter of weight. Is that clear?

38 39

41

40 MR. GREY: It does -- sorry, it's Leighton Grey here, Madam

Justice -- I guess it does not necessarily clarify for me what areas I would need to cover,

1 because as I say, I really could not add to anything that's in the 18-paragraph affidavit. Particularly, paragraph 18 of that affidavit specifically states the specific scope of his 2 3 opinion, and the previous paragraphs go into great detail about his qualifications.

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So I guess what I'm saying, very bluntly, is I don't want to waste the Court's time going through the affidavit that you can clearly read. And I don't think I can add anything to what's already in the affidavit. So that's my only concern, I don't want to engage the Court in a redundant exercise.

8 9

THE COURT: 10 No, I understand.

11 12

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So it seems to me that you would introduce the doctor. You would ask that he be qualified, and give the area of expertise you want him qualified to give opinion evidence on. Mr. Parker will not object. He will be qualified, and then he will go into the cross-examination.

15 16

17 MR. GREY: All right. That clarifies it for me, thank you.

18

19 MR. RATH: And, Madam Justice, this is Mr. Rath. Again, 20 our feels is that with Mr. Redman, the matter will be very straightforward as well. I think his qualifications with regard to emergency management in Alberta speak for themselves. 21

22 23

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But again, echoing what Mr. Leighton Grey was saying, as part of the qualification process, you know, given sort of the inherent unfairness of the witnesses providing affidavit evidence that was current up to September, you know, prior to the adjournment, I'm going to ask him as part of the qualification process, to comment on any matters within his expertise that he's observed in last months between his last evidence and tomorrow that would be of assistance to the Court in the context of his expertise in his opinion as an expert.

29 30

31 THE COURT: Okay, thank you, Mr. Rath.

32

33 MR. RATH: And we will (INDISCERNIBLE) Mr. Parker for

34 cross-examination.

35

36 Okay. THE COURT:

37 38

So, Mr. Parker, what do you say about this proposal?

39

40 MR. PARKER: It's something that the respondents strenuously

object to, Justice Romaine. We had the benefit of the case management of Madam 41

Justice Kirker over a good portion of the last year, and paraphrasing, she had told us that she wanted us to take a tight package to the Court in terms of what was being tried -- as in, which CMOH orders -- Chief Medical Officer of Health orders -- were impugned, and for what time period.

It is our understanding, after the process we've gone through, that we are dealing with specific orders from the second and third wave, and we presented evidence to justify, if necessary, those orders. And so the second wave from the fall of 2020 into the early part of 2021; and then the third wave, which started in the spring of 2021 and ran through until basically -- we cut off our evidence because it had to be filed on July 12th, our rebuttal evidence, and we were able to cut it off on June 30th. That made sense, because that was the date that the Alberta put in place its open for summer plan, and so again, we were dealing (INDISCERNIBLE) with the orders from the second wave and the third wave.

I've spoken to a number of people, include witnesses about, well, what about questions outside of the second and third wave, are they relevant? And the answer is perhaps, it will depend on the context. There are certain issues that have arisen since then that may appropriately shine light on what could be expected during the second and third wave.

But if we're now up dating evidence at that point to talk about COVID and all the issues that are involved when we talk about COVID post-June 30th, we're into an area that we shouldn't be into, because the orders in question that are impugned are not from that period. And so my position would be that while there may be relevant questions that go outside that period -- and certainly go back into the first wave -- what is being proposed is not appropriate and not acceptable to Alberta, and we would strenuously voice that opposition. Thank you.

28 THE COURT:
Okay, thank you.
29
30 Mr. -31
32 MR. GREY:
Justice, if I can?

THE COURT:

-- Grey? Yes, Mr. Grey, when you talk about updating matters, are you talking about adding impugned orders, or just talking about what the, what the scientific evidence has shown more recently than the time that the expert reports were completed?

39 MR. GREY: It's the latter, Madam Justice.

41 THE COURT: Okay.

2 MR. GREY:

And I appreciate Mr. Parker's point; however,

it's important to note that some of the restrictions that are impugned in this case are ones that were revised and were re-vilified and reinstated by the Province. We are talking about, for example, capacity restrictions and restrictions on worship, and we talk about masking.

So what we're really talking about is an update of scientific information, which we submit is relevant and would put the Court in the best position to assess the science, because that's really the crux of the matter here is the Court is being asked to assess the various scientific opinions and how they relate to the propriety of the order, and whether or not they violate the *Charter*, and certainly whether they meet the test under Section 1 of the *Charter*.

So I'm not, the position is not that we're going to go into a full canvassing of subsequent restrictions, but I would submit that in fairness to the witnesses, as I said, the science is constantly changing, and I just think in fairness to all of them -- and I would say the same thing to the respondent experts, Dr. Kindrachuk, Dr. Hinshaw, and others -- that they would be given the same opportunity.

And that's the essence of the position.

23 MR. RATH:

And if I may, I'm quite concerned by something

that I heard from my friend, Mr. Parker, where he indicated that only orders up to July are at issue here. The procedural orders issued by Madam Justice Kirker that resulted in an amended originating application being filed on February 8th, 2022, clearly states at page 5 --

UNIDENTIFIED SPEAKER:

You said 2022, Mr. Rath?

31 MR. RATH:

Oh, I'm sorry, February of 2021, sorry -- clearly

states: (as read)

A declaration --

And that was, there seemed to be an error from the (INDISCERNIBLE) on that document that was filed February 28th, 2022 (sic), is the document that I have. But in any event, the document pursuant to Madam Justice Kirker's order clearly states: (as read)

A declaration that the CMOH orders (INDISCERNIBLE) March 2020, regarding business restrictions imposed due to COVID-19 are ultra

1 vires, Section 29 of the *Public Health Act*, and of no force and effect. 2 3 So all of the issues that have been issued by the Chief Medical Officer of Health that 4 restrict business activities in the province are impugned in these proceedings and are applied before the Court. 5 7 So I don't agree with my friend's submission that somehow there's this cut-off date with regard to these (INDISCERNIBLE). (INDISCERNIBLE) constantly shifting and 8 9 constantly changing to the detriment of our client. 10 11 THE COURT: Okay. 12 13 I would like to -- thank you, Mr. Rath, and let me put that --14 15 MR. PARKER: May I comment, Justice Romaine? 16 17 Of course, go ahead. THE COURT: 18 19 MR. PARKER: Thank you very much. 20 21 Mr. Grey is talking about the evidence constantly evolving and changing, and he's 22 absolutely right. That has been a theme of the pandemic and a theme of the evidence. What will be before you is what those dealing with this pandemic have had to deal with 23 on the scientific and medical side. 24 25 26 But that new evidence wasn't available to the people who made the decisions during the 27 third and second wave, which is why it's not relevant. And so I think that should be pretty 28 clear. 29 30 I didn't catch everything that my friend, Mr. Rath, said, unfortunately. There was a lot of 31 feedback there. I think he might be saying that they are seeking to impugn all the orders going forward, past June 30th, 2021, or ordering similar to the ones that they have already 32 impugned. And if that's the case, again, we would suggest that that approach is not 33 34 appropriate here, simply because we haven't put in evidence to justify that period of time, because we didn't understand they were impugned. And we don't think the Court should 35 36 be looking to give declarations about what can be done in the future. We're looking at 37 these orders made at these times, the second and third wave. 38 39 So those are my submissions in response. Thank you.

Thank you.

40 41

THE COURT:

1 2	MR. RATH:	We're not asking, Madam Justice
3 4 5	THE COURT:	Mr. Rath?
6 7	MR. RATH: talking	with regard to orders in the future. We're
8 9 10	THE COURT: moment.	No, but Mr. Rath, can you just hold on a
11 12 13	MR. RATH:	Certainly.
14 15 16 17	THE COURT: scientific evidence that was not availab directions and orders, I think that there is	Mr. Grey, if you are proposing that the new le to the defendants at the time they made their a relevance issue with respect to that.
18 19	Is that what you have been subjecting?	
20 21 22 23 24 25	that the authors of the opinion, of the ex	No. I was saying that I would think that the ence before it. And so what I was suggesting is apert evidence, could be given the opportunity to uld be for the sake of accuracy. So that's my
26 27 28 29 30	don't quite appreciate this idea that we s	nd getting the best evidence before the Court, I hould put science in a box here, as Mr. Parker is the best evidence before the Court. And I don't nt either, given what we're talking about.
31 32 33 34 35	<u>*</u>	Well, it seems to me that the, whether or not the he scope of the knowledge of the decision-maker and for that reason, hindsight is not particularly
36 37 38 39 40 41	that would be fine, I think, if they are m opportunity to corroborate their opinion	expert the opportunity to modify their opinion, odifying their opinion. But giving the expert the on the basis of medical evidence that was not in de the decision is something else. And I have to eirrelevant.

1	But 1f	
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3	MR. GREY:	Oh, I understand that clearly.
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5	THE COURT:	Okay.
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7	MR. GREY:	I appreciate the Court's point
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9	THE COURT:	Okay.

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Now, with respect to whether the impugned orders could be expanded to orders that have happened as recently as today or yesterday, I had problems understanding Mr. Rath as well. I am sorry, Mr. Rath, you went in and out. I thought that I heard you say that that was supported by a direction of Justice Kirker, as case management Judge? Is that what you were saying?

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17 MR. RATH: That's correct, My Lady. And what happened was there's a procedural order that was granted by Justice Kirker, and she directed an amendment to our originating notice of application.

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Now, when I said it was filed on February 8th, 2022, that, in fact, was the correct date. In preparing for trial, we noted that the application, the amending originating application had been prepared as directed, and submitted for filing, and hadn't been filed . So to clarify the Court record and to make sure that was on the Court record, per the order of Madam Justice Kirker, it was submitted again, it was filed on February 8th, 2022. So it should be on the Court file.

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And one paragraph in that order, or one paragraph of that originating application, as directed by Madam Justice Kirker, is found at the top of page 5, and it's paragraph 10.1, and it states that: (as read)

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We are seeking a declaration that the CMOH orders issued since March 2020 regarding business restrictions imposed due to COVID-19 are ultra vires, Section 29 of the *Public Health Act*, and are of no force and effect.

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The reason that that was included is for the very reason that we find ourselves then moving forward to this proceeding, and that is that these orders are being constantly changed and constantly amended. Restrictions are brought in, restrictions are taken out, and the state of play with regard to the matters before the Court is constantly shifting.

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So with regard to this proceeding, and the orders that are being granted, we are taking the

position that all of the orders up to the date of this proceeding are at issue on the basis of all of the facts and the law that we will be submitting to the Court. Because certainly you can't make a jurisdictional order with regard to the previous orders that wouldn't apply to the orders that are in effect today, in any event, and we'll get into that in our opening remarks, with reference to the purpose of Section 29 of the *Public Health Act* and the degree to which all of these orders exceed the jurisdiction of the Chief Medical Officer of Health under that *Act*, as well as the extent to which the jurisdiction of the Chief Medical Officer of Health offends all the various (INDISCERNIBLE) of the *Charter*, and has not complied with the test in *R v. Oaks*, which we'll take you through this morning.

THE COURT:

Mr. Parker, does that clarify matters for you?

But what I hear is that there was a procedural order from Justice Kirker, or is this just --

15 MR. PARKER:

Justice Kirker, I think. I believe he's referring to

an order of April 3rd of Justice Kirker, filed June 22nd, if I'm not incorrect.

18 MS. LECLAIR:

April 30th of Justice Kirker, April 30th of 2021.

20 THE COURT:

2021? Okay. And it indicates that it is

permissible to open the impugned provisions to include -- I have not, you know, I think we have to see this obviously

we have to see this obviously.

And then I also noted that Mr. Rath referred to, I gather it is amended pleadings, perhaps, dated February 8th, where he said in those pleadings that he was taking the position that all impugned orders were on the table. That is pretty late and close to this trial date.

Mr. Parker?

MR. PARKER: I think I can help you on that. What I understand has happened is, Justice, we argued about this, a decision came down that Justice Kirker rejected their proposed amendments -- or most of them -- struck out most of the parts of the pleading that we sought to have struck out, and they were supposed to, it took a while for us to amend, for a second time, the originating application to make it consistent with Justice Kirker's order. It was fairly complicated. And that order was filed on June 22nd, and I believe that it directed that they were supposed to file the amended amended originating application.

I believe what Mr. Rath has told us is they didn't, and they did a couple of days ago now,

just realizing that they hadn't done it. So that's what I understand there. No problem there

41 from us.

1 2 I'm not sure what he's saying that order allows him to do. If he's saying that it allows him to challenge (INDISCERNIBLE) in this hearing, argument and evidence and decision on 3 4 orders post-June 30th -- both the third wave -- we obviously disagree with that. 5 THE COURT: Okay. 7 MR. RATH: And, Madam Justice, I can take you to the exact 9 paragraph of the order that I'm referring to. 10 11 THE COURT: Okay, Mr. Rath. But this is something new, and 12 I do not think this is the time to argue it. So what I am going to ask the parties to do is to marshall their documents and let me know what I should be looking at. And perhaps 13 tomorrow afternoon, we can take a period of time and look at the issue, and I will make a 14 direction, okay? 15 16 17 MR. RATH: Thank you, Madam Justice. 18 19 THE COURT: Okay. 20 21 Is there anything else? 22 23 MR. PARKER: There are, unfortunately, Justice Romaine. We have a few housekeeping issues -- which may be related to the inability to get you some 24 25 emails over the last week or two. 26 27 THE COURT: Yes. 28 29 MR. PARKER: There was an issue of a consent order. All parties had agreed to the consent order. I don't want to go into what it's about, but we had 30 31 sent it with everybody's consent, and we haven't, I don't think we've heard back from your office, and we're waiting on that. 32 33 34 THE COURT: Yes. Can I just ask you to please send it again, because as I said, there have been periods of time where I have gotten no Court emails at 35 36 all. We they we have resolved that problem. It may not -- do not send it after 6:00 this evening, because everything will be frozen. But if you can send it some time today, I will 37 try to get it. Thank you. 38 39 40 MR. PARKER: Okay. We will send it to the same folks that we were communicating with this week. We think your assistant is away on holiday, your 41

1 2	regular assistant, I believe, so	
3 4	THE COURT:	She was just for one day. She is back, so
5 6	MR. PARKER:	Oh, okay. Thank you.
7 8	THE COURT:	Thank you.
9 10 11	MR. PARKER: you. I don't know if you want me to te can quickly run through that, or you can	I just have the rest of the schedule, we sent it to ll you who's coming up, what we've agreed to. I wait until it shows up on email.
12 13 14 15 16	THE COURT: because it is clear we are going to start Mr. Grey? Mr. Rath?	That is okay. I will look for it during a break, t with the plaintiff's expert witness; is that right,
17 18	MR. GREY:	I think there was the
19 20 21	THE COURT: statements.	Oh, we were going to start the opening
22 23	MR. GREY:	opening statements.
24 25	MR. RATH:	That's correct, Madam Justice.
26 27	THE COURT:	Okay.
28 29 30 31 32	, ,	And the only other pretrial or preliminary issue cuments. But I think we can do that as we move ou don't need to hear anything, my friends can go
33 34	THE COURT:	Okay. That is great. Thank you.
35 36	Who will start? Mr. Rath or Mr. Grey?	
37 38	MR. GREY:	I think Mr. Rath was going to go first.
39 40 41	MR. RATH: breach, My Lady, so thank you.	I believe I have the honour of being first into the

THE COURT: Okay.

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Opening Statement by Mr. Rath

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MR. RATH: So, My Lady, the first thing that I would like to suggest as we move forward with this matter -- and I know this Court always takes these matters seriously -- with regard to this issue -- or, you know, the issues before the Court -because all of these issues have been so fraught in the public square with regard to so many contradictory media accounts and reports being made, you know, over the course of the life of this litigation, what I would ask the Court to do is to please, as much as possible, keep a completely open mind with regard to all of the arguments that are being presented by all counsel in this case. And to please not rely on your recollection of any media reports with regard to this matter. Because I think (INDISCERNIBLE) pandemic, but this public health mismanagement crisis, there has been, you know, quite a bit of media and quite a bit of reporting that at the end of the day hasn't been supported by the facts -- either scientifically or otherwise.

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So the other thing that I would like to indicate at the outset is that it's very important for this Court, as this Court well knows, to keep the matters that are before this Court grounded in the law, and not in any of the (INDISCERNIBLE) any of the messaging, you know, with regard to the fear or terror that, you know, we will submit (INDISCERNIBLE), that the respondents have tried to induce in the public of Alberta with regard to how dangerous the novel coronavirus is to the public of Alberta.

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We are going to be presenting evidence (INDISCERNIBLE) to this Court is that what we are dealing with here in the context of all of the measures that we're asking --

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28 THE COURT:

Okay, I am sorry, Mr. Rath. I want to stop you, because -- and it does not seem to matter whether you are facing the camera or looking down, but from time to time we just lose a few words. I do not know whether you have got any help to sort of -- or maybe if you just move around a bit and get your microphone

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> 34 MR. RATH:

Okay. I have moved the microphone closer, My Of course, in typical fashion, with technology through this public health mismanagement crisis. It's always when it's most important that it seems to fail.

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38 THE COURT: Yes.

closer to you, that might help.

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40 MR. RATH: Any way, we will do the best we can.

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1 THE COURT: Okay, thank you.

3 MR. RATH: So -- and again, you know, with regard to, you know, our submissions in this regard, you know, we're again asking the Court to listen

know, our submissions in this regard, you know, we're again asking the Court to listen with an open mind to the submissions of counsel for the respondents -- or the applicants -- and counsel for the respondents -- but certainly to the applicants to the extent that the message in the evidence that we are going to be providing may run contrary to, you know, the overwhelming bulk of the messaging in the media and the public discourse. Because at the end of the day, all of the evidence that we're providing is verifiable, and it's here to Court, it's before you to consider and to be weighed appropriately in the context of these proceedings.

And of course, you know, the first thing that we would note, and that we will be asking the Court to focus on, from the standpoint of our assertion that what has been going on in Alberta hasn't been a public health crisis, but an emergency management, mismanagement crisis. We would like you to be able to listen with an open mind to the evidence and consider our submissions with regard to the fact that this so-called novel coronavirus is simply yet another respiratory illness that strikes our society from time to time. Not particularly or markedly different than a severe flu outbreak or a bad outbreak of a particularly virulent cold strain -- which at the end of the day is all the novel coronavirus is, is a particularly virulent cold strain -- that unfortunately has the effect of targeting and harming particularly senior citizens that have numerous preexisting comorbidities, or in other words, diseases that they are already dying from.

So, you know, it has the greatest effect on, you know, the weakest and the most vulnerable of our society, but the evidence that we are going to be asking you to consider in the context of the *Oaks* analysis, and in the context of what we will be referring to as the broad governmental overreach of the Chief Medical Officer of Health, outside of the scope of her authority under the *Public Health Act* under Section 29 is the degree to which this novel coronavirus has very little adverse effect on people under the age of 60, who are otherwise perfectly healthy. In other words, people that are often referred to as the "working well," as opposed to, you know, senior citizens who are in the midst of already dying from three or four other severe comorbidities.

And of course, you know, we see that in all of the measures that have been undertaken, you know, we would say against our society and have been disrupting our society and harming our society. The measures, the evidence that we want you to consider is the fact that these broad sweeping public health measures that have been imposed -- and we say without jurisdiction -- on society, in fact, are causing more harm to the bulk of our society than good, and that needed to be taken into account, and needs to be taken into account in the context of an *Oaks* analysis.

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We will be presenting evidence and asking the Court to consider evidence that the public health measures themselves have been more harmful to children, more harmful to adolescents, more harmful to young adults, and more harmful to the working well than the disease -- than the coronavirus itself. In fact, we will be showing you information that indicates that suicide rates, deaths by drug overdoses, and all of the other societal ills, the psychological harms that have been imposed upon our children by masking requirements and all these other things far outweigh any real risk to them from the coronavirus itself.

The evidence is clear that children do not die from coronavirus -- in fact, they are more likely to die from a flu, the regular flu or a regular cold, than they are from this disease. Yet their lives have been completely destroyed for the last two years by what we consider to be the gross overreach of the Chief Medical Officer of Health outside the scope of her jurisdiction under Section 29 of the *Public Health Act*.

Now, I'd like to take you to that directly, and I'm just going to sort of highlight (INDISCERNIBLE) reference, pinpointed from our pretrial factum of the applicant -- because this is the source of the (INDISCERNIBLE) or the references that I'm taking you to. And I would like to start with page 10 of, on page 10 of that factum, the section that we refer to as, Are the CMOH Orders Ultra Vires for the Purpose of the *Public Health Act*?

It is the strong submission of Rebecca Ingram, whose evidence indicates that her life and livelihood have been completely destroyed by the orders of the Chief Medical Officer of Health. It is her submission that these orders that have destroyed her life completely fall outside of the scope of Section 29 of the *Public Health Act*.

And what we would like you to consider in Section 29 of the *Public Health Act*, from a statutory interpretation provision, that statute clearly sets out from limits what the Chief Medical Officer of Health may be permitted to do by way of Chief Medical Officer of Health order. Her jurisdiction and her power is tightly constrained, and cannot be read from that statute to give her the powers of absolute medical dictatorship over the democratically, over the constitutionally protected rights of the citizens of Alberta.

And I'm referring now to Section 29(2)(b)(ii), and it sets out what she can do by order: (as read)

Prohibit a person from attending a school

Prohibit a person from engaging in the person's occupation; or

Prohibit a person from having contact with other persons or class of person.

And then going on: (as read)

For any period, and subject to any conditions, that the Chief Medical Officer of Health considers appropriate, where the Chief Medical Officer of Health determines that the persons engaging in that activity could transmit an infectious agent.

So what we would submit with regards to that very clear statutory language is contrary to the broad sweeping powers that the Chief Medical Officer of Health has taken upon herself, her powers are very tightly prescribed by that statute.

And again, we would submit, or we do submit as a matter of law in an argument, that that provision is the equivalent of what I would refer to as a Typhoid Mary provision. So if we have a person in society that the Chief Medical Officer of Health knows is infected with an infectious agent, the Chief Medical Officer of Health -- and that person, you know, is not quarantining themselves, and is behaving in an irrational or unreasonable manner by running around society infecting others once they know they're infected, the Chief Medical Officer of Health has those powers to order that person to not attend a school, to order that person to not engage in their occupation. To prohibit that person from having contact from other persons. And again, that's where the Chief Medical Officer of Health determines that the person engaging in that activity could transmit an infectious agent.

Never before in the history of Alberta has a power been, in a post-*Charter* era, or a post-Bill of Rights era, has a power of the Chief Medical Officer of Health been interpreted to allow the entire population of the province to be locked down and subjected to broad sweeping measures under the guise of a Chief Medical Officer of Health order.

And again, from the standpoint of statutory interpretation, when we look at what the Chief Medical Officer of Health has done to interfere in the conduct of small business in this province, to shut down my client's gym, and to shut down her business, let's look at what the actual powers of the Chief Medical Officer of Health are, under, you know, under Section 30 of the *Public Health Act*.

(as read)

Entry for examination --

And that's found at the bottom of page 12 of our factum, Madam Justice: (as read) 1 2 3 Entry for examination: 4 5 Where a medical officer of health knows or has reason to believe that a person suffering from a communicable disease referred to 6 in Section 20 may be found in any place, or that any place may be 7 8 contaminated with such a communicable disease, the medical 9 officer of health may enter that place without a warrant for the purpose of conducting an examination to determine the existence 10 of an communicable disease. 11 12 13 Where a medical officer of health is conducting an examination pursuant to (1), the medical officer of health may: 14 15 16 Order the detention of any person; 17 Order the closure of the place, including any business that 18 19 is carried on in it. 20 21 Until the medical officer of health has completed the investigation, but for a period not more than 24 hours. 22 23 24 So not for 90 days at a time, not years at a time, 24 hours. 25 26 And then (3) of that statute: (as read) 27 28 When the medical officer of health is not able to complete the investigation within 24 hours, the medical officer of health may 29 30 make an application to a Judge of the Provincial Court for an 31 order to extend the period of detention or closure under (2) for an additional period of not more than 7 days, and the Judge may 32 make the order accordingly. 33 35

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So what we see in that statute is the powers of the Chief Medical Officer of Health are tightly subscribed, they are tightly limited, and they do not extend to the breath-taking breadth and scope of these orders that have been granted recklessly in Edmonton, going on for almost two years now.

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The other thing that we would note in the context of a proper interpretation of Section 29, in Section 29(4), the statute says: (as read)

Jurisdiction of a medical officer of health extends to any person who is known or suspected to be --

And this is the bottom of page 11, My Lady: (as read)

Infected with a communicable disease, illness, or health condition;

A carrier;

A contact susceptible to and at risk of contact with a communicable disease, illness, or health condition;

Or exposed to a chemical agent or radioactive material.

Again, this is all tightly subscribed, and it has to be (INDISCERNIBLE) specific reference to a specific individual. It does not, the statute and these sections do not grant the Chief Medical Officer of Health the broad and breath-taking powers that have been assumed by her since the onset of this public health mismanagement crisis that we have found ourselves in for the last, you know, for the last two years.

So I would like you to keep that firmly in mind in the context of the evidence that you're hearing, as we move through, you know, as we move through the justification test.

 Clearly our client, Ms. Ingram, has submitted in her originating application that her rights under the *Charter* have been infringed, her rights to assembly, her rights to secure liberty and security of the person, her equality rights, you know, have all been infringed. And we say that the Court of Alberta had the onus under the *Oaks* test to justify these infringements and those orders, in any event, prior to the orders being promulgated.

And what we're going to ask you to consider as the evidence unfolds in front of you, and as you have all of the evidence that's already been submitted, you know, ask yourself to what degree the government has presented any evidence of any cost-benefit analysis having been done in advance of any of these orders having been granted?

You know, all of the orders say, in effect, is that the Chief Medical Officer of Health has determined that there is a novel coronavirus in Alberta, and that the disease is infectious, therefore -- you know, and transmissible -- therefore, she is issues all of these orders.

Well, that doesn't meet the test under R v. Oaks. And we'll be seeing from the evidence of

Mr. Redman, the former director of emergency management for the Province of Alberta, we had in Alberta an influenza pandemic response plan that was in place that had very carefully thought-out measures and mechanisms that were very carefully developed and considered within this province to ensure that with regard to any pandemic response involving infectious respiratory virus, that there would be a very structured and careful approach that was implemented in order to protect the *Charter Rights* of the citizens of Alberta, as well as protecting all areas of the Alberta economy.

And of course, the evidence that we say, and in this we say also included the need to conduct a cost-benefit analysis at the outset in terms of impact the measures were going to have on society, as well as, you know, considering what the, what other mechanisms were available to ensure that the rights and interests of society as a whole were infringed or impacted as little as possible in the conduct of the pandemic, a pandemic response.

It will be our position, and what we want you to consider carefully as you hear the evidence, is the degree to which that entire plan was chucked out the window, and the degree to which that instead of taking an approach that protected the rights and interests of society as a whole, that the overwhelming response of the Chief Medical Officer of Health, and the overwhelming response of the Government of Alberta, has been focussed on really one thing and one thing only, and that is the protection of our health care system, at the expense of everybody else in the province.

From the outset -- and this is set out in our pretrial reply factum that I hope you have, but if not, we'll send to you later in the day -- but from our perspective, what has been going on from the outset is that this focus on protecting the health care system did not take into account the needs of the rest of society, including, you know, the education system, including the infrastructure systems, including the *Charter Rights* of the citizens of this province, all of which should have been considered.

And what we will also submit and show on the evidence, that there is no evidence provided by the Court that any appropriate steps were taken to create additional surge capacity for (INDISCERNIBLE) system (INDISCERNIBLE). Which is something that could have gone a long way towards mitigating these impacts.

In April of 2020, Premier Kenney announced publically that as many as 1,100 ICU beds could be created in this province to deal with the pandemic. This was never done. And in fact, the evidence will demonstrate that over the course of the pandemic, ICU beds have actually decreased rather than increased in the province of Alberta. Yet the availability of ICU beds, and the availability of hospital beds is what's being used as the excuse to enact new measures -- or as recently as the day before yesterday, we heard from the premier that hospital capacity is going to be the one metric that will determine whether or not

restrictive measures are re-imposed on the province.

All of this is contrary to the pandemic response plan that Mr. David Redman will be speaking to.

In that regard, the pandemic response plan was very clear that, they refer to it as NPIs, but non-pharmaceutical interventions, you know, such as lockdowns and otherwise, need to be very tightly circumscribed. One of the reasons is that in certain instances -- specifically respiratory viruses -- they simply don't work because of the large degree of transmissibility of the virus. This was recognized in the influenza pandemic response plan.

So the focus of that plan was limited largely to, you know, promoting hand sanitization and various other, very limited, you know, very limited interventions. Because it was recognized early on that unlike diseases like Ebola, which are not widely transmissible, but cause huge amounts of mortality, that some of these other measures such as lockdowns and contact tracings and so on, you know, may in fact work. But the concern being, it was recognized by the influenza pandemic response plan is that those measures simply do not work with highly infectious respiratory illnesses. And we submit never should have been applied throughout the course of this public health mismanagement crisis that we've been living through.

So in that regard -- and I'll quickly wrap up and turn it over to my friend, Mr. Leighton (sic) -- but the obligation of this Court in this case -- and this is set out as page 22 of our brief, at paragraph 124 -- is for the Court to carefully listen and weigh the evidence that's provided by the Government of Alberta, and weigh it in the context of the *Oaks* test with regard to Section 1 of the *Charter of Rights and Freedoms*.

So (INDISCERNIBLE) *Oaks* test can be summarized as having four parts that must be satisfied by a law so that it can qualify as being a reasonable limit that can be demonstrably justified in a free and democratic society. And let's be very clear here: The onus and burden of demonstrable justification lays on the Crown. It's not, it's not for the applicants to show that somehow or other that the government hasn't met the burden. It's for the government to prove that it has met the burden.

And we would ask you, you know, in considering this in the context of these measures that have been applied that the government's evidence needs to be looked at with a very high degree of skepticism. It firstly has to show that there is an important objective that is sufficiently important to justify infringing a *Charter* right. That needs to be considered in the context, again, of the influenza pandemic response plan, and the fact that that was completely ignored in the context of what's been going on.

 That there must be a rational connection. That the law must be rationally connected to the objective. And again, you know, we would ask you to consider that in the context of the recent vaccine mandates that have now been rescinded, where it's clear that the scientific evidence is that the -- and this is evidence that will be provided by Dr. Bhattacharya, or is provided by Dr. Bhattacharya -- that where the double-vaccinated are as equally capable of transmitting the virus as the unvaccinated, there is no rational connection between vaccine mandates, there's no rational, and any public health objective.

If the double-vaccinated are just as capable of transmitting COVID as the unvaccinated, none of the discriminatory measures that have been imposed on the unvaccinated are rational or make the least bit of sense in the context of the *Oaks* test, and the government has the burden of trying, of explaining to this Court why they do.

The other point that needs to be taken into account is that the least-drastic means must be used, and that the law must (INDISCERNIBLE) their right no more than is necessary to accomplish the objective. So in that regard, that also includes the consideration of other alternatives to the measures, and one of the things that we say that the government has failed to explain is why it is throughout this public health mismanagement crisis that they have not made or promoted outpatient treatment of people infected with COVID, and why their policy throughout has been simply to tell people that test positive or are infected to go home until they can't breathe, and then once the disease has progressed to the point where they're in respiratory distress, only then proceed to hospital.

Certainly throughout the pandemic numerous outpatient treatments have been available -- all of that will be discussed with Dr. Hinshaw on cross-examination -- because numerous reports, studies, and documents have been provided to her throughout. Well, not only have outpatient treatments not been provided, they have been suppressed by this government and suppressed by Dr. Hinshaw in what we see as an (INDISCERNIBLE) keep people living in terror so that vaccines can be promoted at the expense of all other measures, while these lockdowns are promoted and kept in place.

And then finally, the proportionate effect, the law must not have a disproportionately severe effect on the person to whom it applies. Well, these orders from the outset -- and especially when you look at somebody like Ms. Ingram -- have had a disproportionate effect. Her business has been shut down. Her ability to take care of her children has been completely decimated by these orders. There's no factual reason for the steps that were taken vis-à-vis Ms. Ingram specifically -- and gyms and fitness facilities specifically -- in any of these orders. And that's all set out in our briefs and materials, which we understand that you have read.

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2	So what, you know, we would urge you to do throughout this proceeding is keep an open	
3	mind with regard to the submissions of the applicants. So keep both the very limited	
4	nature of the authority under Section 29 of the Public Health Act firmly in mind, and to	
5	keep in mind the very high burden that is placed on the government in terms of justifying	
6	its gross mismanagement of public health in Alberta throughout this pandemic in the	
7	context of the Oaks test.	
8		
9	Those are our submissions, and thank you for listening. I will turn it over to my learned	
0	friend, Mr. Leighton.	
11		
12	THE COURT: Thank you.	
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14	We are at 11:21. I think it is probably an appropriate time to take a 15-minute morning	
15	break. Thank you.	
l6 l7	(ADJOURNMENT)	
18	(ADJOURNMENT)	
19	THE COURT: Okay, thank you.	
20	THE COURT.	
21	Mr. Grey, are you ready to give us your opening statement? Perhaps not quite yet.	
22		
23	MR. RATH: Madam Justice, while we're waiting, were you	
24	able to determine whether our pretrial reply factum was on the Court record or not?	
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26	THE COURT: I have a couple of places to check, Mr. Rath,	
27	and while we are waiting, I will see what I can do.	
28		
29	Okay. I had thought that I had seen it, but I cannot locate, and when I was upstairs, I	
30	checked my computer to see whether or not it had come in, and I cannot see any evidence.	
31		
32	So please, if you would	
33 34	MR. RATH: We'll simply provide it to you if there's no	
35	MR. RATH: We'll simply provide it to you if there's no objections from my friends who have a copy of it we will simply provide it to you at	
36	lunch, Madam Justice.	
37	fullen, Madam Justice.	
38	THE COURT: Okay, thank you.	
39	Till 2 2 2 11 1.	
10	Mr. Grey, you do not have Mr. Grey on the screen?	
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MR. GREY: I'm here. 1 2 3 THE COURT: Oh, okay. 4 5 MR. RATH: He's on our screens, Madam Justice. I can see 6 him. 7 Oh, okay. 8 THE COURT: 9 10 Any time you want to start, Mr. Grey, with your opening statement. 11 12 MR. GREY: Thank you, Madam Justice. 13 **Opening Statement by Mr. Grey** 14 15 16 MR. GREY: I listened carefully to Mr. Rath, and I'm going to do my best not to cover ground that he has already. Obviously the issues that are being 17 18 brought, or that have been brought before the Court, there's a lot of concurrence between 19 the applicants. 20 21 I'm going to begin by prefacing with a quotation from Lord Jonathan Sumption, as a retired Justice of the Supreme Court of the United Kingdom. Recently he said this: (as 22 23 read)

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The biggest casualty of the lockdown will not be the closed pubs, restaurants and shops and the crippled airlines. It will not be our once-thriving musical, theatrical and sporting culture. It will not even be the wreckage of our economy. These are terrible things to behold. But the biggest casualty of all will be liberal democracy...

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Liberal democracy breaks down when frightened majorities demand mass coercion of their fellow citizens and call for our personal spaces to be invaded. These demands are invariably based on what people conceive to be the public good. They all assert that deposition is in the public interest.

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A society in which oppressive control of every detail of our lives is unthinkable, except when it's thought to be a good idea.

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It is not free while the controls are in place. It is not free after they are lifted, because the new attitude will allow the same thing to happen again whenever there is enough public support -- and of course, we saw this happen in Alberta last summer.

1 2 Civil liberties are under attack in Alberta, throughout Canada, and worldwide. The basis 3 for Public Health Acts and infectious disease laws, limitations to constitutional rights 4 have been imposed through emergency orders by our Chief Medical Officer of Health, who is an unelected official, a bureaucrat who has become, under the *Public Health Act*, 5 the single most powerful person in the history of Alberta. 6 7 8 The Canadian Charter of Rights and Freedoms was written specifically to limit 9 government overreach, that's its purpose. In a declared state of emergency, it is even more important to uphold Charter Rights. 10 11 12 Whether the COVID-19 mandates and restrictions represent reasonable and necessary 13 limitations has yet to be seen, and is of course the substance of this application. That's the 14 position of the applicants --15 16 MR. RATH: Madam Justice, this is Mr. Rath. I really hate to interrupt my friend. I'm having a really hard time hearing him, and I don't know if it's 17 18 because his microphone is rubbing on his robes, or what the issue is, but it's very muffled 19 and blurry, and it sounds like he's in a wind tunnel at our end. 20 21 MR. PARKER: Same for us. 22 23 THE COURT: Okay. 24 25 Is anybody else -- oh, same for you? Is that Mr. Parker? Same for you? 26 27 MR. PARKER: It is, yes. We were, my colleague, Mr. Trofimuk, was wondering if it was the courtroom microphone, but I'm not so sure 28 29 now. 30 31 THE COURT: Okay. 32 33 MR. GREY: Yes. 34 35 THE COURT: We can hear Mr. Grey perfectly, so I don't 36 know, Mr. Grey, if you can maybe adjust your microphone, maybe that will help. 37 I've got a headset on. I have a different headset 38 MR. GREY: I could switch to. Are you still having problems hearing me, gentlemen, or... 39 40 41 MR. PARKER: It's fine right now, but I have a strong --

1	MD DATH	To 1	
2	MR. RATH:	It's better than it was.	
3 4	THE COURT:	Olzav	
5	THE COURT.	Okay.	
6	MR. GREY:	All right, thank you.	
7	WIK. GILL I.	Till light, thank you.	
8	I was saving that the applicants have file	d evidence and produced independent scholars to	
9	, , , , , , , , , , , , , , , , , , , ,	and the severity of the pandemic. Reliance on	
10	•	atic modelling, in effect of non-pharmaceutical	
11		reatments, disregard for natural immunity, and a	
12	destructive for example on vaccines as a	-	
13	•		
14	After two years of fear, misinformat	tion, lockdowns, mandates, and broken trust,	
15	Albertans are waking up in disbelief and	d asking the government a question, and that is,	
16	What have you done to Alberta?		
17			
18	The answer is, in our submission, you have convinced and continue to attempt convincing		
19	1		
20	· · · · · · · · · · · · · · · · · · ·		
21	· · · · · · · · · · · · · · · · · · ·		
22			
23	putting those numbers into context.		
24	MR. RATH:	Madam Lystics same Mr. Cray I'm really	
2526			
27	-		
28			
29			
30			
31	my approgres, mit erey.		
32	MR. GREY:	That's okay.	
33		,	
34	Can everyone hear me now?		
35	·		
36	MR. PARKER:	I'm not sure I can hear Justice Romaine now.	
37			
38	MR. RATH:	Yes, I guess we can't hear you now. I guess the	
39	mike is off. Got it.		
40			
41	MR. GREY:	Okay.	

THE COURT: Okay. I will turn my mike off. We will see if that helps, and when I want to speak, I will, I will just motion to the clerk. So go ahead. MR. GREY: M-hm. I'm getting some rustling from Mr. Parker as well. I notice he's still got his mike on, but... MR. PARKER: I flip mine up and down. It should, when I do this, be silent. Okay, right on. Thanks. MR. GREY:

So I was saying, how serious are these cases? How many are asymptomatic? What would similar case numbers in any past years for other illnesses such as the flu? How does ICU occupancy compare to previous years? You are misleading the public and priming us for unwanted future restrictions.

Next, you have not been transparent about the favourable survival rates of COVID-19. Instead, you convinced us that a positive test result is a death sentence -- when, in reality, the virus overwhelming affects the elderly and those with specific vulnerabilities. COVID-19 remains relatively harmless for the majority of the population under the age of 60, especially children.

You've driven up case numbers by relying on the PCR test, deemed to be inappropriate as a diagnostic tool by its inventor and no one to yield too many false positives at the cycle thresholds that have been used. In fact, the World Health Organization -- or WHO -- recommended on June 25th of last year that widespread screening of asymptomatic individuals is not a recommended strategy. And yet you insisted on driving up the case numbers by mass testing of healthy, asymptomatic individuals.

You made Albertans irrationally fearful of one another, convincing us that asymptomatic transmission is a driver of infections, while multiple studies demonstrate that this is false. Yet you failed to update the public on the change in science.

You convert -- coerced an entire population to wear masks, despite the fact that their ability to prevent transmission of COVID-19 has been seriously called into question by recent systematic reviews of the medical literature. This is also readily observed by comparing regions with and without mask mandates. Cloth masks and most cloth-produced masks are not approved medical devices. Rather, their real purpose appears to be the creation of heightened public anxiety, isolating the wearers, and posturing visual compliance to unfounded public health dictates. This insidious form of

psychological control has immeasurable health, social, and psychological consequences, especially for children, which you fail to acknowledge.

You've utilized the lockdowns, or NPIs, as a sledgehammer to bring down COVID-19 cases, while ignoring the collateral damage from lost livelihoods, stalled cancer and transplant surgeries, and increased rates of depression, drug overdose and suicide.

You failed to take a holistic approach, and your cure is proving far worse than the disease. There are multiple studies demonstrating the ineffectiveness of lockdowns, easily seen by a simple comparison of jurisdictions that locked down with those that did not.

You're failing Albertans by failing to understand the evolution of knowledge we learned by and through error. The ethical principle is to own up to mistakes. Without that first step, ignorance flourishes.

 You provided (INDISCERNIBLE) computer model predictions to justify lockdowns, proclaiming the lockdowns as successful when their predictions did not materialize. This is not proof. This is factual manipulation. Computer models have provided too many nonsensical predictions, and should have been ignored. After decades of model refinement, we still cannot accurately predict the weather even a day in advance, yet you present COVID modelling results as if they are accurate over a span of months.

You have not provided any solid scientific evidence that any of the measures you imposed on the public are either necessary or affective. You have ignored a body of scientific literature that does not support your measures, and you have engaged with imminent experts who have raised concerns -- sorry -- and you have not engaged with imminent experts who have raised concerns or evaluated the same evidence in a way that does not align with your views.

You have not allowed public scientific debate on these issues, choosing instead to ignore, sensor, or smear those brave enough to bring them to the public.

You have ignored early treatment protocols for safe, affective, and inexpensive treatments of COVID-19, with multi-drug therapies, despite massive evidence -- both from front-line doctors and meta analyses of the medical literature, with published studies showing their efficacy around the world.

Instead, you have convinced citizens that COVID-19 is a death sentence, and that only vaccination -- and indeed, vaccine mandates -- will save us. You have withheld important information from the public and from front-line doctors, who have had the courage to describe life-saving treatment to their patients. What a waste of lives.

Even now, you are relentlessly pushing experimental vaccines on the population as safe, even though there is a lack of long-term safety data available. These genetic-based therapies only receive emergency interim authorization, and have not undergone the same type of review as fully approved products. You are not providing the public with the information they need to be able to give informed consent.

You forced family and emergency doctors to abandon their Hippocratic oaths to first do no harm. You've destroyed the science surrounding COVID-19 and replaced it with baseless behavioural prescriptions. You've divided citizen from citizen, parent from child, brother from sister, student from teacher, and grandparents from their offspring.

Overall, you have participated destroying a province that was once prosperous, strong, and free. You've closed businesses, triple-barricaded churches, imprisoned Krishnamoorthi pastors, trivialized and ridiculed all who have dared to question your health orders as tin-foil hat conspiracy theorists, and even prosecuted as criminals anyone with the temerity to organize or participate in a peaceful protest with a democratically elected government.

There is a moral riddle taught in grade school that is directly applicable to the present case. It is called the Bystander At the Switch, also known as the Trolly Problem. It is a story about a run-away train hurling towards a cluster of people stuck on tracks ahead. One is faced with the dilemma of pulling the switch to send the train down another track with fewer people there, or else choose to save many lives by sacrificing a smaller number of others.

Although that grade school riddle is posed as a moral dilemma, it really is not. There is only one correct choice. Universal human rights were created to make it clear that no person or government has the right to pull the switch to send the train down another track towards a sack official group of victims.

 In the aftermath of World War II, the member states of the United Nations formally adopted a universal declaration of human rights. It explicitly forbids government from treating some people as worth less than others, and forbids government from sacrificing some people for the benefit of others. It forbids government from knowingly imposing harm on some individuals in order to serve an alleged greater good. And finally, it forbids government from imposing a hierarchy of rights upon its citizenry.

Sadly and horribly, all of these precepts have been violated by the Government of Alberta.

For two years now, Albertans have experienced the greatest collection violation of their

civil liberties that this province has ever known, yet there is no war, no calamitous natural disaster, no catastrophic loss of critical infrastructure, and no dramatic overwhelming or sweeping loss of life.

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Select individual rights and freedoms have been constitutionalized in this country for a reason, not merely because living in a free society is convenient, but because of the recognition that such activities, experiences, and endeavours that those rights protect are what make life truly worth living. History has borne out that maximum individual freedom is directly linked to maximum human flourishing, and that suffocating government control is directly linked to less human flourishing, and sometimes none at all.

I state the self-evident proposition that there could be no more, nothing more antithetical to the public interest than the symptomatic dismantling of freedoms of the Alberta people, even if that dismantling is an unintended consequence to garner efforts to a perceived crisis.

So what are we asking the Court to do? We're asking the Court to resist the argument that it should presume or take judicial notice of the existence of a health emergency widely known at the COVID-19 pandemic. Instead, we urge the Court to carefully consider and to properly weigh the quality of the expert evidence -- especially scientific data -- to determine whether a state of public emergency was actually justified. And if so, whether the measures, the severe measures imposed meet the strictures of the *Oaks* test that my friend, Mr. Rath, went through and described, and which I know are well-known to this Court.

Courts have understandably been differential to government in terms of stepping into the realm of law-making authority. Courts, under the common law as you know, are primarily interpreters rather than creators of law in our tradition.

That said, given the oppressive nature of these orders, and the extraordinary fashion in which they've been created, we cannot rely upon the Parliamentary process. Therefore, it is for this Court to uphold the constitutional freedoms that are being violated.

Those are my, that's my opening statement. Thank you.

37 THE COURT:

Okay, thank you, Mr. Grey.

I guess having finished the opening statements, we could proceed with the first witness. It is 12:00. Did you want to start now, or wait until 1:30 and start? I am in your hands.

1 2 3	MR. RATH: long would we go for if we started now?	I'm fine to start now, Justice Romaine. How
4 5	THE COURT:	To 12:30.
6 7 8	MR. RATH: great.	Yes, let's go now, if that's okay. That would be
9 10	THE COURT:	Okay. Mr. Grey?
11 12	MR. GREY:	All right.
13 14 15 16	break I understood that he was in the v	- I was texting with Dr. Bhattacharya during the vaiting room. Perhaps if I could just have five or ur clerk is indicating that he's waiting on the cue?
17 18	THE COURT:	Madam Clerk?
19 20	THE COURT CLERK:	Not that I can see.
21 22	THE COURT:	Okay.
23 24	MR. GREY:	Okay.
252627	THE COURT: minutes?	Do you want us to adjourn for five to ten
	MR. GREY: have a text from him, he says he's in the let in. I'm not sure if	Perhaps, yes. He says that he is actually, I room, that he's in the room and he's waiting to be
32 33	THE COURT:	Oh, okay.
34 35	MR. GREY:	how that can be done.
36 37 38	MR. PARKER: Mr. Grey?	Has he possibly joined as an observer,
39 40	THE COURT CLERK:	I do see Dr. Bhattacharya as an observer here.
41	MR. GREY:	Okay. So I did send him the information

1 2 3 4	· · · · · · · · · · · · · · · · · · ·	did send him the other information, the panelist to do is take a break and then get him to log in
5	THE COURT:	Okay. We will take a
6		
7	THE COURT CLERK:	I think I can make him a panelist.
8	THE COLUMN	
9	THE COURT:	Oh, okay.
10	Madam Clark is avagasting that	
11 12	Madam Clerk is suggesting that	
13	MR. GREY:	Okay, great.
14	WIR. GILL 1.	Okuy, greut.
15	THE COURT:	she can make him a panelist.
16		1
17	MR. GREY:	Okay, great. Thank you.
18		
19	THE COURT:	Thank you.
20		
21	MR. GREY:	I see Dr. Jay Bhattacharya.
22		
23	DR. BHATTACHARYA:	Good morning.
24	THE COLUMN	
25	THE COURT:	Okay.
2627	MR. GREY:	Madam Justice.
28	WK. GKE I .	Madam Justice.
29	MR. RATH:	Morning, Dr. Bhattacharya.
30	WIR. IXXIII.	Wiorining, Dr. Briattacharya.
31	DR. BHATTACHARYA:	Good morning.
32		8
33	THE COURT:	Okay.
34		•
35	Madam Clerk, can you no, I see he is o	on my monitor as well, thank you.
36		
37	JAYANTA BHATTACHARYA, Sworn, F	Examined by Mr. Grey (Qualification)
38		
39	THE COURT:	Okay. Mr. Leighton, would you like to
40 41	introduce Dr. Bhattacharya with respect him to give opinion evidence?	to how you want him to be qualified in order for

1			
2	MR. C	GREY:	Certainly.
3		LID CDDI	
4	Q	MR. GREY:	Good morning, Doctor, it's Leighton Grey. Can
5		you hear me okay?	
6	A	Yes, I can hear you just fine.	
7	0	Creat Constant and come discussion	hafara Carret anamal this marries about sains
8 9	Ų		before Court opened this morning about going ad qualification process. I know that you have
10		testified before in Court; is that corre	•
11	٨	I have.	Ct:
12	A	i nave.	
13	0	Okay So what we have then asl	xed to do is to do an abbreviated qualification
14	V		some of your qualifications and state the precise
15		• • • •	opinion that you're going to offer to the Court; is
16		that understood?	7 8 8
17	A	Yes.	
18			
19	Q	And then I'll be handing you over to	be cross-examined by Mr. Parker and/or other
20		members of his team?	·
21	A	Okay.	
22			
23	Q	All right? Okay.	
24			
25			affidavits before you that have been filed in this
26		_	dated, filed the 22nd of January of 2021?
27	A	January	
28			
29	Q	Yes. I had sent these to you recently.	
30	MD	NADVED	
31		PARKER:	Counsel, I'm really sorry to interrupt. I don't
32		<u> </u>	berta. So just if we could be perfectly clear, if we
33		nich would be akin to our Form 25, but	rt, and it's attached to a document that he signed,
3435	WI	iich would be akin to our Form 23, but	a stand to be corrected.
36	MR (GREY:	Okay.
37	IVIIV.	JILL 1.	Okay.
38	Q	MR. GREY:	So do you have the expert report from
39	_	I am having trouble finding the Janua	
40		5	
41	THE (COURT:	It is enormous, if that helps.

1	0 MD 0D 774	
2	Q MR. GREY:	Yes. It would have been signed by you on the
3		. It's about 2,300 pages?
4 5	A 2,300 pages? Okay.	I think I, I think there's only 24 pages in this document; right.
6	Q There's 20 paragraphs	s and then a series of schedules attached.
7	A I'll find it while we're	
8		6)
9	MR. PARKER:	Would you like us to share it with the sorry to
10	interrupt again, Mr. Grey	we have it up here, if you would like us to share it?
11		
12	MR. GREY:	Yes, that would be great. Thank you,
13	Mr. Parker.	
14		
15	MR. PARKER:	Just a minute.
16	A T : 1.1 C 1:	
17	A I might have found it,	let me see. Book of authorities.
18 19	MR. PARKER:	It should be on the screen there, sir.
20	WIK. FARKER.	it should be on the screen there, sir.
21	Q MR. GREY:	It's on the screen now. Do you see it, Doctor?
22	•	Bhattacharya. Let me just, let me search for this. I see it on the
23	screen, yes.	2 martine fair 200 me just, for me search for this. I see it on the
24	, ,	
25	Q Okay. So you'll see	on the first page, at paragraph 2, it references the attachment of
26		attached as Schedule A?
27	A Yes.	
28		
29		this document and signing it I know it's been some time, but
30	A Yes, I do.	
31		
32		ou'll see at paragraph 3, it goes into some detail about your
33	education and qualific	cations?
34	A Yes.	
35	O And then and act	tuelly ever the payt series of negotianhs all the year up to
36 37		tually, over the next series of paragraphs, all the way up to into some detail about your qualification and experiences, your
38		dical doctor, instructor. Would you like to describe for us
39	-	ur qualifications are to provide an expert opinion in this
40	proceeding?	and the state of the same of t
41	1 0	sor in the school of medicine at Stanford University. Since 2001,

I was a professor in the Department of Medicine, and just this year, I transitioned to the Department of Health Policy. 2

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I've been writing and publishing in peer-review journals on infectious disease epidemiology and infectious disease policy for about that long, that length of time, since about 2000. And I have published on a variety of diseases and policy-related diseases, including HIV, H1N1, H5N1, antibiotic resistance, and in particular, on COVID, I've published six peer-reviewed papers on COVID relating to the extent of spread of COVID, the mortality rate of COVID, the fairness of placement of testing centres, of the efficacy of non-pharmaceutical interventions in slowing the spread of COVID disease and other topics related to COVID.

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- Q I understand that you've also testified in another proceeding that took place in the province of Manitoba last year?
- 15 A Yes, I did.

16

- 17 Q And were you qualified as an expert to give testimony in that proceeding?
- 18 A Yes, I was.

19

- 20 Q And did you give testimony similar to what you're providing to this Court in that case?
- 21 A Yes, I did.

22 23

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- Q Okay. Sir, if I could refer you to paragraph 10 of the expert report that we're referring to, the one that you signed on 21st of January of last year. There's a reference to two unpublished papers, do you see that?
- A I do. 26

27

- Q Have those papers since been published? 28
- 29 A Yes.

30

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- 31 Q Could you tell us where (INDISCERNIBLE) --32
 - A (INDISCERNIBLE) the one the paragraph 10 has been published. paragraph 11 is still not published. The one in paragraph 10 has been published in the International Journal of Epidemiology. There's a, is LA County Santa Clara Seroprevalence study that I reference in paragraph 10 was published in the *Journal of* the American Medical Association.

36 37 38

- Q Okay. I understand that some controversy may have arisen by this Santa Clara Seroprevalence study. Could you describe that for us.
- 40 A Sure. So when we wrote the study, it was the very first public study with a paper behind it describing a result that was very surprising to the scientific community. In 41

particular, it found that the number of infections in Santa Clara County, in California -- where I live -- in early of 2020, were 40 to 50 times more, there were 40 to 50 times more infections than there had been identified cases at the time.

1 2

This generated a tremendous amount of interest within the scientific community, and it also generated a lot of public interest. Included in that public interest was -- I mean, I would just describe them as hit pieces be people, by journalists on places by Buzzfeed, attacking, you know, my financial motives for participating in the study and so on, many of which made absolutely false allegations, for instances about the finances. I earned nothing from the study, zero dollars. There were donations from many people in the study, including a donor who is the owner of Jet Blue, who gave \$5,000 to Stanford University for the study after the study was published. No influence on the study results. But the controversy, such as it was, focussed on those kind of allegations.

Stanford investigated those allegations and found no basis in the claims that there was any undue influence by the finders of the study on any of the results; and in fact, as I said, the paper had been a published in a top peer-reviewed journal of epidemiology since.

Q Thank you. Sir, at paragraph 17, there's reference to something called the Great Barrington Declaration. And I know that your evidence in your report, in other evidence you go into some detail about this Great Barrington Declaration. Would you just give the Court a short summary of that and its relevance to this proceeding?

A Sure. So the Great Barrington Declaration was written, I wrote it with Sonetra Gupta of Oxford University, and Martin Kulldroff of Harvard University. They're both very very prominent and well-known epidemiologists, and Martin is a very well-known bio statistician.

The basic idea, the basic premise of the Great Barrington Declaration is that there is a very steep age gradient in the risk profile for COVID-19, such that older people face much higher risk of severe disease and death upon infection with COVID-19, relative to younger people.

At the same time, there are tremendous harms to the health of people who are exposed to the restrictions -- such as, I call them lockdowns -- the lockdown restrictions, but by that I mean a suite of restrictions in normal life designed to people apart from one another. And in particular, those harm the health of everybody. So the Great Barrington Declaration, psychologically and mentally -- psychologically and physically.

So the Great Barrington Declaration called for a lifting of those restrictions as a general matter so that younger people could live lives as close to normal as possible, and then for older people, a focussed protection approach to protecting older people from the disease, with more resources and more ingenuity put into protecting older people from exposure to the virus back then, and then prioritization for vaccination once the vaccines came into play.

- Q Okay. I notice, Doctor, that in addition to your scientific background as a doctor and an epidemiologist and virologist, you also have a Ph.D. in economics?
- A I do.

- Q Okay. Could you describe how your knowledge of economics and economic theory informs your scientific studies and your scientific work, especially in the context of COVID-19 and lockdowns?
- A I think in all policy settings, we have to consider both costs and benefits. That's a primary rule of economics. Looking only at the potential benefits of a policy, while ignoring the costs of a policy, is economic malpractice. And so that has informed my thinking about how to best preserve the health of the population. You should not only be looking -- and in economics, this is a really clear thing -- you don't only look at one outcome, you look at all outcomes from a policy and weigh them.

So you shouldn't just be looking at COVID-19 outcomes, according to the standard economics, you should be looking at other health outcomes as well. And the consequences of those policies adopted on all health outcomes, not just simply on COVID-19 outcomes.

So the economics plays a role in informing how I think about how to weigh the harms and benefits of the policies, and to me, economics suggests very strongly for a more holistic evaluation than has been conducted to date.

- Q Are those comments specific to what you know about the province of Alberta?
- 32 A Yes.

- Q Okay. Doctor, at paragraph 18, there's a breakdown, a very specific description of the nature of the opinion that you've been asked to provide on behalf of the applicants in this case. Could you just take a moment to read that.
- A Yeah, thank you.

- Q Okay. So first of all, do you consider yourself qualified to provide the opinion that's described in paragraph 18?
- 41 A Yes, I do.

1 2 3 4	Q		ed to the Court that are in evidence now, do they e opinion that are being, that you are asked to
5 6	A	Yes, they do.	
7	Q	Okay. And, sir, have you been offered	ed any commission or compensation in exchange
8		for providing evidence in this proceed	ling?
9	A	No. I'm offering my testify pro bono.	
10	0	01	
11 12	Q	Okay.	
13	Subm	issions by Mr. Grey (Qualification)	
14		institution (Quantitution)	
15	MR. C	GREY:	I know, Madam Justice, that the qualification of
16		=	acknowledged or admitted in this proceeding.
17		•	the witness, those are all the questions I propose
18	to	ask.	
19 20	Λ+	this point I propose to have him for	ully qualified for the Court, and then have the
21		spondents proceed with their cross-exa	• •
22	100	pondents proceed with their cross end	initiation of the wintess.
23	THE	COURT:	Okay. I just want to be clear that I understand
24		-	nderstand that you are asking Dr. Bhattacharya to
25			an expert in the area of public health and health
26		-	niology and infectious disease epidemiology? Is
2728	tna	at the scope of his expertise?	
29	MR.	GREY:	Yes, and also the impacts, the public health
30		pacts on lockdowns, which he's descri	· · · · · · · · · · · · · · · · · · ·
31		•	
32	THE (COURT:	Also public health, impact of lockdowns.
33			
34	Ok	xay, Mr. Parker, do you have any probl	em with that qualification language?
3536	Suhm	issions by Mr. Parker (Qualification	.)
37	Subili	issions by Wil. I alker (Qualification	.,
38	MR. I	PARKER:	We've already agreed that we are not opposing
39			ask questions, and those questions we will argue
40	at	the end go to the weight that should b	e given to the opinions that Dr. Bhattacharya has
41	giv	ven in these two reports.	

1			
2	So I'm not objecting to anything, but I will be arguing later that there should be less		
3	weight given to certain portions of his opinion, given what he has for qualifications.		
4			
5	Is that clear, Justice Romaine?		
6			
7	THE COURT: Yes, it is. Thank you.		
8			
9	Ruling (Qualification)		
10			
11	THE COURT: Okay. Dr. Bhattacharya, then, I qualify you to		
12	give opinion evidence as an expert in the area of public health and health economics,		
13	including a focus on epidemiology and infectious disease epidemiology, and also the		
14	public health impacts of lockdowns.		
15	public hearth impacts of lockdowns.		
16	Okay. I understand now that Mr. Parker will commence his cross-examination.		
17	Okay. I understand now that ivii. Farker will confinence his cross-examination.		
	Cookeed Ma Doubeau		
18	Go ahead, Mr. Parker.		
19	MD DADICED XV I 'II 41 1 1 I 4'		
20			
21	Romaine.		
22			
23	The Witness Cross-examined by Mr. Parker		
24			
25	Q MR. PARKER: Good morning, Dr. Bhattacharya, pleased to		
26	meet you. I imagine you're in California; is that correct, sir?		
27	A I am, yes.		
28			
29	Q And, sir, I didn't hear you say, but I wish you would, because it's a great line, that		
30	every third letter in your last name is an A. It's a tremendous way, I'm sure you know,		
31	to remember how to spell your name. I've had to write it a few times over the last		
32	year.		
33			
34	Any way, Doctor, before we get into the report, I'd like to go to your CV. And my		
35	colleague will bring that up. It should be on page 7 of 2,300.		
36			
37	MR. PARKER: Justice Romaine, just for your information,		
38	you'll hear me say that a lot. This report with all its attachments, is 2,300 pages, so we'll		
39	be indicating as we go through, the number within those 2,300 pages.		
40			
41	Q MR. PARKER: So we were on page 8, and Dr. Bhattacharya,		

this is your report -- sorry -- this is your CV. I believe it has an error in the top 1 right-hand corner. The date, January 2020, is that correct? 2 3 A It should be January 2021, yeah. At least I think that's the one I remember submitting 4 more than a year ago. 5 6 Q And you submitted the same thing in Manitoba, you made the same correction, so I'm 7 pretty sure that that needs to be made, so thank you for that. 8 9 Are there any other errors that you need to correct on this CV, sir? A Not that I'm aware. There may be typos and other things as we go through. 10 11 12 Q Sure, sure. This CV, sir, is one that, if I look at the peer-reviewed work, I believe it 13 ends at 141. Is that the same CV that you have in front of you, sir? A So my latest one has 155, but I can bring up the older one. Let me see if I can find it. 14 15 Q If you could, sir. Because I don't have the one with 155. I only have the one we 16 received with 141, so we would like you, I'm going to ask you if you can just have that 17 18 one in front of you, and no other CVs, please. 19 20 Let me know when you've got it, sir. A I'm looking. 21 22 Q I guess we have it on the screen here, sir, so --23 A I have it here, yeah, I have it. 24 25 Q Okay, wonderful. 26 27 28 Doctor, before we get into that, I'm just going to go through your background before you get into developing this CV. I understand you were born in India, sir? 29 30 A I was. 31 32 Q And I understand you arrived in the United States at age 4? 33 A That's about right, yeah. 34 Q And is upon arriving, you received a chocolate bar and basically thought this is the 35 36 land of milk and honey, and I'm never leaving; is that right? 37 A I -- I love the United States. 38 39 Q Do you? I'll move on from age 4 to 18, and I think at age 18, you first attended at

40

41

A Yes.

Stanford as an under grad; correct?

1		
2	Q	And, sir, you're 52/53 now; is that right?
3	A	53.
4		
5	Q	And you're still at Stanford?
6	A	Yes.
7		
8	Q	You've been there, what's that, 35 years, I guess, then?
9	A	Something like that. I left for three years to work at Rand, at the Rand Corporation.
10		
11	Q	What's the Rand Corporation, sir?
12	A	It's a think tank in southern California that provides advice to the American
13		government on a variety of topics, including on health policy.
14		
15	_	Does it have a particular ideology bent that it is known for?
16	A	No. It's non-partisan.
17	_	
18	Q	I see. Sir, I want to jump we'll come back to your CV in a bit I want to jump
19		ahead to the last two years or so. I understand during a portion of that time, you have
20		been on sabbatical, or you were on sabbatical last year; is that correct?
21	A	I was on sabbatical from, I think it was September 2020 to August of 2021.
22	0	A 1 danis 41.44 i
23	Q	And during that time, sir, were you doing research of any particular kind, or what were
24 25	٨	you doing to keep busy during your sabbatical? I was focussed on doing research on COVID, public advocacy regarding lockdowns,
25 26	A	and mainly I spent my sabbatical writing and writing and researching on COVID.
20 27		and mainly I spent my sabbatical writing and writing and researching on COVID.
28	Q	And during that time, September 2020, that would include the time that you and your
29	V	coauthors wrote the Great Barrington Declaration; is that correct?
30	Α	Yes.
31	7 1	
32	Q	And we'll get back to that in a while and sorry, I may slip in and call it GBD, so
33	•	you'll understand what I'm talking about; right?
34	Α	Yes.
35		
36	Q	And, sir, you've indicated you've taken no, or you're not taking any payment today.
37		You are giving your opinion pro bono, and I understand, sir, that you have not taken
38		any money for any of your reports in this matter; is that correct?
39	A	That's correct.
40		
41	\mathbf{O}	And sir you have given you have given evidence elsewhere during the period of your

47 1 sabbatical, and I understood you take no money for any of the time you spend in 2 giving that evidence and in preparing the reports; that's fair? A That's correct, yeah. 3 4 5 Q Sir, did the fact that you were not charging for your evidence for your reports, did that in your view, affect the quality of your evidence in any way? 6 7 A No. 8 9 Q Sir, one jurisdiction you've already referred to was Manitoba; correct? A Yes. 10 11 12 Q And, sir, the Manitoba matter is, involved one, one of the applicants was called 13 Gateway, and so I'll refer to that case and the decision that came out of that case that 14 you appeared in as *Gateway*. You'll understand what I'm talking about, sir? 15 A Yes. 16 17 Q And, sir, you gave evidence in *Gateway* on May 3rd and 4th of 2021; is that correct? 18 A I'd have to look up the dates, but that roughly corresponds to my memory. 19 20 Q I've got the transcripts here, and I can assure you that's the dates on them? A I trust you on that, yeah. 21 22 Q Thank you very much, sir. And there was a decision issued by Chief Justice Joyal in 23 Gateway -- and the cite for the Court is 2021 MBQB 219. Were you aware of that 24 25 decision, sir? A I knew that Judge Joyal issued a decision. 26 27 28 Q Have you read it at all? 29 A No. 30 Q Sir, I want to go to your understanding of your role as an expert. Mr. Grey referred to

Q Sir, I want to go to your understanding of your role as an expert. Mr. Grey referred to an affidavit that you had sworn, and I pointed out that there was no affidavit sworn in Alberta. There is one that you swore in Manitoba, and I can bring it up in you need to, but I don't think you need to. I just want to ask you some questions about part of that

affidavit.

And it was the part of your affidavit where you indicate that, what your role is as an expert to the Court, and I will put the words to you, just to make sure that you have the same understanding of your role in Alberta. Are you with me so far?

40 A Yes.

41

35

3637

Q So do you acknowledge, sir, that in preparing your -- well, actually, I should stop. 1 Have we identified, I believe Mr. Grey went through part of your report, the part that I 2 3 would refer to as a Form 25. I should just make clear and get on the record that you 4 have prepared and filed two reports in this matter, which I will refer to as Ingram; is 5 that correct? A I filed a report in, very early in 2021, and then a supplemental one, I think, in the 6 7 middle of 2021. 8 9 Q That's right, sir, and I believe the dates were -- and I'm going to use this terminology -primary report, which was dated January 21st, '21; does that sound correct, sir? 10 A That sounds roughly right. 11 12 13 Q And --A I can go back and check, but yeah. 14 15 16 Q Thank you. And then you filed what I will refer to as a surrebuttal report, and that was dated, I believe, July 30th, '21; does that sound about right, sir? 17 18 A Sounds about right. 19 20 Q So, sir, let's get back to your role as an expert. Do you acknowledge that in prepares those two reports and providing expert evidence that your role is to assist the Court in 21 22 determining the matters in issue? A Yes. 23 24 25 Q And, sir, did you further acknowledge that it is your duty to provide evidence that is 26 fair, objective, and non-partisan, and to opine only on matters that are within your area 27 of expertise? 28 A Yes. 29 30 Q And, sir, do you agree that this duty that we've been discussing prevails over any 31 obligation that you may owe to any party on whose behalf you are engaged? 32 A Yes. 33 34 THE COURT: I see that it is 12:28. Is this a good time for us 35 to take the lunch break? 36

Just a couple more questions, and then we'll be

39
40 THE COURT: That is fine.

done in a couple of minutes; is that okay, Justice Romaine?

37

38

41

MR. PARKER:

1	MR. I	PARKER:	Thank you.
2 3 4 5	Q	MR. PARKER: you also understand, then, that the p with matters outside its knowledge a	Just carrying on on this line of questioning, sir, surpose of an expert's report is to assist this Court and experience; is that fair?
6 7 8	A	Yes, although I don't know what's in just provide my thoughts on the evid	side the experience and knowledge of the Court. I ence that I see in front of me.
9 10		authorities, even if they do not support	our obligation is to advise the Court of relevant ort your position, if you are aware of them?
11 12	A	Yes.	
13 14 15		And you understand that you need qualifications in the materials that you Yes.	d to provide the Judge with any limitations or ou are relying on; is that fair?
16 17	0		
18	Ų	Thank you, Dr. Bhattacharya.	
19 20		Justice Romaine, now would be appr	ropriate, if it's a good time, for lunch?
21 22	THE	COURT:	Thank you.
23 24	Ιh	have a meeting at 1:00, so can we, if w	re adjourn to 1:45, does that suit everybody?
25 26	A	Yes.	
27 28	MR. I	PARKER:	Yes.
29 30	MR. I	RATH:	Certainly, Madam Justice, thank you.
31	THE	COURT:	Okay, thank you.
32 33	W	e will resume at 1:45.	
34 35			
36 37 38	PROC	CEEDINGS ADJOURNED UNTIL 1:	
39			
40 41			

Certificate of Record

2 3

 I, Michelle Palmer, certify that this recording is the record made of the evidence in the proceedings in the Court of Queen's Bench, held in Courtroom 1702, at Calgary, Alberta, on the 10th day of February, 2022, and that I was the court official in charge of the sound-recording machine during the proceedings.

Certificate of Transcript I, J. Aubé, certify that (a) I transcribed the record, which was recorded by a sound-recording machine, to the best of my skill and ability and the foregoing pages are a complete and accurate transcript of the contents of the record, and (b) the Certificate of Record for these proceedings was included orally on the record and is transcribed in this transcript. 690512 NB Inc. Order Number: TDS-1000818 Dated: February 15, 2022

1 2	Proceedings taken in the Court of Queen's Bench of Alberta, Courthouse, Calgary, Alberta			
3				
4	February 10, 2022	Afternoon Session		
5				
6	The Honourable Justice Romaine	Court of Queen's Bench of Alberta		
7				
8	J.R.W. Rath (remote appearance)	For R. Ingram		
9	K.E. Newton (remote appearance)	For R. Ingram		
10	L.B.U. Grey, QC (remote appearance)	For Heights Baptist Church, Northside Baptist		
11		Church, E. Blacklaws, and T. Tanner		
12	N. Parker (remote appearance)	For Her Majesty the Queen in Right of the		
13	11	Province of Alberta and The Chief Medical		
14		Officer of Health		
15	B.M. LeClair (remote appearance)	For Her Majesty the Queen in Right of the		
16	, ,	Province of Alberta and The Chief Medical		
17		Officer of Health		
18	N. Trofimuk (remote appearance)	For Her Majesty the Queen in Right of the		
19	(**************************************	Province of Alberta and The Chief Medical		
20		Officer of Health		
21	M. Palmer	Court Clerk		
22				
23				
24	THE COURT:	We are ready to continue, Mr. Parker, with your		
25	cross-examination?	, , ,		
26				
27	MR. PARKER:	I'm sorry, Justice Romaine, my volume was off.		
28				
29	I am ready to continue, my apologies.			
30	, , , , , , , , , , , , , , , , , , ,			
31	THE COURT:	No problem.		
32		1		
33	MR. PARKER:	Ready to go?		
34		, 5		
35	THE COURT:	Yes.		
36				
37	JAYANTA BHATTACHARYA, Previou	sly Sworn, Cross-examined by Mr. Parker		
38	,	•		
39	Q MR. PARKER:	Dr. Bhattacharya, welcome back. Do you recall		
40	`	al committee on coronavirus misinformation?		
41	A Yes.			

- 2 Q And when was that, sir? Was that November of last year, do you know?
 - A I don't remember the exact date, but that sounds about right.

- Q It was on YouTube, and you were asked questions by a representative, Raja Krishnamoorthi, a US representative from Illinois 8th District. Do you remember Representative Krishnamoorthi asking you questions at that committee?
 - A I do.

- Q And he asked you about evidence you had given in certain jurisdictions on the pandemic and on non-pharmaceutical interventions; is that fair?
 - A He asked me about one case, I think, in particular, in Tennessee, on mask mandates.

- 14 Q Right. He also asked you about Florida, I believe, do you remember that?
- A I don't remember specifically about Florida, but it's consistent with the kind of things he was asking me.

- Q And he asked you about Manitoba, the decision of Chief Justice Joyal, do you recall that?
 - A I don't remember him asking about that, but I'll take your word for it.

- Q The Tennessee case, it was *RK v. Lee* -- we say "and" for the V in between -- so *RK v. Lee*; is that correct?
- A I don't remember the name of the case, I apologize. It was a case about mask mandates, but I'll take your word for it.

- Q It was Governor Lee as the Governor of Tennessee, I understand, (INDISCERNIBLE) Lee, and I believe he had mandated that students did not have to wear masks if their parents said they didn't want to, and no reason was required. Does that sound correct?
- A That sounds -- I mean, I don't remember the exact specifics of the order, but it was to make the mask optional.

- Q And I have the decision of, it was Judge Crenshaw, Judge William Crenshaw, and the hearing was on, as I understand it, September 24th and October 5th of last year, which was interesting, because we were supposed to be having this hearing from September 20th to early October. And it was, as I understand from the decision, temporary injunction had been issued on the motion of *RK* to stop the mask mandate from coming into force. Is that your understanding, sir?
- 40 A Yeah, something like that. Again, I don't, I was providing expert testimony on the date about masks, not on the legal aspects of the days.

- Q Of course not. And do you know anything about the plaintiff, RK? Do you remember his situation?
- A I think it was a case of, like, the plaintiffs were disabled kids.

- Q Right. According to the decision, the plaintiff, RK, is a 13 year-old 7th Grader in Williamson County with downs syndrome. I don't know if you remember anything about his mother, but according to the case, she was a board-certified physician in both allergy and immunology, and she also treated children who were infected with COVID-19. Does that, is that something you recall, sir?
- A I didn't interact with them. Again, I just provided my own testimony.

- Q Judge -- sorry, did you have something to say, sir?
- 14 A No.

- Q Sorry. Judge Crenshaw, he didn't take kindly to your evidence, according to the written decision; is that fair, sir?
 - A He placed less weight on my evidence that I think he ought to have.

Q Well, let me read to you what he said in summation, after he went through four reasons for rejecting your evidence. He said: (as read)

In short, the Court is not persuaded by or confident in Dr. Bhattacharya's expert opinion. He over-simplified the conclusions of the Bangladesh study, suggesting he may have been apt to do so with other studies upon which he relied. He offered opinions regarding the pediatric effects of masks on children, a discipline on which he admitted he was not qualified to speak. His demeanour and tone while testifying suggested he is advancing a personal agenda.

At this stage of the proceedings, the Court is simply unwilling to trust Dr. Bhattacharya.

- Now, do you recall hearing that before? Have you read that, or has somebody told you that Judge Crenshaw said that about your evidence.
- A I've heard that, I read that -- I had read that, yes.

- Q And he gave, do you recall Judge Crenshaw gave four reasons for coming to that conclusion in his decision. Do you remember what those four reasons were, sir?
- A No, I don't remember the specifics of the four reasons. I will say I didn't oversimplify the mask study, the conclusions of the mask study. I think that's false.

1	
2	

- Q I'm sorry, is that one of his criticisms that you're --
- A That's what you just read, actually. You said that I oversimplified, or he wrote that I oversimplified the Bangladesh mask study, and that's false. I did not.

- Q Oh, I am sorry. I didn't realize the Bangladesh study was a mask study. I haven't looked at it. I just noticed Judge Crenshaw's comments on it, including his first criticism was that your conclusions conflicted with those of that study's lead author and designer, Dr. Abaluck, who cogently testified that the study comes to the opposite conclusion as to what you opined on. Do you recall hearing that, sir?
- A I recall hearing that Professor Abaluck had testified, but I disagree with Abaluck's conclusion, and I also disagree that I oversimplified the results of the study.

- Q But you would agree that Abaluck is the study's lead author and designer?
- A I don't know if he's the designer. He was the lead author.

Q According to the decision of Judge Crenshaw, lead author and designer, sir. That's what I know.

His second criticism, sir, was that you were not qualified to make several of your conclusions. You had conceded that you do not practise medicine, you are not board certified in any medical field, and did not complete an infectious disease residency.

Is that a fair assessment of your qualifications there, by Judge Crenshaw? A I am not a practising physician. I do research full-time.

- Q You have never completed an infectious disease residency; correct?
- A No. I don't practise medicine. I have never been qualified to practise -- I'm an MD, so I have a medical degree, and I teach in a medical school, and I do research full-time on the topics that I am qualified to speak on here.

Q M-hm. And Judge Crenshaw continued: (as read)

In spite of not having practised medicine or being board certified, or not completing an infectious disease residency, you nevertheless commented, purported to comment on a child's risk of spreading infection or dying from COVID-19.

- 39 So --
- A So that is a question of, that is a question of epidemiological data and epidemiological evidence, on which I am qualified to speak.

1		
2	Q	Judge Crenshaw disagreed, sir; right?
3 4	A	I mean, evidently. I don't know. I'm not sure exactly what he disagreed on.
5	Q	Well, I'm reading it to you, sir. So you hadn't heard this before?
6		I don't think he disagreed that I was a qualified expert on the topic. Because I just said
7		that's not true.
8		
9	Q	I just read to you, sir: (as read)
10		
11		That Dr. Bhattacharya is not qualified to make several of his
12	A	I'm sorry, sir, but there was no Daubert challenge. He accepted me as an expert. He
13		just placed less weight on the evidence he gave.
14		
15		Actually, could we we'll bring up the decision, sir, and maybe that will help.
16	A	Can I just say on his comments, I think he was referring to the fact that I'm not a
17		pediatrician, and I said I'm not qualified to talk on pediatric harms of masking. Not
18		about the spread of the disease.
19		
20	Q	Okay, sure. Let's go to, my colleague will just scroll down there, it's on the first page,
21		and it's sorry, I have trouble with the paragraphs in these decisions, yes, there is.
22		The indented part. I don't know if you can read it, right where the cursor is. Do you
23		see that, sir?
24	А	Yeah.
25	0	And I think this is what was many when you say be accepted you as a witness. He
26	Q	And I think this is what you mean when you say he accepted you as a witness. He
27 28		says, and I'm going to read: (as read)
29		For the reasons stated on the record at the preliminary injunction
30		hearing, Dr. Cross, Dr. Augustyn, Dr. Abaluck, and Dr. Bhattacharya all
31		satisfied the expert witness standard under Federal Rule of Evidence
32		702, and the Court will give weight to their testimony accordingly.
33		702, and the Court will give weight to their testimony accordingly.
34		So you're right. He accepted you as an expert, and then he gave what weight he
35		thought was appropriate to your evidence; right? That's what happened.
36	Α	Yeah, that's typically what happens in these cases, from my experience.
37		,, pressing
38	Q	Fair enough, although I think you would agree well, perhaps you don't have

A A lot of other Judges have accepted my expertise on these specific matters.

39

40

savage. The third --

experience in seeing how Judge's comment on expert's evidence -- this was pretty

1		
2	Q	Right. Judge Crenshaw's third reason for saying that the Court was simply unwilling
3		to trust you was that your testimony was replete with contradictions that undercut your
4		credibility. Do you remember reading that, sir?
5	A	No, I don't.
6		
7	Q	Didn't hear that before?
8	A	No.
9		
10	Q	Okay. And then finally, he said: (as read)
11		
12		Dr. Bhattacharya's expert testimony regarding the effect of masks on
13		pediatric development also gives the Court great hesitation about relying
14		on his opinion.
15		
16		Do you remember hearing or reading that
17	A	I remember hearing that criticism from the plaintiff lawyers, not from the Judge, but
18		I'll take your word for it.
19		
20	Q	It's right in the decision, sir
21	A	I'll take your word for it, I believe you.
22		
23	Q	Sure. I just wanted to give what I understand is the citation to my friend: RK v. Lee,
24		decided October 22nd, 2021, and I believe it is 3:21-CV-00725 I'm not an expert
25		on
26	A	I don't actually agree that there were contradictions in my testimony, but
27		
28	Q	(INDISCERNIBLE)?
29	A	yeah.
30		
31	Q	Judge Crenshaw disagreed apparently, though, right?
32	A	Yeah. I mean, as I said, other Judges have accepted, on similar cases, the testimony
33		that I gave.
34		
35	Q	What about in Florida, the one I was talking about, Judge Cooper, Leon County. It
36		was, I believe, Governor DeSantis had also imposed a mandate not allowing masks in
37		school. Do you remember testifying at that trial, sir?
38	A	I do. I do remember that. On that case, we won on appeal.
39		
40	Q	You won on appeal, did you, sir?
41	A	Yeah well, "we" I mean, the plaintiffs the government won on appeal.

- Q The government won. But you said "we won." You're identifying pretty closely with the party who you were retained by then when you say "we won"? Is that how you express yourself?
 - A I mean, I don't -- I was asked to provide government testimony by the government. I mean, I provided my honest testimony.

- Q Do you recall how Judge Cooper accepted your evidence, or not accepted it?
- A I didn't read Judge Cooper's decision, no.

- Q Okay. I don't have his quotes at my fingertips, so I won't put them to you. If I suggest to you that he -- well, maybe I won't suggest to you, I'll actually get the quotes, and we can come back to that, rather than me hazard a guess on what he said without the actual wording in front of me.
- A Mean, I can tell thank you content of what I said, which is that there was no randomized evidence that child masking stops the spread of the disease, and that's an absolutely true fact.

- Q Right. But it was rejected, your evidence on this point was rejected by Judge Cooper in that case though?
 - A Well, I don't know that that's true. I haven't read the decision.

- Q Okay.
 - A I've told you we -- the case was won on appeal, yes.

Q "We won on appeal," I heard what you said, sir. Okay.

 And, sir, again, just jumping back to the GBD, you've spent much of the time since you wrote that advocating that jurisdictions in the United States, Canada, perhaps elsewhere, should be taking that approach, instead of the approaches to the pandemic that they are taking; is that fair?

- Q And, sir, today you realize that your evidence is being given in a case involving the constitutionality of the Chief Medical Officer of Health's orders of the Province of Alberta. Do you understand that, sir?
- 37 A Yes.

A Yes.

- 39 Q So you would agree that's a weighty subject matter; right?
- 40 A I think almost anything involving this pandemic is weighty.

- Q Fair enough. But if you're giving an expert opinion that you know if it's accepted may result in the orders of the Chief Medical Officer of Health being declared or held unconstitutional, that is, that's important stuff, isn't it? You take that seriously?
 - A I take every single thing I've done during this pandemic incredibly seriously. I feel the full weight of the decisions that have been made, the mistakes that have been made, and policy entirely, which is why I've engaged in the activities I have engaged in during the pandemic.

- Q M-hm. Another jurisdiction you gave evidence in was Manitoba. You already told us about that. And you couldn't swear to it, but you were willing to accept that you gave evidence there on May 3rd and 4th of 2021; right?
- A Yeah, again, I don't remember the dates.

Q Sure. The -- I just wanted to run through some dates for when you filed our materials in Manitoba and Alberta, just to get this on the record. I appreciate you may not recall the precise dates, sir, but let me know if you can agree to these as being, sounding correct.

- Manitoba -- sorry, and I'll refer to your first report as your primary report, and I'll refer to your second report, as your surrebuttal report, do you understand that, sir?
- A You mean for Alberta or for Manitoba.

Q Both.

24 A Okay.

- Q I'll just, okay? So in Manitoba you filed your primary report on January 5th, 2021.
 And in Alberta, you filed your primary report on January 21st, 2021. Does that sound fair?
 - A Again, I don't remember the exact dates, but yeah.

- Q Now, I've looked at those reports in some great detail, and they are, they're very similar, aren't they? The Manitoba and Alberta primary reports?
 - A Yeah, I made some, if I remember, I made some alterations to more specific to Alberta's situation, but the bulk of the reports is very similar.

- Q When you say you made changes similar to Alberta's situation, do you remember what those changes were?
- A I think I added the case number -- it's been a while, it's been a year since I wrote that report -- but if I remember, I added Alberta's current case numbers, you know, that kind of thing.

- Q Well, what kind of thing. Are you saying Alberta's situation, so you're talking about the case numbers at the time. Do you recall anything else about Alberta's situation at the time that caused you to change the language from Manitoba to the Alberta --
 - A It's been a year since I looked at that report, so I'd have to, I'd have to refresh my memory.

1 2

- Q Okay. You haven't looked at it lately?
- A I mean, I haven't looked at it in detail. I mean, specifically comparing what I filed in Manitoba and what I specifically filed in Alberta. It's been a year since I filed both of those. In order to check, I'd have to do a very careful, I'd have to look through both to remind myself, yeah.

- Q I understand, of course, thank you. And then the surrebuttal report in Manitoba was dated, I think it was filed March 31st, 2021 -- it's certainly dated that date. Does that sound correct, sir?
- A Again, I don't remember the exact date, but that sounds roughly in line to when I wrote it

- Q And then the next thing that happened in Manitoba was the hearing, and as we already covered, you gave evidence on May 3rd and 4th in that hearing. And then in Alberta, Alberta had filed its evidence in this proceeding on July 12th. Did you read any of that evidence, sir, that Alberta had filed?
- A I mean, I was -- I'm sorry, which evidence? I'm not sure what you mean.

- Q So on July 12th of last year, in *Ingram*, Alberta filed various affidavits and expert reports in response to the evidence that Ingram had filed in this matter, including your own expert report. And so it's those expert reports and affidavits that Alberta filed on July 12th that I'm asking if you've read?
- A So I prepared a rebuttal report -- I think you're calling it a surrebuttal report -- to some of those expert reports. I think I referred to them in my surrebuttal, if I'm not mistaken. But I could be, you know, again, it's been months and months since I wrote it.

- Q You --
- A So I've read those reports to which I filed a surrebuttal.

- Q Thank you, sir. No, that's helpful. So if the name of one of the witnesses or expert witnesses is mentioned in your surrebuttal report, then we can take it that that means that you read their corresponding affidavit or report; fair?
- 40 A Yes.

- Q And then, sir, after Alberta filed its evidence on July 12th, in *Ingram*, you filed your surrebuttal report in this matter on July 30th; is that fair?
 - A Again, the exact dates are, I'd have to go back and refresh my memory, but that sounds about right.

Q And then, then we note Chief Justice Joyal issued his decision in *Gateway* on October 21st of 2021, and here we are in this hearing now.

- You were asked by Representative -- or rather Representative Krishnamoorthi put to you a paragraph from Chief Justice Joyal's decision. Do you recall him doing that, sir?
- A No, he was very belligerent, so I don't really have a ton of recollection of what he had to say.

- Q It was an interesting experience for us to watch. We enjoyed watching it, although it was interesting. We said, Well, we can't yell at people when we're cross-examining them, but I guess it's different in the House of Representatives, perhaps.
- A I was taken aback myself.

- Q You know, fair enough. Although, I looked the gentleman up, and he is a Harvard Law School graduate, so I felt that he knew what he was talking about when he put these cases --
- A He didn't know what he was talking about, I'm sorry to say.

- 24 Q You didn't think he knew what he was talking about?
- 25 A No.

Q Hm. Any way, he put to you a paragraph from the *Gateway* decision -- and you know what, maybe we'll get to that later.

Let's go to another paragraph in that decision. If you could pull up document 2, please, Mr. Trofimuk. And so I'm just going to put up Chief Justice Joyal's decision, and if you can go to paragraph 166, please, Mr. Trofimuk. And this is the part of Chief Justice Joyal's decision, sir, where he speaks to your qualifications. And so it's paragraph 166, please. Can you see that, Dr. Bhattacharya, paragraph 166? Are you able to read that?

36 A Yeah.

- Q Thank you. Take a minute to read that and let me know when you're done, please, sir.
- 39 A Okay.

Q And so, sir, you'll see there that Chief Justice Joyal, after listening to all the evidence,

gives his conclusions on your areas of expertise. And he says that you:

Testified as an expert in health economics.

Do you agree with that, sir?

 A I didn't only testify as an expert in health economics. I was qualified in other fields that are related, that I've been accepted as an expert here as well.

Q And he continues that you:

Researches and writes primarily in the field of health outcomes related to various financial parameters in the United States, including Medicare, private insurance coverage, physician spending, the *Affordable Care Act*, NIH funding and the ownership of facilities.

Do you see that there, and is that a fair description?

A No, it's not.

- Q So that is not your primary field of research and writing, what I have just read out? That is not your primary field?
- A It is true that I write in the field of health outcomes, but it's not primarily due to financial parameters, and it's not just in the United States. I published in many many countries, including countries in Africa, European policy, Asian policy. I've also written on many many other topics other than this. Several --

Q So you're saying -- sorry, go ahead, sir.

A Yeah, I have several papers, many papers I published, including in top peer-reviewed journals on viruses, particularly on infectious disease and infectious disease policy. And not just related to the financial parameters.

- Q I just wanted, you said "many many countries," "many many countries." How many countries are you talking about? That's a lot of countries?
- A I don't have a count. I've written on, I mean, for instance, I just published a paper on antibiotic resist, antibiotics and life-saving in Italy. I published on population aging in Korea and Japan. I've wrote a book on the health policy of Japan. I mean, I just, I can, you know --

- Q So I guess we've got Korea, Japan, Italy, that's three. The US is four.
- A Four, I've written on the UK, I've written -- I mean, I've written on a number of countries.

- 1 Q Well, I've got -- sorry?
 - A I mean, we can go through my CV, if you would like. I don't count them in my head one by one. I can tell you what countries, each data that I relied on for the various papers.

Q If I understand, I just wanted to know, you used the language "many many countries," and so when you use that, it suggests to me that that is a large amount of countries you are talking about, and that's why I asked the question, sir.

As for going through your CV, we may do that. As I say, I know Manitoba's counsel took a long trip through your CV. I was hopeful that perhaps you might agree with me on what Chief Justice Joyal had said about your expertise and qualifications and avoid having to do that. But in any event, let's continue at paragraph 166, and get your thoughts on what Chief Joyal said about your expertise.

He continues, stating:

Prior to COVID-19, he had done limited work in respect of anything dealing with viruses and much of what he did was connected to economics.

Do you agree with that, sir?

A No, I do not.

Q And he, Chief Justice Joyal also says in this paragraph that:

He acknowledged in the course of his cross-examination that his knowledge of immunology is based on his studies in medical school and the articles he has since read.

Does that fairly describe the basis of your knowledge of immunology, sir? A I mean, plus the research I've done, but yes.

- Q Sir, if you were to do a one-line bio of yourself on your profile on the Stanford website, would it be accurate if it described you as a health economist who focuses on vulnerable populations and aging; is that fair?
- A I mean, I've had a number of bios over time. That is an accurate description of some of my work, yes.

Q Okay. Do you know if that, if what I just read to you appears on the Stanford, what I understand is the Stanford Health Policy web page?

A	I don't know exactly what's on there. I'll tell you there's a number of places where I
	appear on the Stanford web pages that describe the various things I've worked on. I
	mean, I've worked on a very wide variety of topics within medicine, and in particular,
	as I said, I've worked on infectious disease policy, including I mean, I've lost count
	of how many papers I've published in infectious disease policy.

Q So this -- I mean, I did print this off, although it's hard to print these things off from the web page, so it doesn't look very good, so I haven't provided it to you -- but it was healthpolicy.fsi.stanford.edu, people: Jay Bhattacharya that I was looking at. And as I say, it's just one line: (as read)

A health economist who focuses on vulnerable populations and aging.

Is that something that the university putting on there, or do you do that --

A No, I wrote that line.

- 17 Q Okay.
 - A 15 years ago. I'm not sure exactly when.

- Q Is it not accurate? Does it need changing, then, sir?
 - A No, no, it is accurate. That's what, I do also work on those things, absolutely. Vulnerable populations is my, the primary area, I think that I work on.

24 Q Okay.

A It's just incomplete. I mean, I work on many many things related to vulnerable populations and health.

- Q "Many many," but I realize we say it's incomplete. It's one line. I mean, it looks like your short bio, it's one line. So I'm not sure you could say it's incomplete if you only get one line to describe yourself?
- A I don't think you only get one line to describe yourself, I just wanted to give them one line. I mean, I could make it longer.

- Q Right. But if you give them one line, that's the line you give them. You're a health economist who focuses on vulnerable population and aging; right?
- A I mean, I do, I am a health policy expert, if you want to put it, who focuses on vulnerable populations, if you wanted one line.

- Q If you were going to redo it after today, you would redo it as that then?
- A I mean, I told you I wrote that, I think, 15 years ago.

- 1 Q You think it was 15 years ago? It could have been --
- 2 A Something like that. I mean, it could be earlier.

- 4 Q It could be more recent?
- A No, I don't think I wrote it -- no, definitely not more recent. It's at least 15 years old, that line. It could be -- again, I don't -- I think I wrote it before I got tenure, so it had to be at least 15 years ago.

8

- 9 Q Sir, you've already said that you've never practised medicine; right?
- 10 A That's correct.

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- 12 Q And again, you've agreed you're not board certified in any medical field?
- 13 A Yeah, I don't practise medicine at all.

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- Q And including you've never completed an infectious disease residency or diagnosed or treated --
- 17 A No, I do research full-time, and have done for my entire career.

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- 19 Q You're not a virologist? You don't study viruses?
 - A I'm not a virologist, but I do study viruses.

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- Q You don't have a specialty in public health, public health medicine?
- A I'm not sure what you mean by "specialty." I published in public health for basically my entire career.

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- Q One of the affidavits that Alberta filed on July 12th was by Dr. Hinshaw. Do you know who Dr. Hinshaw is, sir?
- A Yes.

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- 30 Q She's the Chief Medical Officer of the Province Of Alberta; right?
- 31 A Yes.

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- And her affidavit, Doctor, does describe a little bit what the specialty of public health and preventative medicine is and involves, and that she has a specialty in, and that's what I was referring to when I asked you that question. Do you understand the question now, sir?
 - A Do you mean am I board certified in a public health certify or some agency --

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- 39 Q That's right.
- A I mean, as I said, I published numerous peer-reviewed papers in public health.

- 1 Q Right. So the question is -- sorry, go ahead, sir.
- 2 A Yeah. I mean, that's the basis on which I say that I'm an expert in public health.

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- Q Right. And I just, the question that you said was I asking you, was what I was asking you. In Canada, I understand, it's a specialty of public health and preventative medicine, I believe they have something equivalent in the United States, and that was my question. You do not have that specialty?
- A I mean, if you're -- okay, I guess I've answered.

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- Q Fair enough. You've not done epidemiology, doing surveillance work of diseases for government, sir?
- A No, actually, that's not true. I worked with the US Food and Drug Administration on vaccine safety and on biologic safety.

14

- 15 Q And what is --
- A I worked with (INDISCERNIBLE) for medicare and medicaid in the US on quality of care and health outcomes measurement. So that's not accurate.

18

- Q Well, how about managing any COVID pandemics in any jurisdiction? You haven't done that, have you, sir?
 - A I'm not sure what you mean by "manage." I'm not a member, I don't work for a government, public health agency that's, like, a local public health agency in the sense of Dr. Hinshaw, is that what you're asking?

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- Q Right. Somebody who manages it or is responsible as the Chief Medical Officer of Health for a province or state --
- A No, never, (INDISCERNIBLE) Chief Medical Officer. I mean, my primary reason I opine on this is because of my expertise involved in reading the literatures, publishing the literatures, including peer-reviewed journals over decades.

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- Q And you have no expertise -- sorry, was --
- A No, I didn't say anything.

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- Q My apologies. You have no expertise in psychiatry or psychology; correct?
- A I mean, I published, I think, papers in psychology and psychiatry. But I'm not -- again, I think you're trying to make a distinction between training and clinical practise versus research. I have research expertise, not clinical practise expertise.

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- Q You're not a psychiatrist? Your not a psychologist? And you're not trained as one?
- 40 A That's correct.

1	Q Yes. Could we, Mr. Trofimuk, could you bring up document 1, please.		
2			
3 4	Dr. Bhattacharya, I'm going to put what I understand is another one of your, I'll call it		
5	CVs. I think it's Bhattacharya Researches, is what it's called. And it's off the Internet, and I pulled it up last year. It's very long, it's about 99 pages, and we won't go through		
6	it all. But once it gets up there, I just wanted to ask you about it. There we go. It		
7	should be in front of you, sir		
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9	THE COURT:	Mr. Parker?	
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11	MR. PARKER:	Yes.	
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15	MD DADIZED.	War and Walne making a man 4h at hala ha m	
16 17	,		
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19	·		
20	THE COURT:	Okay.	
21		, and the second	
22	MR. PARKER:	Or would you like me to do it as we go, Justice	
23	Romaine?		
24			
25	THE COURT:	No, no, just wanted to make sure that you had	
26			
27	O MP DARWED		
28	Q MR. PARKER:	And, sir, is this something you recognize, what's	
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30 31			
32	updated it was 2015, but yeah.		
33	Q Um		
34	A I don't remember specifically that date, I can check for you the last time I updated it,		
35			
36	2	1	
37	Q I see. So this is something that is a bit old, is what you're telling us?		
38	A Yeah.		
39			
40	Q Okay. The do you have something newer online that we should be looking at then,		
41	if we went to find your areas of research?		

1 A I think I --

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- Q Hold on a second. If we went to -- well, you go ahead, you know what the question is, go ahead, sir.
 - A I don't, actually. Can you, if you can repeat what you're asking.

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- Q Yes. I was just asking do you have something similar as this that's updated online? Something that shows your research areas and then sets out for peer-reviewed papers and other writings?
- 10 A I mean, I have my CV online, I can show you that.

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- Q We've got that already, sir, so we've got that as being filed here. So I was just looking for something else. So let's stay with this document. On the left-hand side, it says Research Areas, and then it has 22 items listed under it. And, sir, I understand that those are the various areas that you do research in; is that fair?
- A Those are a subset of the research areas I've done research in. Again, I think I last updated this website in --

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- 19 Q Sorry, I was getting some --
 - A -- (INDISCERNIBLE) -- yeah, I think the last time I updated this website was something, for this particular part of the research areas I was in, was 2015, but I could go back and check.

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- Q So if there's areas that are not on here, those are areas of research that you got into just in the last five, six, seven years then, if this was updated --
 - A Not necessarily. Because, I mean, when I wrote the Research Areas list, I was constrained by the, I mean, I was learning how to program in java script. I took this as a project. So the list of research areas, there was a limit in my technical ability to add a whole bunch of them, because I couldn't put a scroll bar in.

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- Q I hate when technology does that to you, sir. Sorry, there was a lot of feedback there, and that's why I was putting my hand up there --
- A I'm getting it, too, I don't know what's going on. It's not on my end, I don't think.

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Q I'm not taking responsibility either, sir, so I guess we'll keep going, and let those other folks fix it.

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- So these areas, then, research areas at least, I see there's a 2016 paper on here. Again, I've only got in front of me the first 11 pages, but --
- 40 A Yeah, I see that. I don't remember the exact date. But it was before the pandemic was the last time I updated it --

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- Q Oh, actually, if you go to 17, that's 2018, so that's only, I guess, just over three years ago?
- A Like I said, I don't remember exact dates of when I updated it. It was definitely before the pandemic. I haven't had time to look at this during the pandemic.

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7 MR. PARKER:

ask. Thank you.

Justice Romaine, I'm getting a request from my colleague to ask the Court to mute again. I hope that's something that is okay for me to

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- Sir, yes, thank you. 2018 I see on here. So Q MR. PARKER: this -- and sorry, the 2018 --
- A I mean, if you want, I can try to find out when the last time I actually updated it. I think I have the dates here, just a second. If you want?

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- Q Well, if you know, that's fine. I don't really want you looking at anything right now, unless we put it in front of you, sir. So we'll just go with what's on here, and I see 2018. So we know it was updated at least last in 2018. And that is, I see that date on item 17, if you could scroll down, Mr. Trofimuk --
- A Yeah, I don't remember the last time I updated it, but it was before the pandemic, that I know for certain.

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- Q But in any event, these research areas on the left-hand side -- sorry, we're taking you to show it to you now, and maybe we haven't -- it's number 17 -- oh, there it is at the top, sir. It's a forthcoming book, I guess --
- A Yeah, so again, I don't remember the exact date. If you want, I can look, but 2018, Forthcoming mean, it was likely, it was going to be published in 2018. So it could have been 2017 I put that. I don't remember the date.

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- Q Right. But let's go back to the research areas on the left-hand side. Those, I'm going to suggest to you were your major research areas at the time, and that's why they're listed, and medicare is first, because that's maybe your primary area; is that fair?
- A No, I didn't pick it in any particular order.

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- Q Okay. But of the 22 that are on here, at least when this was last updated, it's fair to say that those were the areas that you felt were your major areas of research, and that's why they're on here?
- A Those were areas where I had prominent publications that I -- I mean, again, I picked 38 them based on my CVs that were available at the time. I don't remember exactly the 39 reasons for putting just those. As I told you, there was a limitation based on the 40 technology of how many I could put. 41

Q Okay. Let's go to your CV, sir, and that is, it's page 7 of 2,300 that we'll find that at, so we'll bring that up for you, sir. And could you, actually, let's go to page 14, please, Mr. Trofimuk. I'm going to start with Number 77 on this list, sir. Do you see that? Regional Growth and Medicare Spending?

A Yes.

- Q And I will admit I have not read that paper, sir, but I sure sounds like from the title that that has to do with growth in regional medicare spending. Would that be a fair description of that particular article?
- A I mean, the purpose of that article was to address a very clinical point. The issue is that in the United States different regions have different practise patterns and outcomes, so that two patients with the identical condition can get very different treatments in the US medicare program in different areas. And so the question was -- I mean, yes, it addresses spending -- but the primary reason to address spending and the motivation for that paper was to address why two patients, identical in other ways, might receive different treatment in different parts of the United States, and how that's changed over time.

- Q Let's go to the next one, 78, and The Relationship Between Commercial Health Care Prices and Medicare Spending and Utilization. Again, sir, I'm going to suggest to you that this is an article, the focus of which is on health care prices and spending?
- A So this is the same line of research that led to number 77. It was part of a National Academy of Sciences report, looking at regional differences in medicare. And in particular, as I said, why two patients, other identical, would receive different care in different places, different services and different management. And so this was looking at a comparison of how someone who is not on medicare, but maybe close in age to someone who is on medicare, would, what kind of care they would receive versus someone who is on medicare, and whether there was any correlation between those two. And where it's also the case where there were differences in the way people are treated, you know, patients are treated. You know, again, while the title says Prices, and you're going to say it's economics, but it's really about is how patients are treated. That was the motivation for the paper, and that's the motivation for this line of research.

Q And 79, sir, if we go to the next one, CMS Reimbursement Reform and The Incidents of Hospital-acquired Pulmonary Embolism or Deep-vein Thrombosis. Sir, the Centre For Medical Services, again, something that deals with how medical outcomes with influenced by financial issues; is that a fair description --

40 A No.

1 Q -- of it? No?

A CMS is the federal government organization that implements the medicare program in the United States. So it's the organization that implements how elderly people and disabled people receive health care in the United States. And they change, they introduced a policy that essentially penalized hospitals that had high rates of deep-vein thrombosis or pulmonary embolism and (INDISCERNIBLE) patient population acquired inside the hospital. Because that's generally seen as bad medical practise. And so the question was how did that change, actually result in patients experiencing pulmonary embolism or deep-vein thrombosis in those hospitals, in hospitals across the US, for medicare patients and for disabled patients -- or elderly patients and disabled patients.

I mean, you'll see this over and over again. If you're going to say the word "Prices" and "Money," every single one of my papers, I'd say, is focussed on health outcomes and how various systems produce or don't produce health outcomes. That's the primary focus of my research. When I write about vulnerable populations, it's how constraints of all sorts result in good or bad outcomes for patients. What I care about is patient outcomes.

- Q You're a health economist who focuses on vulnerable populations and aging; right? If you've got to describe yourself, bottom line --
- A Health policy, I'm a health policy analyst. I do health policy work. I mean, I do epidemiological work because I, that's an incredibly important contributor to those outcomes. And if you go back through my CV, up above, you'll see one of my very first papers on HIV, of H1N1, as I said --

- Q And how long ago were -- take me to those, sir. When were those? Those were quite some time ago, weren't they?
- A Well, if you look at number 82, right there, it's already on the same page, just because I noticed.

- Q M-hm, Out of Pocket Health Expenditures and Antimicrobial Resistance in Low and Middle Income Countries.
- 34 A M-hm.

- 36 Q Again, looking at health expenditures?
- A Looking at antimicrobial resistance, so how is it that doctors overprescribe antibiotics, and what does that do to the health of people who live in poor countries.

- Q So take me to the H1N1 and the HIV material, because it was some time ago, no?
- A HIV was in the early days, like, when HIV was -- let's see...

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- Q I see number 43: AIDS and Declining Support For Dependent Elderly People in Africa, Retrospective Analysis Using Demographic and Health Surveys, 2010?
- A Yeah, I did that. And then I had another one, let's see, in 2018, 111, Systematic Identification and Correlation of HIV Infection. Then I did, like, one of my very first papers on HIV was on mortality of HIV patients, number 6, from 2001. Let's see, the last HIV paper was, I think, 2018.

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- Q Sorry, that's where on the list, sir, did you say that was?
- A I think it was 111. 10

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- Q Got it, thank you. Sorry, your colleagues, Eran Bendavid -- and I got to get this name right, because I've seen you pronounce it -- John -- I can't do it. Can you --
- A Johnny Ioannidis.

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Q Johnny Ioannidis, thank you. Johnny Ioannidis -- I'm not going to get that right again here, but okay -- so you wrote that paper with those folks in 2018.

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Let's go back to where we were on the list, and that was number 85, please. And, sir, number 85, Physician Spending And Subsequent Risk of malpractice claims. Do you agree that that has something to do with financial issues around health care?

22 A Again, what I'm primarily interested in that is why patients, whether the incentives 23 that patients have to treat patients well, and not, and take care not to have 24 malpractice -- to engage in practises that yield, you know, that we characterize as 25 malpractice.

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- Q 86, the next one, has to do with the Affordable Care Act, Colorectal Cancer Screening in the era of the Affordable Care Act. Again, dealing with matters --
- A Because --

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- 31 Q -- involving -- sorry, go ahead, sir. 32
 - A No, please, finish your question.

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- Q Again, dealing with matters involving health insurance, right in government programs providing health services to the population; is that fair?
- A No. It has to do with colorectal cancer screening. It's in the era of the Affordable Care Act because the incentives to conduct colorectal cancer screening changed from the previous era before the Affordable Care Act. So it's identifying an era, but the primary focus of the paper is do women -- or do men and women have, receive colorectal cancer screening at affective rates?

- Q Sorry, number 88, if you could go there, sir. It's Geographic Variation and Surgical Outcomes and Costs between the United States and Japan. Again, that looks like a paper that has a lot to do with costs; right?
- A Again, I mean, I'm going to have to say this over and over again, but the main purpose of that was geographic variation. Do patients, two patients -- one in Japan, one in the United States -- one in Hokkaido, one in Tokyo, do they receive the same care, you know, if they're otherwise similar? Same thing in the United States. And is question was, are the treatment of patients and how they're managed, is geography more important in the United States or in Japan? So the costs there are a proxy for asking whether patients are receiving similar care.

And then we --

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Q 89 ---

A -- specifically look at outcomes to see if there's variation across regions, so not just whether they receive the same care, but if they have the same outcomes, or similar outcomes. So does living in a bad zip code result in worse outcomes, and whether that's true in Japan, and whether that's true in the United States?

Q 89, sir, Hemodialysis, Hospitalizations, and Readmissions, the Effects of Payment Reform, sir. So again, you're looking at hemodialysis, but the effects of payment reform. So again, this is an article dealing with how payment impacts on a particular type of health care process; correct?

A Health care outcome, like, whether patients who are on dialysis -- dialysis means you're in kidney failure, and you need to have your, you know, essentially blood cleaned every few days -- whether the, how medicare -- which is, like I said, how the United States cares for the elderly -- how medicare, the incentives created, whether it produces good or bad outcomes for patients in that situation.

I mean, you know, just generally, I think characterizing this as just financial is a big mistake. It's, it shows that, if you think of it that way, you don't understand deeply how tightly connected the constraints that both physicians, hospitals, doctors, and patients face, as well as governments have on the outcomes of patients. That connection between those, those constraints and the outcomes is so tight and important, you can't think about this seriously without considering, you know, all of those aspects.

- Q So are you agreeing with me that these articles we've been going through, a significant part of what they deal with is the cost of health care?
- A No, I'm disagreeing with you, sir. I mean, I think what I'm trying to tell you is that in many of these articles, and some of them do directly deal with just finances, but the

vast majority of them, the reason for looking at finances is because they're an important input into patient outcomes, just as, you know, clinical decision-making by doctors (INDISCERNIBLE) input into clinical outcomes.

Q And again, 92, Effects of Physician Payment Reform on Provision of Hemodialysis. So we're talking about dialysis, but again it's the effects of physician payment reform. So payment reform, so how changes in physician payments have had some effect on kidney dialysis? That's a fair description?

A Again, we are primarily concerned with what happens to kidney dialysis patients, and to need understand what happens to them, you have to understand why physicians act the way they act. And payment reform has effects on that. Like, I don't really understand how you could characterize that as just a financial matter. It's not just a question of, like, do tax payers have to pay for this? My primary concern is the outcomes of dialysis patients in that paper, the clinical outcomes.

 Q Number 96, sir, is Social Isolation and Medicare Spending Among Older Adults, Objective Social Isolation Increases Expenditures, While Loneliness Does Not. Again, sir --

19 A Again --

- Q -- from the title --
- 22 A Again --

Q -- from the title of that paper, sir, at least in part, you will agree that it is dealing with medicare spending and how it is impacting on certain older adults; right?

A No, it's the other direction for that one. The question is how do, how does social isolation contribute to sickness in older people, and I'm looking at medicare spending as a measure of how sick these patients are. So once again, here it's a little different than what we've been discussing. Here I'm not looking at the incentives created by medicare policy. Here I'm looking at social isolation -- which is a very important problem in elderly people in the United States, and elsewhere, actually -- and I'm looking to see how that affects the health of these patients over time. And it is a very very good way to look at that is by seeing how much they spend on health care, or how much is spent on what they have on health care.

- Q And if we go to 98, sir, Hemodialysis in the Prospective Payment System Era. Again, this is dealing with how payment of this process is affecting health outcomes; correct?
- A It's how payments are structured. So, you know, if you want to understand how patients on dialysis do, you have to understand the incentives that physicians and hospital systems and dialysis centres face. And again, the primary reason for that paper is to improve the outcomes for, to help contribute to an understanding to

improve the outcomes for dialysis patients in the United States.

Q So I just want to make sure I'm clear on this. I asked you the question, this paper, number 98, deals with how the payment of this process is affecting health outcomes, and you asked you if that's correct? Is that correct or is that incorrect?

A I guess I don't understand the set-up of your question, that's why I was trying to ask you about this. So a prospective payment system means rather than paying providers, you know, on a piece-rate basis, you say, Okay, I'm going to give you, you know, \$1,000 to manage this patient over a certain period of time.

The question is, do patients who are under the management of providers who have that incentive, do they have better outcomes in terms of their, you know, variety of clinical outcomes, than someone who is under the management of the patient that is paid of a piece-rate basis? And so that is the era, the payment era that we're referring to, and the question is how have clinical outcomes changes for patients, dialysis patients, during that era?

I don't really know how to answer your question, given that that's the backdrop. Your question, the premise of it, doesn't make sense to me.

Q Well, the reason I asked it and asked it again, sir, is you were asked the exact same question back in May of last year, and I answered, That's true. So -- and I can take you to the transcript, if you would like me to?

A Yeah, but see, like, you also read to me the conclusion that was drawn from that by saying that was true. So I realized I needed to make a fuller answer here. I really don't understand the idea that this is just about finances. That is not true. This is not just about finances.

Q It was the same words that you were asked in May, that you answered, That's true, but now you're not answering That's true.

 A That's because I understand how you're planning to use this. You're planning to use this to say I only care about finances, that's false.

Q So how I'm planning to use this evidence in my argument will affect what evidence you give? Is that what you're telling us?A No, I'm trying to make a full answer. So if I say just the words, "That's true," Does

this concern perspective payment era, yes, that's true. That's what I meant. Does it, what does that mean actually? You have to understand the premise of this. And the premise is that the way that these payments systems are structured have an enormous effect on the well being and lives of these dialysis patients. They get cared for well or

41 poorly on the basis of those incentives. That's what the paper is actual about. So to

call it just about financial matters is a big big mistake, that's just false.

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- Q Number 101, sir, that's entitled Effect of Medicares Non-payment Policy on Surgical Site Infections Following Orthopaedic Procedures. And, sir, again, that's medicare and how medicare is impacting on surgery; correct?
- A So again, that's an overly simplistic characterization of the paper and what it's about. The paper is about whether orthopaedic surgeons take more or less care when the hospitals that they work for are penalized if the patient outcomes, if they get surgical site infections after the, after a surgery. And so medicare changed the policy so they would penalize hospitals if they got too high a rate of surgical site infections. And the question was did the outcomes of the patients under a management of these hospitals and these orthopaedic surgeons improve or not after medicare did this . It's not primarily a financial matter, it's primarily a clinical matter: Did the patient outcomes improve? Did the inputs that led to the patient outcomes, were they a good or bad set of inputs?

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To characterize this as a financial issue is a vastly oversimplification, in fact, I think it's just misleading. This is about patient outcomes, primarily and foremost. That's been true for basically my, almost any paper you pick in here almost, that's, I'm going to be able to say the same thing for, because that's what I care about. That's why I've, that's the basis of my whole research career, vulnerable patients, seeing how they're treated, trying to understand how to improve their lives.

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- Q Well, I'm just asking you questions about these articles you've written, sir, I'm not trying to mislead anybody. You understand that; right?
- A I mean, I can see how my words were used in the Manitoba case, you asked me specifically, you read that very misleading statement that I'm only caring about financial matters. That's just false.

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Q Let's go to 107 on the list, sir: Medicare Savings From Conservative Management of Low Back Pain. Again, you're concerned about back pain, outcomes of low back pain, and how that is related to how medicare spends; correct?

33 A So once again, I'm primarily concerned about the well being of the patients here. So the problem here is that there are very strong well-evidenced guidelines that say you 34 35 shouldn't be getting CT scans early in the management of a patient with low back 36 pain -- and I know Canada, for instance, has the same kind of guidelines. And the question is whether meeting those guidelines results in better outcomes for patients? 37 38 Better outcomes for patients in this case means less spending on health care. Because if you are spending less, it means you've had a better health outcome, you don't need 39 40 health care spending. So health care spending is a proxy for the outcomes of patients with although back pain, and whether the implementation for these guidelines -- which is not to do aggressive CT scans and other imaging early in the management of the low back pain, whether that leads to better outcomes or not, for patients.

The spending is a proxy for how well these patients are doing.

 Q If we go to 109, Market Competition and Health Outcomes in Hemodialysis. Again, this is about dialysis, but it is also about the issue of market competition. How competition in the health field is impacts dialysis patients; correct?

A Mr. Parker, we can do this every, we can do this all day. This is exactly the same issue over and over again. What I'm concerned about here is whether, if there's a market where there's just a very very few set of providers -- like, the dialysis market is not particularly competitive -- whether that results in better outcomes for the patients. So if you essentially a monopoly set of providers, will they provide worse care for the patients at large? So that's, this is primarily about whether these dialysis patients, whether they have better or worse outcomes if they're sitting in markets that are more characterized by monopoly, rather than competition across the providers.

- Q Well, let's go to work on HIV and AIDS, Sir, and number 6, you'll agree is HIV?
- A Number 6 -- was that the (INDISCERNIBLE) paper? No, that's the medicare -- okay, yeah. Yeah, that's HIV.

Q 2001, sir?

A Yeah. So that paper is about whether the coverage, in 2001, it was about, the drugs to manage HIV patients that had transferred HIV from essentially a death system to a manageable disease was just about six years old. And there were many states in the United States that for poor HIV patients were not covering those drugs adequately. And so the question was did the coverage of those drugs, if a state covered those drugs, it was like giving life to poor HIV patients, what effect did it have on the long (INDISCERNIBLE) spending?

And actually, it turns out it likely saved dollars, it saved money, because it resulted in better health outcomes for those patients. End-stage HIV was a deadly terrible disease, with people dying of (INDISCERNIBLE) sarcoma, toxic prosinosis (phonetic), pneumocystic (INDISCERNIBLE) pneumonia, a whole series of really really costly conditions that were difficult to treat and resulted in death.

 So it was, that paper was trying to make the point that by covering patients with these highly active retrovirals -- that's what they were called back then -- that you would actually save money, because you would had better patient outcomes. It was making the argument for improving the patient outcomes for poor HIV patients.

- 1 Q Okay. The next one -- I'm sorry?
 - A Yeah, at least that was the implication of it, you know.

 Q Number 9 is the next on here, I think, that deals with HIV or AIDS, and that one is the Effect of Insurance on Mortality in an HIV And Population and Care; right? So again, it's HIV, but it's the effects of insurance. So you're looking at the insurance market; right?

A So again, it's, this is HIV. But actually, this is in the *Journal of the American Statistical Association*, it's actually an epidemiological point. The epidemiological point is if you just looked at patients who were on, who were insured and uninsured, you would find this very weird statistical puzzle, which is it looked like insured patients were more likely to die than uninsured patients in the data in whenever it was published, 2001. So the statistical part was you cannot from that, infer that insurance kills patients. And we showed that, in fact, if you looked at the timing correctly, insurance saved lives.

Q And then the next --

A So (INDISCERNIBLE) point, not a statistical point. It has to do with selection of patients and timing. So what happened is that patients with HIV would qualify for insurance late in their disease. By then it was sort of too late. And so you were comparing patients who were early in the disease, insured, working, and had had health insurance, against patients who were late in their disease, so sick they could no longer work. And if you looked and just did a correlation -- which many people had done previously -- you would find this weird thing where the insurance correlated with the worse outcomes. In fact, that was a statistical.

If you used the methods that we adopted in the, or developed in that paper, you would find the truth. Which is that insurance saved lives. That, in fact, the coverage of patients, or treatment of HIV patients with these highly active retrovirals, would save lives. The purpose of that was to say, it was an epidemiological point, primarily.

Q 18 is the next one that I believe is part of your research on HIV and AIDS, and that one is The Link Between Public and Private Insurance and HIV-related Mortality. So that is saying private insurance is better than public insurance on mortality for HIV; right?

A Did you read the paper? Because I don't, that's not what it's saying.

- Q Okay.
- A What the paper is saying -- actually, it's delving into more detail on the process I just described. The time process by which HIV patients transitioned -- at least back then -- from private to public insurance. When they were healthy, you know, they first got

HIV, they were healthy, they were working, they were covered with private insurance, by private insurance. And as they got sicker and sicker, because they weren't managed well, they became so unhealthy they could no longer work and would qualify for public insurance. And so it was detailing that process and explaining why early -- I mean, the implication was that early management with this highly active retrovirals were an vitally important thing to save the lives of these patients.

46 is the next one.

- Q Let's go to 59, we'll skip over 46 here. I note you note that one. 59 is HIV Development Assistance and Adult Mortality in Africa. The impact of American HIV assistant programs on mortality; is that fair?
- A Yeah. Again, much of the HIV development assistance in Africa and the United States -- which took place in the first decade of the 21st Century -- focussed on the provision of these highly, you know, these very affective medications to manage HIV. And the purpose of that paper was to evaluate how well those programs had done in actually saving the lives of Africans. I don't know if it's this paper or a previous one, but there was a paper relating to this line of research, where you estimated that the, the PEPFAR program -- which is one part of the development assistance the US sent to Africa in providing HIV drugs for poor patients in Africa -- saved on the order of a million lives over the course of only a few years as a result of that program, sending HIV drugs to these, very affective antiretroviral drugs to HIV patients in Africa.

Q Thank you. 111, please, if we could go there, please. And again, this is Risk Factors for HIV in Zambia, Including Breast Feeding and Widowhood. Is that a fair description?

A So this is an epidemiological paper. So this paper has to do with trying to understand -- well, okay, so there's a little bit of technical background here. There's a technique called genome wide association survey is that looks to see how variations in the genome correlate with diseases in the real world.

Patel, the lead author of the paper -- my former student -- developed a method to expand this idea beyond just genomic differences, but to environmental differences, which include, you know, could be breast, it could be many things. The idea is to generate hypotheses for what correlates with disease outcomes, beyond just genetics. And so this is an application of the method that Patel had developed while he was a student with me to this problem of HIV outcomes in Africa.

- Q Thank you. So I think we've gone through the HIV papers, and I counted eight; is that correct?
- 41 A I don't, I mean, I don't, I lost count.

1 2 Q Sure. Let's move on to papers you've written, you've done some work on flu viruses; 3 is that correct? 4 A Yes. 5 6 Q Number 69, Avian flu? 7 A Yeah. 8 9 Q And number 72 --A Yeah, so that's a purely, again, epidemiological paper, aiming to find what predicts 10 bad outcomes -- 69 -- for flu, H5N1 infection. 11 12 13 72 ---14 15 Q 72. 16 A Yeah, so again that has to do with the seasonal at this of H5N1 --17 18 Q And those are the --19 A That's a purely epidemiological paper. 20 21 Q And those are the two papers that I found on here dealing with your work on flu 22 viruses? 23 A No. There's also -- there's more. So I've done work on influenza vaccination. So, for 24 instance, 45. And in particular --25 26 Q Right. 27 A -- this has to do with media influences on whether, incentives for people to seek flu 28 vaccination, you know, during a typical season. 29 30 Q And again, it deals with medicare coverage, timing, and annual receipt of 31 (INDISCERNIBLE) --32 A Using that for data, but it's among medicare elderlies. It's really, the question is not medicare coverage, it's to two the patient population of the elderly. In the United 33 34 States, medicare is the one universal federal health insurance program. I covers all the elderly in the United States. The world "medicare" was just to describe the fact that 35 36 we're analyzing the elderly. 37 38 There's also a paper that I didn't publish but is a pre-print, a working paper. Number 39 12 in the non-peer-reviewed work section.

41 Q Yes, sorry, what page is that on, sorry?

1 A I don't have the page numbers. Go down to the bottom. 2 3 Q Yes, sorry. 4 A Closer to the bottom. 5 Q Non-peer-reviewed papers, right, I'll find it. Sorry, sir. What number was it, sir? 6 7 A 12. 8 9 So this paper uses a model very similar to the kinds of models that are used to forecast COVID, they're called compartment models or SRI models. 10 11 12 O M-hm. 13 A And it was on, in this case, during the 2009 and 2010 H1N1 flu epidemic. We 14 developed a model like this and tried to understand how high rates of disease in an area resulting in voluntary self-protective behaviour, and what that meant for 15 forecasting. 16 17 18 Q Compartment models, you've also, I believe, done compartment models in the COVID 19 context: right? 20 A Yes. 21 22 Q You did one last year, published, I think --23 A 2001 (sic) -- something like that. 24 25 Q -- December 1st, 2020; right? A Yeah, that was in 2020, with some folks at Stanford. 26 27 28 Q Right. And so, I mean, you do do modelling, obviously? It has its purpose; is that 29 fair? 30 A Yeah. 31 32 Q It's dependent upon the parameters though? A Yeah. I mean, models are, I think, very useful to help think about, like, the key 33 aspects of trade-offs and things, if modelling is done right. I think they're much worse 34 35 for forecasting purposes, but that's another matter. 36 37 Q The topic of COVID-19 has certainly, you'll agree, been engaging researchers around 38 the world for the last two years, hasn't it? 39 A Yes, it has. 40

Q Many many papers being written on many many issues that relate to COVID-19;

1 right?2 A Yes.

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Q I want to read a quote to you, sir, and let me know if you agree with this: (as read)

Total lockdown is a bundle of dozens of measures. Some may be very beneficial, but some others may be harmful. Hiding uncertainty can cause major harm downstream and leaves us unprepared for the future. For papers that fuel policy decisions with major consequences, transparent variability of data, code, and named peer-review comments is also a minimum requirement.

Do you agree with what I just read to you, sir?

A I think peer-review is quite important. I think that lockdown is a bundle, and I think, I mean, I think the vast mix of that I agree with. And I think it would come down to what I mean by the details of specifically what you had in mind.

Q This is from John Ioannidis paper, Forecasting For COVID-19 Has Failed. And this quote is taken from 675 of 2,300 of your expert report. And so I was taking it from there, sir.

A I mean, in that context, I agree completely. I think the modelling that's used to make public policy decisions absolutely should be transparent. That's been a failing of how the modelling that the governments have used to decide things, that they have not been particularly transparent in the assumptions they've not made code available, they've not made, I think, John is absolutely right in that.

- Q Do you agree, you said lockdown is a suite of measures, do you agree that some of those measures may be very beneficial, while some may be harmful?
- A It's an empirical question, which of these measures of helpful or harmful? And each measure should be evaluated thoroughly for both its harms, both its potential harms and its potential benefit, rather than just assuming it's a good idea because we have a pandemic at hand.

- Q Right. "Some may be very beneficial," was Mr. Ioannidis' quote that I read to you. So some of the suite of lockdown measures may be very beneficial, do you agree with that?
- A I agree that it's, in principle possible, that I may be beneficial. The question is an empirical one that needs to be evaluated carefully by governments instituting these if they're going to be ethically, taking ethical action. They can't simply assume that it's beneficial. They have to do a careful evaluation before implementing these kind of actions to decide whether the evidence indicates it's likely to be beneficial. Because

many of these lockdown actions also have harms -- all of them have harms -- and so you have to account for both carefully before you decide to implement them, and why you're deciding to continue them, if you're going to be taken ethical public action.

Q What about the last sentence I read to you: (as read)

For papers that fuel policy decisions with major consequences, transparent availability of data, codes and named peer-reviewed comments is also a minimal requirement.

Do you agree with that, sir?

 A I mean, I think especially if governments undertake action on the basis of a particular piece of scientific work, I think they have an absolute obligation to make available to the scientific community the reasoning.

- Q That wasn't my question, sir. The quote that I read to you says "for papers."
- A Sorry, I can finish. So yeah, I agree with that --

- Q Well, then that -- okay, thank you.
 - A -- but whether or not -- I agree with that that quote might be part of it. I agree that it is absolutely important for those papers on which governments undertake action to have that aspect, absolutely.

- Q So if a paper is going to fuel a policy decision with major consequences in the COVID-19 pandemic, because it's going to make government change its policy, then that paper should, at minimum, have transparent available data code and peer-reviewed comments; you agree --
- A Yeah, just so we're clear, I think John is writing in the context of these SIM models, these compartment models that have been used to drive government policy for two full years in almost every province or state on earth.

- 32 Q Well --
 - A And most of those have not --

- 35 Q -- what --
 - A -- had any papers behind them. They have not made available, they have not made available papers. They've not even made available their assumptions. They just put the outputs of the forecasts. And so what he's complaining about there I completely agree with. It is not responsible to take action on the basis of completely non-transparent forecasts that do not make available to the scientific community at large what assumptions are aligning with the forecast.

Q And peer-reviewed comments, you agree that's a requirement, too, if papers are going to be used to try to change policy?

A Well, I think if the government is going to adopt it -- peer-review can take the form of many things. I mean, sometimes peer-review takes the form of comments put, essentially confidentially by peer reviewers in journals. I think it's appropriate for journals --

Q What does it mean on your CV when it says "peer reviewed"? That's the context I'm asking --

A So I think --

Q (INDISCERNIBLE) context of Mr. Ioannidis is making the statement, so in that context, sorry?

A I'm not sure exactly what John meant by "peer reviewed" in that context. I'll tell you the context of peer reviewed on my CV and peer review generally in science has to do with the process by which papers are evaluated. Papers are evaluated when I send a paper to a journal. The journal then sends the paper to experts who then evaluate the paper and give a recommendation to that journal editor and to the author -- to me -- about changes, about whether the paper should be accepted, or whether it's important enough to be accepted or not. And then usually there's a process where you are change the paper to respond to the comments, it may go back to the peer reviewers. All of that process is generally not made public, and I'm okay with that. I think that peer-review process is fine. It doesn't have to be made public, that doesn't have to be made public. But there does have to be a peer-review process.

But there are, there's another set of, a different process --

Q Sorry, did you say there doesn't have to be a peer-reviewed process?

A No, with that I'm okay. That's the private, that's, like, the traditional peer-review process is behind the editor, the editor is essentially making the decisions -- editor is like a Judge making a decision on whether the paper is worth publishing or not. And the back and forth between the peer reviewers and the author are confidential. I mean, that happens in front of the editor, but not in front of the public.

I am okay with that process, because as long as you have a responsible editor and a robust set of discussions by the peer reviewers and the author, you are going to end up with a better paper that is vetted by the scientific community when it's published. It's not a guarantee that it's correct, but as a process, I'm okay with it.

There's a separate process, there's a second process that's developed over the recent

years called the peer pre-print process. There, what you do is you put the paper out into a pre-print server in public before it had been peer reviewed. I am also okay with that process. There, the process involves, you put the paper out, the public -- including many scientifics the scientists, can comment on and provide suggestions on the paper -- weaknesses, strengths.

Generally what happens then is authors will revise the paper in response to those comments in public, and there, the comments are public, the revisions are public. Often the goal for an author to put it for in pre-print is to get the paper in better shape so, that when it is sent to a journal, the journal is more likely to accept that, because you've already survived one line of peer review.

I'm also okay with that process. I think that process puts the peer reviews out in the open, and I think that is a good process.

I don't think that you have to have an open peer-review process automatically to make a paper good or bad. I think both have strengths, the closed and open peer-review situations have strength and weaknesses, two of them. I think they both produce good science -- both can produce good science.

- Q Thank you. And I think what you've just described is part of scientific method; right?
- A I mean, yeah. I mean, a scientific method is hypothesis -- the scientific method is hypothesis, you generate implications of the hypothesis you expect to see in the data. Then experiments to test whether the implications of the hypothesis are correct. I mean, that's how normally with the scientific method.

What we're talking about instead is not the scientific method, it's the process by which the scientific community evaluates ideas.

- Q Thank you.
- A Those are separate things, in my mind.

Q Thank you.

35 MR. PARKER: Justice Romaine, it's five after 3. I don't know if you were planning an afternoon break, but --

38 THE COURT: Yes. Let us take the afternoon break. 15 minutes or 20 minutes, Mr. Parker? What would you prefer?

41 MR. PARKER: 15, 20, either is good with me.

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2	THE (COURT:	Okay. We will do the 20. Thank you.
3 4	(ADI	OURNMENT)	
5	(ADJ)	JORNWEN I)	
6	THE (COURT:	Thank you.
7			2 2200222
8	Ok	ay, Mr. Parker? Are you ready to pro	ceed again?
9			
10	MR. F	PARKER:	I am, thank you, Justice Romaine.
11			
12	THE (COURT:	Okay.
13	0	MD DADWED	
14	Q	MR. PARKER:	Dr. Bhattacharya, I just wanted to ask you
15		-	e with the select special committee that we were
16 17		· ·	our earlier evidence about the evidence here being a quote in your exchange with Representative
18		-	to get that name wrong the representative who
19		was asking you questions that we dis	
20		was asiming you questions that we also	Cubbaca Curing:
21		And you had said you have "taken no	o money for any of my activities on COVID." Did
22		I get that correct?	
23	A	That's correct.	
24			
25	Q	Okay. The gentleman you mentione	d, Jet Blue, that was connected to the Santa Clara
26		- · ·	y oh, I just noticed Mr. Grey isn't back, Justice
27		Romaine oh, there he is. Thank yo	ou sorry, Mr. Grey.
28		OD TIV	
29		GREY:	Sorry, Nick, I was here. I just didn't have my
30	cai	mera on. I heard everything you said.	
31 32	MR E	PARKER:	Okay, great.
33	IVIIX. I	AKKLK.	Okay, gicat.
34	0	MR. PARKER:	Sorry, Mr. Grey was asking you about the
35	*		Clara in his qualifications of you, and he talked
36		÷	and Buzzfeed and so you know what I'm talking
37			ere was some controversy about the Santa Clara
38		study?	·
39	A	Yes.	
40			
41	Q	And just to get everybody in context	here, that's at both footnotes 8 and 29. Now, sir,

- there was a letter from lawyers, Stanford lawyers, related to this particular controversy; that's right?
 - A I'm sorry, I'm not sure what you mean by that? I don't know what you mean? There was a fact-finding mission by Stanford about the allegations made in that Buzzfeed article.

7 Q Right. Where --

A (INDISCERNIBLE) to that.

- Q Sorry, I had understood from your previous evidence in Manitoba, sir, I had understood there was a letter from lawyers, which I assumed was the lawyers from Stanford, that you had understood what was in that letter, and I wanted the know what was in that letter?
- 14 A I don't think it was from the lawyers. I think it was from the dean's office.

- 16 Q Okay.
 - A So I'm not sure which -- I mean, I'm not at liberty to delve off the entire letter -- they've told me not to, Stanford has told me not to -- but I can tell you the contents of it, which is --

- Q Well, before we do that, sir -- and I appreciate that, and we'll get back to the contents of it -- but we asked -- sorry, there's a letter, and who was the letter from, I just want to get that straight? It's not from lawyers?
- A I don't think it's from lawyers. It was from the dean, the assistant dean. Yeah, one of the deans at the medical school.

Q To who?

A To me.

- Q Okay. That letter, then, you know the contents of that letter; right?
- 31 A Yes.

- Q Okay. Tell us the contents of that letter, sir?
 - A So first of all, I was, they called it a fact-finding -- not an investigation. They found that, in a fact, that I did nothing wrong. And in particular, the allegation that made it in the Buzzfeed article, that the donation by Mr. Neeleman, who is the CEO of Jet Blue, to Stanford University for the conduct of that seroprevalence study did not alter the findings of the study or alter the conduct of the study in any way. That there was no wrong-doing whatsoever.

Q So we had asked your counsel -- well, we had asked Mr. Grey, counsel for some of the

applicants -- to get you to obtain that letter and produce it, and he said that they wouldn't do that, and so we said we'll go get it ourselves. And we decided not to do that, because we thought that you should be producing it, since it's something connected to an article that you've written and that you're relying on in your opinion.

So did you realize that the respondents had asked Mr. Grey to obtain that letter via you from Stanford to produce it in this litigation?

 A I was, I am not under any -- I cannot release that letter based on my employment relationship with Stanford. They have asked me specifically not to release that letter. So I cannot, I mean, even if I was asked, I am not going to produce it because I'm one of the (INDISCERNIBLE) employed at Stanford.

Q Okay. I had not approached them for it. I have spoken to somebody else that told me that they won't release it without your permission. But that's not your understanding?

15 A No.

Q Stanford --

A Stanford told me not to release it. And in fact, I want to release the letter, and I asked them under what circumstances I can write about this, but they told me not to release the letter.

Q It does seem that it would -- I saw you cross-examined on this in Florida, as well as Manitoba, and it seems like it would clear up a whole lot of air if the letter was released. And certainly, you get -- it seems to me in the cross-examination on this issue, you've been upset by it that you're even cross-examined on it. So I wondered why the letter wouldn't just be produced, particularly as the article is still being referred to in your --

A You would have to ask my deans at Stanford. I'll tell you that I'm still employed at Stanford. I had a meeting with the dean the other day, and they said they're glad to have me employed. I'm not, there's no cloud over my employment at Stanford whatsoever, and there's no truth to the allegation that \$5,000 from Jet Blue that was made by that Buzzfeed article, that first, that I got any money for it. I didn't. The money went to Stanford, not to me. And that I altered in any way the results of any study as a consequence of any donation. I've gotten money for many many studies over the years, from the NIH, from the FDA, from other, you know, foundations, and I've never once altered the results of a study on the basis of the funding.

Q Sure, yeah. No, I mean, to be fair, \$5,000 is a bit ridiculous to -- any way.

Mr. Neeleman, Jet Blue Airways founder and a vocal proponent of the idea that the pandemic isn't deadly enough to justify continued lockdowns. That's the gentleman

- 1 you're talking about, and that accurately describes Mr. Neeleman; right?
 - A He's a Jet Blue founder. As far as I understand, his idea about what the optimal policy is is focus protection, protection of the vulnerable.

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- Q Okay. And you have appeared on the Fox News program with Mr. Neeleman previously; is that correct?
 - A I think there was one appearance with him.

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- Q And was that, there was an appearance on April 12th, and then I think a couple days later, you were on the Tucker Carlson show on Fox News; does that sound right?
 - A You'll have to forgive me. These dates are blurred together in my mind.

11 12

- 13 Q Sure.
- A I've been many many places, pod casts, TV shows. I don't remember the exact dates for any of these things.

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- 17 Q And you're not paid for your time to go on Fox, are you?
- 18 A No.

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Q Thank you for explaining that, Dr. Bhattacharya. I appreciate that.

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I just want to -- my apologies, I'm not going to keep going through your CV, but I did want to ask you about the last number on the peer review. It's 141, and I'm not going to ask you about that whole stunk right now -- we'll get back to it tomorrow. It's, you're assessing -- what is the full name?

A Assessing Mandatory Stay-at-home and Business Closure Effects on the Spread of COVID-19.

28

- Q That's the one. And, sir, this was published, it seems -- well, it says January 5th, 2020.

 Again --
- A 2021, yeah. It's a stupid -- sorry, I apologize -- it's a typo. It should be 2021.

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- Q It's that New Year's thing, where we all think we're in the last year still for a week or something?
- 35 A Yeah, that's exactly what happened.

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Q But this one, on -- again, to Manitoba, this wasn't in the Manitoba primary report, and that was, again, dated January 5th. So your primary report in Manitoba date January 5th, is the same day that's on your CV in relation to this article, the 5th of January, 2021, the date we've corrected it to. Is that the date that that is published, then, or published online. What does that date represent?

A Yeah, that's the date of publication. The official date of publication, I think. I mean, that's what I try to put on all of my CV (INDISCERNIBLE).

- Q You were asked in Manitoba why did this not get into the primary report, it went in the surrebuttal report you filed there, and your answer was you believed it was undergoing peer review at the time of your January 5th primary report. Is that still your recollection?
- A Yeah, I think so. I don't remember exactly when I put this into the -- or the date that I found out it was published, but it's right around this time, maybe just a little bit after.

Q I want to take you back to the *Gateway* decision, and paragraph 183, please. And once we've got that up there, sir, this -- I'll let you read it -- it's Chief Justice Joyal's description of your evidence and how he feels that evidence fits into the overall evidence on the pandemic. And you'll see there, Chief Justice Joyal says:

While Dr. Bhattacharya's contrary and in some cases contrarian views are decidedly not a disqualification from an important role in what has to be a continuing and rigorous scientific conversation and method, the views of Dr. Bhattacharya need be seen as views and opinions that are not supported by most of the scientific and medical community currently advising on and formulating the ongoing public health responses to a pandemic that continues to threaten too much of the world's population.

Sir, do you agree that that's a fair description of how your evidence in *Gateway* fits into the overall evidence on this pandemic?

A I actually don't know. I once might have agreed with that. I don't agree with that any longer.

Q Oh, so your view is that your views and opinions are now in the mainstream; is that right?

A I think two things. One, I think that it's increasingly in the mainstream. Many many other scientists have spoken up along the lines that I've been arguing. Tens of thousands, for instance, signed the Great Barrington Declaration, scientists signed the Great Barrington Declaration. And further more, I think that at the time, there was an effort to characterize my views as a fringe, as fringe. Like, in particular, by the NIH, the head of the NIH, Francis Collins, wrote an email four days after I wrote the Great Barrington Declaration, calling me and Sonetra Gupta and Martin Kulldroff fringe epidemiologists. That was false. We're not fringe epidemiologists.

Then there was a concerted effort to make it appear that there was a consensus, scientific existence, that did not actually exist even then.

- Q I would think that whether you're a fringe epidemiologist was Mr. Collins' opinion, and I'm not sure that that could be seen to be necessarily true or false. It's just his opinion; right?
- A Opinions can either be true or false. I mean, I'm not a fringe epidemiologist. I'm a --

- 7 Q In your opinion?
 - A Well, no. I'm hired by Stanford University to work on and research epidemiology, among many many other things. Stanford generally doesn't hire fringe epidemiologists. I've been funded by the National Institute of Health for 20 years. Generally the National Institute of Health does not fund fringe scientific figures. So no, it's not opinion, it's just a fact, I'm not.

- Q And the, you would have once agreed with this, but anymore, would you have agreed with it back on May 2021, when the *Gateway* trial was going on?
 - A Yeah, I probably did. I probably would have. Again, the dates are...

- 18 Q Well, that was May 2021 is in the middle of --
- A I probably would have agreed with it in May 2021, that my opinions were in the minority.

- Q All right.
 - A I'm not sure, I mean, I'm pretty sure now that's no longer true, and I don't think it was true then either, at this point.

Q Well, sorry, were you -- I thought you said that back in May of 2021, you would accept that what Chief Justice Joyal said here is true, and you were in the minority. But --

 A I've not accepted -- I don't know if I would accept every word of what he wrote, but I would have accepted then that I was in the minority.

32 Q Right.

A I don't currently now believe that I was in the minority then, and I also don't currently believe that I'm in the minority now. I believe that it was a mainstream thought that had been suppressed, that many people had suppressed in part for fear of being called fringe by people like the leader, the head of the NIH, the National Institute of Health. So I don't think -- it's hard to say one way or the other whether it was minority or majority, when it was so difficult for so many scientists to express their mind openly.

Q Dr. Anthony Fauci has come out very much opposed to the Great Barrington Declaration; right?

1 A Yes, he has.

2 3

- Q What did he say about it?
- A He mischaracterized it as a document proposing to let the virus rip. The document does not say that, and nor do I support that. And he organized media campaign to characterize it that -- mischaracterize that way.

 Q And so just back to this, I think I've got what you're saying on this paragraph. Back in May, you would have thought then you are in the minority, but now looking back from this perspective to that time, you now think you were not in the minority --

A Well, I don't know --

Q -- and now --

A Just so we're clear, I don't know if I was in the minority back then. It was very difficult to tell one way or the other, given the environment that pertained in May, where many scientists kept themselves quiet for fear of being characterized as fringe.

- Q M-hm. You talked about the thousands that have signed the Great Barrington Declaration. You're aware there's the John Snow Memorandum that is from the other perspective?
- A I mean, there are many many perspectives, but yeah, I'm aware of the John Snow Memorandum.

- Q And it's also one that has obtained many signatures from many scientists and doctors; correct?
 - A It has. In fact, there was just a paper published today by John Ioannidis in the British Medical Journal comparing the citation counts of people in, who signed the Great Barrington Declaration and people who signed the John Snow Memorandum. The John Snow Memorandum argued for lockdowns and made the false statement that there is no immunity after, that there is no evidence for immunity after COVID recovery. That, it turns out that the people who signed the John Snow Memorandum and the Great Barrington Declaration have comparable number of scientific citations in their published work. But the John Snow Memorandum authors had more Twitter followers.

- Q So this, you realize, this isn't a contest to see who gets the most signatures, though, right?
- A No, I completely understand that. The question is whether the views were fringe or not, and --

41 Q M-hm.

A -- the point is that the Great Barrington Declaration was signed by very many prominent well-cited established figures who are very very far, who should not be calling them fringe. It's not a matter of opinion.

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> Q Well, if their opinion is that they are fringe, based on certain facts that in their view make them fringe, then --

A I wouldn't have agreed that I was fringe back then either.

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Q Just to this John Snow Memorandum and your comment, what the John Snow Memorandum says is: (as read)

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Further more, there is no evidence for lasting protective immunity to SARS-CoV-2 following natural infection. And the endemic transmission that would be the consequence of waning immunity would present a risk to vulnerable populations for the indefinite future.

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Do you say that's wrong?

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A Yes, that's false. It was false then, it's still false now.

19 20

Q So there is lasting protective immunity to SARS-CoV-2 following natural infection? A Yes.

21 22

23 Q Lasting?

> A Yeah, at least a year. I cited evidence to that effect from the peer-reviewed literature in my declarations.

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Q Well, John Snow Memorandum has cited evidence for their statement there, and maybe we'll go to that later. But in any event, I'll move on.

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I want to go to the definition of "severe outcomes" that is in Dr. Hinshaw's affidavit. And this is the basis, this is the justification, for the Chief Medical Officer of Health orders that have been put in place, and they're impugned in this matter. And I am going to read to you what Dr. Hinshaw says. And this is -- you don't need to bring it up -- but it's at paragraph 63 of her affidavit. And it says this: (as read)

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Alberta's objective, in common with all other Canadian jurisdictions, has always been to use the least-restrictive measures required to prevent or limit the spread of the virus; thereby, minimizing the number of serious outcomes in terms of both deaths (mortality) and illness morbidity, while balancing the collateral effects of public health restrictions and minimizing the overall harm to society.

Sir, do you understand that that was Alberta's objectives over the past two years, when it has made, when the Chief Medical Officer of Health has made the various orders she has?

she has?

A I mean, I understand that that's what she stated in the affidavit. I wouldn't say that that's actually was (INDISCERNIBLE) followed.

- Q Sorry, you're saying that when Dr. Hinshaw testified that that was Alberta's objectives, you disagree? That she's wrong? She's saying something that's incorrect?
- A No. I'm saying that if I'm looking at how, what Alberta has done, I don't believe that it has adopted the minimal necessary provisions in order to minimize the harm from COVID and the harms from the provisions adopted.

- Q Do you know what provisions Alberta's adopted and when, sir?
- A I mean, it's complicated. There's a long line of things -- and again, the dates, I'm going to get wrong -- but I've seen them in general outline, yes.

- Q Sure. Well, tell me about them, sir. I'm interested. Let's start in the second wave, and tell me about what you know about those restrictions?
- A I mean, I think we call it a suite of restrictions, focussed on lockdown kinds of provisions, with the aim of keeping people apart from one another.

- Q That's the specifics you know about Alberta's Chief Medical Officer of Health --
- A No, I can work through more specifics. I would have to refresh my memory about timing, and as you can see, I'm not very good with particular dates. But Alberta -- and I know Alberta has relaxed its provisions and put more, sort of, reenacted the provisions over time. It's a complicated story over two full years. I can give you more detail, but I'd have to refresh my memory about the specifics.

- Q Okay. The objective is two-fold, you'll agree, at least as stated: That is to reduce the number of deaths, and to reduce the illness morbidity. And the purpose of that is to stop the health care system from becoming overwhelmed. You understand that that's what Alberta has said its objective has been over the last two years; right?
- A I heard it was, I heard from what you read, that it was three-fold: To also minimize the harm from the policies followed.

Q Well, that's a fair point. I think that has to be, and has been balanced throughout in making these orders. So you're absolutely right, and that certainly comes through in Dr. Hinshaw's evidence.

But I wanted to focus on the reducing mortality and reducing morbidity, and I'm going

to suggest to you, sir, that your report doesn't deal with the issue of reducing morbidity at all. It doesn't mention it at all; right? It's all to do with mortality, reducing mortality; right?

A I'd have to look back in my report. In versions of reports that I've filed, I've mentioned, I've talked about morbidity as well. Morbidity from COVID is correlated very strongly with mortality. So morbidity is, one very good measure of this is the necessity of hospitalization, and it tends to be, it tends to correlate very strongly with mortality rates.

Q Well, let me read to you what Chief Justice Joyal said about this issue in the *Gateway* decision. And this comes from paragraph 314 of his decision, and it's the last sentence -- well, maybe I'll read to you just a bit more than the last sentence -- my apologies, I'll read you the whole paragraph to give you context:

In the context of considering the minimal impairment aspect of the proportionality inquiry, it is necessary to acknowledge and consider Manitoba's own approach to focused protection, which is no less concerned with the protection of the vulnerable. Manitoba's position however, and the position adopted by most other jurisdictions, is that the protection of vulnerable populations cannot occur without also reducing the extent of community transmission overall. It is only through the reduction of community transmission generally, that the rate of SARS-CoV-2 can be slowed in a community and in so doing, assist in the goal of preventing the overwhelming of the healthcare system and its limited resources. In this regard, Manitoba is right to point out that Dr. Bhattacharya's evidence focusses almost exclusively on mortality with virtually no mention of the impact that widespread community transmission has on hospitals and ICUs.

Sir, I'm going to suggest to you that Chief Justice Joyal was absolutely right when he said that about your evidence in Manitoba, and it is exactly the same in Alberta. Do you agree?

33 A No 34 wa 35 vu

A No, I do not agree. First, I don't agree that control of community spread is the best way to protect the vulnerable. Control of community spread has not protected the vulnerable in --

 Q I'm not asking you that, sir. I'm not asking you that, sir. I'm asking you why in your evidence as Chief Justice Joyal said in Manitoba, and as I'm saying happens in Alberta, there is absolutely no mention of the impact that community transmission has of hospitals in the ICU --

1 2 3 4	Dr. Bhattacharya is attempting to answer to spoken over him and interrupted his answer.	Madam Justice, this is Mr. Rath. he question, and once again, Mr. Parker has We would like to hear his answer.	
5 6		Parker, what do you have to say?	
7 8 9 10	MR. PARKER: asking. He seems to be willing to answer question that's put to	would like him to answer the question I'm uestions he wants to answer, but at times not o him.	
11 12 13 14	And the question I am putting to him is well with hospitalization, ICU numbers, and the overwhelming the health care system. There	hy is there nothing in your evidence dealing ne need for NPIs to reduce those to avoid s's nothing in your evidence, sir.	
15 16	,		
17 18 19	THE COURT: Of question has not been answered.	kay, hold on, hold on. I agree that that	
20 21 22 23	I also agree that perhaps there's too much over your next question, Mr. Parker. So would y has enough time to finish his answer. But	verlap between Dr. Bhattacharya's answer and ou please be careful to ensure that the Doctor I am sorry?	
24 25 26 27 28	MR. GREY: Ca heard two different questions. One was Dr. in his report about morbidity. And then I he wasn't anything about morbidity.	n I just clarify something, Madam Justice? I Bhattacharya was asked if there was anything and Mr. Parker rephrase that to ask why there	
29 30	So perhaps Mr. Parker could clarify that maybe he wants to ask both questions, but maybe he could just clarify that. Because I hear two different questions.		
31 32 33 34	2 MR. PARKER: You sorry, Justice Romaine.	ou know what? That's a fair point and	
35 36 37	THE COURT: Go clarify your question?	o ahead, then, Mr. Parker. Do you want to	
38 39 40 41	Q MR. PARKER: We no evidence in there, your counsel has in why don't you take me to where that's it	ell, let's start with the first one. I say there's terjected or counsel for the applicants so n your evidence, Dr. Bhattacharya. Let's go	

A Can I go back and complete the answer to the previous question?

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6 7 Q Well, either like you, actually, either like you to take me to the evidence on where you discuss this issue of mortality in your evidence, and how we protect hospitals and ICUs from becoming overwhelmed by wide-spread community transmission. Where is that discussed in your evidence, sir?

A Okay.

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Q Take me there.

A Okay. Can I just, do you mind if I complete the answer to the previous question? So --

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> 13 THE COURT:

Well, no, Dr. Bhattacharya, I would like you to answer Mr. Parker's question now. And then after that, we will clarify what previous question you would like to add something to, and then we will hear from counsel, okay.

15 16 17

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A Okay.

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19 THE COURT: So just concentrate on this question, please.

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A So I was trying to answer it previously. So as I said, control of community spread is not the primary way to control hospitalizations and deaths. The best way to control hospitalizations and deaths is protection of vulnerable populations. In particular, there's a thousand-fold or more gradient in the risk of hospitalizations and deaths from infection with the oldest population experiencing much much higher, exponentially higher, risk of mortality and death than younger populations.

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And so if you want to control the risk of mortality and morbidity, including hospitalizations, the primary objective to be to protect older populations from being infected or being unvaccinated when they're infected.

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So the primary way to control hospitalizations and death, the most effective way to do that is to take advantage of the fact that the biologist of this disease puts, unfortunately, that unfortunately putting older populations at so much higher risk of hospitalizations and deaths than younger populations. So if I'm going to point to where it is, I'll point to the Great Barrington Declaration. I may have put more in there -- again, it's been a year since I've written this, so I don't remember specifically, and I'd have to go search -- but the idea of controlling hospitalizations and deaths is part of the Great Barrington Declaration, which I believe is in the text of what I wrote -- I'd have to look up where the page was, Your Honour, to find out. But, those are not inconsistent with the proposals that I put forward to control hospitalizations.

And I should say, if THE COURT: Mr. Parker A I could THE COURT: hold on, sorry, Doctor. Mr. Parker, has that answered your question? MR. PARKER: No, it hasn't, other than apparently the answer the evidence is the Great Barrington Declaration the what I took for it, so I was going to	1 2 3 4	If you want to control hospitalizations, it's primarily the older people when they get infected that get hospitalized, not younger people. And so that is the idea of focussed protection. It's to control just mortality, but also hospitalizations.		
7 8 THE COURT: Mr. Parker 9 10 A I could 11 12 THE COURT: hold on, sorry, Doctor. 13 14 Mr. Parker, has that answered your question? 15 16 MR. PARKER: No, it hasn't, other than apparently the answer the evidence is the Great Barrington Declaration the what I took for it, so I was going to		And I should say, if		
8 THE COURT: Mr. Parker 9 10 A I could 11 12 THE COURT: hold on, sorry, Doctor. 13 14 Mr. Parker, has that answered your question? 15 16 MR. PARKER: No, it hasn't, other than apparently the answer the evidence is the Great Barrington Declaration the what I took for it, so I was going to		3 7		
10 A I could 11 12 THE COURT: hold on, sorry, Doctor. 13 14 Mr. Parker, has that answered your question? 15 16 MR. PARKER: No, it hasn't, other than apparently the answer the evidence is the Great Barrington Declaration the what I took for it, so I was going to	8	THE COURT:	Mr. Parker	
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Mr. Parker, has that answered your question? MR. PARKER: No, it hasn't, other than apparently the answer the evidence is the Great Barrington Declaration the what I took for it, so I was going to		THE COURT:	hold on, sorry, Doctor.	
Mr. Parker, has that answered your question? MR. PARKER: No, it hasn't, other than apparently the answer the evidence is the Great Barrington Declaration the what I took for it, so I was going to			, , ,	
15 16 MR. PARKER: No, it hasn't, other than apparently the answer the evidence is the Great Barrington Declaration the what I took for it, so I was going to		Mr. Parker, has that answered your quest	tion?	
MR. PARKER: No, it hasn't, other than apparently the answer the evidence is the Great Barrington Declaration the what I took for it, so I was going to		1		
the evidence is the Great Barrington Declaration the what I took for it, so I was going to		MR. PARKER:	No, it hasn't, other than apparently the answer,	
· · · · · · · · · · · · · · · · · · ·			**	
18 tollow-up on that.	18	follow-up on that.		
19		1		
20 THE COURT: Okay. Go ahead and follow-up on that, and	20	THE COURT:	Okay. Go ahead and follow-up on that, and	
Doctor, we will go back to your previous question after that.				
22	22	, 3 1	1	
23 A Yeah.		A Yeah.		
24				
25 Q MR. PARKER: Thank you, My Lady.		O MR. PARKER:	Thank you, My Lady.	
26 A Can I finish?			3	
27				
28 THE COURT: Go ahead?	28	THE COURT:	Go ahead?	
29	29			
A Yeah, so he was asking me about, Mr. Parker was asking me about Mr. Joyal's		A Yeah, so he was asking me about	, Mr. Parker was asking me about Mr. Joyal's	
paragraph, and I comment on the first half, I wanted to finish my comment on the	31	٤	•	
32 second half.			•	
33				
So the second half of it mentions that and even Mr. Joyal wrote that I, he said		So the second half of it mentions t	that and even Mr. Joval wrote that I, he said	
35 "mostly," he did not say I didn't address it at all. Because that's not true that I didn't			•	
36 address it at all.		•		
37				
38 Q MR. PARKER: He said:		Q MR. PARKER:	He said:	
39		`		
Virtually no mention		Virtually no mention		
41		•		

1	Sir. He didn't say "mostly," he said	d:		
2				
3	Virtually no mention of the impact that widespread community			
4 5	transmission has on hospital	is and ICUs.		
6	And that's what I'm saying is corre	ct And it's correct in Alberta		
7		ugh the whole thing, you said mostly no mention,		
8	there was mostly no mention of mo			
9	more was mostly no mention of me	stotally. That is not true.		
10	THE COURT:	Okay, stop.		
11				
12	Mr. Parker, would you please read the	quote as you have before, so that Mr		
13	, , ,			
14	MR. PARKER:	Well, we'll just put it on the screen, if that's		
15	, J 1			
16				
17	THE COURT:	Yes.		
18				
19	, 1			
20	My apologies, I should have done this from the beginning.			
21	THE COLUMN	37 1 1 7		
22	THE COURT:	No, that is fine.		
23	O MD DADIED.	C - C-11 14 41 1-1		
24	Q MR. PARKER:	So, folks, you can't see the whole paragraph. It		
25 26	• • • • • • • • • • • • • • • • • • • •			
27	thing, but it was really set up for th	its fast sentence.		
28	In this regard Manitoba is	s right to point out that Dr. Bhattacharya's		
29	_	exclusively on mortality with virtually no		
30	mention of the impact that widespread community transmission has on			
31	hospitals and ICUs.			
32	•			
33	And the question is, that's correc	t, and your answer is, that's incorrect. The Great		
34	Barrington Declaration you believe	e is in your report; right?		
35	A Sorry, there's two things. One	is that almost exclusively on mortality. You		
36	characterize it has no mention of m	nortality. Even		
37				
38	Q Well, I read the quote to you, sir?			
39	A Yeah, and then you characterized i	t as no mention of mortality.		
40	THE COLD T			
41	THE COURT:	Okay. No, no		

1 2 MR. PARKER: We're continuing. 3 4 THE COURT: Doctor, please, we have the question now. You 5 have the quote in front of you, you have the question. Where in the report do you address the issues, this issue? 6 7 8 A Right. So the second half, which is the "virtually no mention of the impact that 9 widespread community transmission has on hospitals and ICUs," the Great Barrington Declaration addresses that. Because the highest risk of being hospitalized or and ICUs 10 is the older population. By implementing a policy of focussed protection, you can 11 12 reduce the risk of hospitalizations and ICUs, without necessarily focussing primarily 13 on community transmission. Community transmission is not the primary way, or the 14 only way to address hospitalizations and ICUs. 15 16 THE COURT: So your answer --17 18 MR. PARKER: Are you done, sir? 19 20 THE COURT: Go ahead, Mr. Parker, I am sorry. 21 22 A Yes, no, let's -- go ahead. 23 24 O MR. PARKER: So when Alberta was, during the second wave, in the throws of widespread community transmission in December of 2020, heading to 25 the peak of that wave, you're saying that Alberta should have switched from the 26 27 suppression approach it has taken to the pandemic, and gone all in on a focussed 28 protection approach at that time, and that would have been the solution; is that what 29 you're telling us, Dr. Bhattacharya? A I think that they should have done that from the beginning of pandemic. That from the 30 31 beginning of the pandemic, a focussed protection approach would have saved more 32 lives from COVID, and also would have caused far less collateral farm --33 34 Q (INDISCERNIBLE). A -- well, can I please finish? And would have caused far less collateral harm relative to 35 36 the policies that were actually followed. Collateral harm --37 38 Q Even Florida --39 A -- (INDISCERNIBLE). 40 41 Q Even Florida didn't take a focussed protection from the beginning, sir. So you're

1 2 3		saying that Alberta should have, back in March of 2020, been on board focussed protection, even before your Great Barrington Declaration came out in October that year. And if we had done that, then we wouldn't be in the situation we were in in
4		December in the second wave. That's your answer then?
5 6	A	My answer is that a focussed protection approach would have produced far less death and harm if you account both the collateral, from the policies followed, as well as
7		COVID deaths, that's correct.
8		
9 10	Q	Let's well, actually before we bring that up. Do you remember testifying in California, sir, in the case of <i>Tandon</i> T-A-N-D-O-N?
11	A	Yes I don't think I testified, actually. I just filed an affidavit.
12	0	The same that such at I was a That's such as 11-1 and 1-1-1-1 and 1-1-1-1-1
13 14		I'm sorry, that's what I mean. I believe it's called a declaration down there, okay. Yeah.
15		
16 17	Q	And if we go down to oh, hang on a second. Sorry, folks, we're just going to get our technology straightened out here. So, Dr. Bhattacharya, I believe this is your
18 19		declaration filed in <i>Tandon</i> in California; is that right? Is that, are you able to identify it?
20	Δ	I'll take your word for it.
21	11	The take your word for it.
22 23	Q	Sure thing. We got it from counsel in the state of California.
24		I wanted to take you to paragraph 15 here, sir, and it touches on this point, and I got
25		this out of the decision, and that's why we went and got the declaration that you had
26		sworn in this matter. And you said: (as read)
27		
28		The clear theoretical implication from these models is that lockdowns
29		delay infections, they do not prevent them from occurring altogether.
30		
31		And I understand that, that's, I think, your evidence has been consistent on that, that's
32		fair; right?
33	A	Yes.
34		
35	Q	(as read)
36		
37		In other words, roughly the same number of people would be infected

In other words, roughly the same number of people would be infected with or without lockdowns, but lockdowns will spread the infection out over a longer time.

A (INDISCERNIBLE).

Q (as read) 1 2 3 This may be --4 5 Sorry, I'm asking a question, sir: (as read) 6 7 This may be beneficial in limited situations where hospital 8 overcrowding is predicted to occur, which might induce avoidable 9 mortality. 10 11 You said that; right, sir? A Yes, I did. And I should say, so I'm clear, it may delay infection. It's an empirical 12 13 question whether they do. I'm talking about, here in this paragraph I'm talking about 14 here in this paragraph I'm talking about theoretical limitations from a compartment 15 models. Whether they actually in real world do delay infections is another question. 16 17 Q Right. Well, you --18 A So when I wrote this, I was talking about the theoretical implications, and about why 19 people might use them to try to, as a policy matter, so delay when these infections 20 occur. 21 22 That's not the same thing as to say that they actually work that way. 23 24 Q You continued in this declaration that you swore: (as read) 25 26 The primary benefit of a lockdown is this limited in time, a delay in the 27 incidents of cases to avoid a public health emergency, such as the 28 unavailability of sufficient medical personnel in an area to care for COVID-19 patients. 29 30 31 So --32 A Yeah, in a theoretical benefit, right? 33 Q Well, you didn't say "theoretical benefit," sir. I don't see that wording in here? 34 35 A It does. So read the beginning of the paragraph. I'm talking about a theoretical 36 implication from a model, an SRI model, a compartment model, why you would 37 want --38 Q Well, you're right, you use "theoretical" in the first sentence. But you didn't use 39 40 "theoretical" talking about the primary benefit of a lockdown as time limited. You 41 talked about, you didn't say --

A	Mr. Parker, you are asking me a question about what I meant here, and I'm giving you
	the answer to that question. What I meant here is that this is a theoretical model,
	implies that it (INDISCERNIBLE) that benefit. Whether it actually has that benefit in
	real-world situations is an empirical question. In fact, you asked me about a paper that
	I published in January 2021, where we actually looked at real empirical evidence of
	whether lockdowns actually did reduce cases or delay cases, and the answer was no.

So this is, I'm trying to make it clear. You're asking me about this particular paragraph. The paragraph I had in mind when I wrote it, just so you know, was about the theoretical model, the theoretical implication, not the actual.

Q Well, even the Judge in this case said even the defendants expert witnesses admits that if you have hospital overcrowding predicted to occur, then, as you say in this paragraph: (as read)

That lock downs may be a tool that is necessary to address that to avoid further mortality.

Right? That's a fair description of your evidence in *Tandon*; isn't it, sir.

 A No, it's not. As I said, the other -- there are alternate policies that could be followed -- in particular, the Great Barrington Declaration's policy of focussed protection -- that could also produce reductions in hospitalizations in ICUs, especially in older populations, who are higher risk for it.

So it is a theoretical implication that lockdowns can produce delays in infections. That doesn't, it's not borne out of real-world data.

But it's also true, it's a theoretical matter, focussed protection could also reduce hospitalizations and overcrowding of systems if focussed protection is used, is (INDISCERNIBLE).

Q Let's go to -- I just want to find a paper, sir.

34 THE COURT:

doing that.

Okay. I am sorry, Mr. Parker, while you are

Doctor, earlier on you said that you wanted to answer a previous question, or add to your answer to a previous question. I am not sure either Mr. Parker nor I know what you mean by that previous question. Is that still something that you want to address?

A No, I've addressed it, Your Honour.

1 2	THE CO	our⊤·	Okay.
3	THE CO	OKI.	Chay.
4 5		was actually to address whether, loout my testimony regarding the ICU	like, the particular, like, what Judge Joyal said Js and deaths, and I addressed that.
6 7 8	THE CO	URT:	Okay.
9 10	АН	e didn't say I did not address it.	
11 12	THE CO	URT:	Okay, thank you.
13 14	do	IR. PARKER: by you know the one I'm talking about	(INDISCERNIBLE) in your surrebuttal report, t, sir?
15 16		it Alberta or Manitoba?	
17		beg your pardon?	
18 19		or Alberta or Manitoba?	
20 21		eah, it was in both. You put it i Ianitoba?	n both your surrebuttal reports in Alberta and
2223	A O	kay.	
2425	Q T	he	
26	THE CO	OURT:	I am sorry, Mr. Parker, we did not hear the first
27 28	part of your question because you were on mute.		
29 30	MR. GR	EY:	Thank you, My Justice.
31 32	MR. PAI	RKER:	I'm sorry.
33 34	THE CO	URT:	That is okay.
35 36	D		I wanted to go to the Savaris study, and recalled the Savaris study, and I think you said,
37 38 39	A O		s in both. It was footnote 3 in your Manitoba part of your question. Thought you were asking
40 41	Q W	Ve are getting an awful lot of noise he	ere again, and so that I might be the problem.

1 2	THE	COURT: Madam Clerk, why don't you mute me. I think
3		s coming from here.
5 6 7	Q	MR. PARKER: So the paper, sir, the Savaris stay-at-home policy is a case of exception, fallacy, and Internet-based ecological study. And, sir, do you remember that paper?
8 9	A	I do remember that paper.
10 11	Q	And, sir, in Manitoba well, can you tell us maybe a little bit about what you remember that paper was about?
12 13 14 15	A	I'm trying to remember where it was published, but it was a paper that looked at the correlation between stay-at-home orders and I'm trying to remember exactly the details I think it was cases in a very large number of places.
16 17 18 19 20	Q	Perhaps we better bring it up yeah, okay. My apologies. Sorry, folks. So we have to go to we'll bring it up it's yeah. Okay, folks, we'll bring it to you now, Dr. Bhattacharya. I thank you for your patience. This is the article I wanted to ask you about, sir, my apologies, for not putting it in front of you earlier.
21 22		Does this help you a little bit? Again, it is footnote 18 to your surrebuttal report, and footnote 3 in Manitoba.
23 24	A	Hold on, let me see if I can find the document.
252627	Q A	Sorry, find the document? What do you mean, "find the document"? Where it is in the document. You said it was footnote 18?
28 29 30 31 32 33	Q	Oh, you're looking in your report? Yes, you wanted to see what you said about it. Well, I can tell you what you said about it. We can put your reports up on the screen, if that would help, actually. That's kind of what I, part of what I wanted to ask you about it. But it would help if you got I appreciate it was a while ago but this was a pretty important study, in your opinion, it appears. So I want you to be familiar with it, so
34 35	A	Hold on, let me see if I can find it. I apologize, I just have to look in my report.
36	Q	Not at all, sir.
3738	A	You said footnote 18?

Q Footnote 18, yes. It's up there now, sir.A Oh, yeah. So, yeah, this is the report that I remembered.

1	Q Okay.			
2	A Yeah, 87 regions around the world.			
3 4	O Vos. And you were pretty impressed with this report right sir? This was			
5	Q Yes. And you were pretty impressed with this report, right, sir? This was a important report?			
6	*	as just a recent meta analysis of this literature that		
7	looked at the mortality effects of locl	kdowns		
8				
9	• *	about the Johns Hopkins study that came out last		
10 11	•	ant to what was happening in the third and second at to take us there, but I just want to stay with this		
12	study right now, sir. And	it to take us there, but I just want to stay with this		
13	sound figure now, our find			
14	MR. GREY:	Actually, Mr. Parker, you've read the study.		
15	• •	bout the Johns Hopkins' study is incorrect. So I		
16	don't want you putting questions			
17	MR. PARKER:	Comm. I		
18 19	MR. PARKER.	Sorry, I		
20	MR. GREY:	Mr. Parker, may I finish my objection?		
21				
22	MR. PARKER:	What? I'm not no.		
23				
24	THE COURT:	Okay. Hold on, please I am sorry, Mr. Grey.		
25 26	\mathcal{E}_{1}			
27	So, Doctor, it is now 4:15 in Alberta. I am not sure what time it is for you, but could you			
28	please go offline, and we will resume again in the morning at 10:00 with you.			
29	1 6,			
30	In the meantime, I will hear from counsel with respect to this objection, okay?			
31				
32	A Okay.			
33 34	MR. PARKER:	Would it be possible to finish this line of		
35		? I'm sorry, Madam Justice Romaine, but having		
36		I'm not sure what the objection is, frankly.		
37	•	3		
38	THE COURT:	Well, okay.		
39	MD DARWED			
40	MR. PARKER:	I didn't hear a word, Judge.		
41				

1 2	MR. GREY:	I didn't get a chance to state it.
3	MR. PARKER:	Well, what is the objection, sir?
5 6 7	THE COURT: the objection heard without the doctor be	Well, no, I am sorry, Mr. Grey. I want to have eing present.
8 9 10	So no, I am sorry, we are going to releas and then you can finish your line of ques	e him, and we will find out what the objection is, tioning in the morning.
11 12 13	MR. PARKER: tonight? I'll wrap it up pretty quickly if v	Would we be able to come back and finish it we can.
14 15 16	THE COURT: is it for you, Doctor?	Well, I don't know whether I want what time
l7 l8	A It's 3:15 my time.	
19 20	THE COURT:	Okay.
21 22 23 24 25 26 27	MR. PARKER: If I can rephrase my question to avoid the objection again, the words "objection" have not come out of Mr. Grey's mouth. He' just interrupted me when I told the doctor I didn't want to hear about the Johns Hopkins study. I wanted to talk about the Savaris study that is in his report, and that he put in hi Manitoba report and called it perhaps the best peer-reviewed study on the subject. So that's what I wanted to ask him about, and I haven't heard an objection.	
28 29	THE COURT:	Okay. We will take a chance.
30 31	Mr. Grey, what is your objection?	
32 33 34 35 36 37	been filed in this proceeding. He just sta	Firstly, this is not the first time that my friend dence or are not supported by the evidence that's ated that the Johns Hopkins' study does not relate one who has read the study knows that that's is
38 39 40	· · · · · · · · · · · · · · · · · · ·	question to the witness that talked about the ng the second wave. That is not supported by the

So I'm concerned about questions being framed -- and I appreciate in that respect that the scope of cross-examination is broad, and this is the first time I've said anything about it all day. My concern, however, is when questions are put to the witness that presume a fact that's not in evidence, or that is patently incorrect or false. That is not fair to the witness, and it's also misleading to the Court.

THE COURT:

That's the basis of my objection.

With respect to the Johns Hopkins' study, I think we have, in fact, moved off that, at any rate. I think that Mr. Parker suggested that he was not going to be concerned with that.

So if he mischaracterized that study, I do not think it is relevant to what we are dealing

Okay. I understand, Mr. Grey.

with right now any way.

 With respect to the second, the widespread second wave, I am just not sure where in the cross-examination that occurred. But perhaps I can ask you, Mr. Grey, and Mr. Parker, later on, when we've excused the doctor for the day, to talk about that one. And we can determine whether or not that is an issue that has to be corrected, okay?

21 MR. PARKER: Certainly.

23 MR. GREY: Thank you, My Lady. That's satisfactory.

25 THE COURT: Okay.

27 MR. PARKER: Thank you.

29 THE COURT: Okay.

Mr. Parker, then, do you want to go on? I think probably for the benefit of the doctor, you had better repeat your question.

34 MR. PARKER: Sure.

Q MR. PARKER: We'll bring up the Manitoba surrebuttal report, sir, and in that report you had referred to the Savaris report. And I don't want to get the words wrong, but I'll take the risk. You had called it perhaps the best peer-reviewed study on the subject, and I'll put that up. There we go, sir. And so you'll see that you say in the second sentence of the last paragraph: (as read)

Perhaps the best peer-reviewed study evaluating the efficacy of lockdowns was published this past month in the prestigious journal *Scientific Reports*.

Do you see that, sir, and do you remember writing that?

6 A I do. I also remember editing that for the Alberta report.

Q Yeah, I wanted to ask you about that, because you lost some enthusiasm. It changed from: (as read)

Perhaps the best peer-reviewed study --

To: (as read)

Another study.

And that really struck me. And what was the cause of that seeming loss of enthusiasm for this article, do you know, sir?

A Yes, there was a specific reason, and that was that there was an after-publication comment that was put up questioning whether the timing of -- so the technical issue is this: When the lockdowns are imposed, how long does it take to see a benefit on the mortality rate in a population? And some author, some scientist put a question to the authors of this paper asking whether decisions about how the timing between the imposition of a lockdown and the mortality rate, whether the result is sensitive of that. And I learned about that after, I looked into that afterwards, and I thought it was still a good paper, but no longer necessarily the best paper.

- Q Well, why didn't you indicate that in your report, sir, as opposed to changing the language from "perhaps the best," to "another"?
- A Because it accurately reflects what I thought about the paper.

- Q Right. But don't you think the Court should hear about what you've just described that caused you to change your views on this and change the language?
- A Just so we're clear, this was a dispute between the authors of the paper that was already peer-reviewed and published -- so therefore, vetted -- and some other scientists that was still ongoing and had not received any clarification in my mind when I wrote the Alberta report. So there was not, I mean, I've reflected my thinking on the paper correctly at the time.

Q So you had taken into account what you've just described; and as a result, you thought you would change the language --

1 A Just --

- 3 Q -- from "perhaps the best peer-reviewed --
 - A I still don't --

- Q -- can I finish the question, please, Dr. Bhattacharya -- to "another"? And you did it for the reasons you've just described; is that right?
 - A Yeah. I still would say it's "another paper." I still do not know which set of, whether the authors of the paper are right, or the people are criticize the paper are right. I think it's still a paper that's worth considering.

- Q Did you know that the paper has been retracted by the editors on December 14th, sir? You weren't aware of that?
- A No -- I mean, I was aware that that happened recently. I also know that the authors of the paper don't agree with that retraction.

- Q They don't, sir. You felt it wasn't important to bring to the Court's attention that a paper that you had once thought was perhaps the best has been retracted in December of last year?
- A I'm sorry, just so we're clear. When I said that it is "perhaps the best," I read the paper, and I didn't see the, I did not have the objection that the other scientists who objected to the paper had. And I still think it's a good paper. But I do acknowledge that they had that objection. I don't know which set of scientists is right on this, but when would I have had the opportunity to tell the Court that the paper had been retracted?

Q You have an ongoing obligation to the Court, sir. It's part of your role as an expert. You have to inform -- we went through this this morning. If there are limits on studies, it's something you should be bringing to the Court's attention. I mean -- we'll bring up the retraction --

A I mean, we just -- you just brought up this question. There's a lot of studies in this paper, in this report, that I cited a year ago. And a lot, as you said, tens of thousands of papers have been written since then. The literature has moved on. I can't --

- Q Right, but --
- A -- you want me to write a whole other report. I mean, if you want to have a timely discussion, we should have a timely discussion.

- Q Sir, I'm just asking why you didn't tell the Court that it had been retracted? That would be relevant and pertinent --
- A When would I have had to do that? I have not had the opportunity to do that, to tell the Court, except for right now when you asked me about this paper? And I did. I just

1 2		told you	
3	0	So	
4	_	before you brought this up.	
5	11	before you brought this up.	
6	0	You were waiting for me to bring it u	p? Well
7		I didn't wait for you to bring it up.	1
8		, , ,	
9	Q	I asked you	
10	A	You asked me	
11			
12	Q	I asked you	
13			
14	THE (COURT:	Mr. Parker? Mr. Parker?
15			
16	MR. F	ARKER:	I'm sorry.
17			
18	THE (COURT:	Please let the doctor finish his answer.
19		X 1 X D 1 1 1 1	
20	A	· ·	out the paper, and I said that, I just described to
21		*	and also the fact that it was retracted, before you
2223			id is an inaccurate characterization of what just mity to tell the paper (sic) about the fate of every
24			id, there's thousands of pages of studies in there.
25		So I don't really understand what you	
26		50 I don't rearry understand what you	Te trying to get at.
27	Q	MR. PARKER:	Well, I'm trying to get at why you didn't tell the
28	•		logies, I will go back and look at the transcript. I
29		•	p the retraction, and you said yes, I was aware of
30		that, but the transcript will reveal what	
31		•	
32		So your understanding is that you tol-	d me that this was retracted before I even brought
33		it up. So you knew	
34	A	I told you the scientific issue at play -	
35			
36	_	Right.	
37	A	when you asked me about it. And	that's correct.
38			
39	_	So	
40	A	I fairly described the scientific issue a	at play.
41			

Q And this is the retraction note in front of you, sir, and you've seen this before then? 1 2 A I mean, I knew -- I didn't see this report particularly, no. But I knew, I was aware that 3 it had been retracted. I also knew that the authors of the paper don't agree with the 4 retraction. 5 Q Yeah, it says that right on the retraction note here, in the last line, that they do not 6 agree with this retraction. 7 8 9 Nevertheless, that has not stopped the editors from Science Report from retracting the article, which I will suggest to you is extraordinary; right? That's continue 10 extraordinary thing to have happen to an academic article? 11 12 A Sorry, I didn't catch the question. 13 Q You didn't hear my question? 14 15 16 MR. GREY: I'm getting some background noise, Mr. Parker. I'm not sure where it's coming from. 17 18 19 MR. PARKER: No comment. I thought we had frozen up there. 20 21 Q MR. PARKER: Can you hear me, Dr. Bhattacharya? 22 A Now I can. 23 Q Okay. Sorry, I forgot my question now. Sorry, it was, right, it was the extraordinary 24 25 nature of the editors retracting the article, that's an extraordinary thing; right? You 26 agree? 27 A It's happened several times during this pandemic, where prominent papers have been retracted for reasons that I don't fully understand. Sometimes I agree with them, 28 29 sometimes I don't. 30 31 Q Sir, you had said in Manitoba, about this paper, that it was an excellent study in a very 32 prestigious journal, and then you said what you meant by a prestigious journal was it had a good reputation. And I'm going to suggest to you, sir, that this paper was 33 obviously important in shaping your opinion that MPIs are not very effective at 34

Q You did say that one was even better, yeah. I read that evidence. You said that the perhaps the best. You didn't want to be modest, but that's what you said.

reducing mortality? That's fair, right?

A I mean, more important is the paper I cited, my own paper.

35 36

37

40 41

But you had said, as we have noted in, at least on January 5th of last year, that in your

- opinion, this was perhaps the best peer-reviewed study on the subject. And indeed, what you particularly liked is it used real-world counter factuals, and not modelling counter-factuals; right?
- A Yes, that is still what I like about this paper.

- Q And do you remember back in May of last year, when Manitoba's counsel put to you the criticism that you were alluding to, if commentary from the other scientists? Do you remember that happening?
- A I remember I was asked about it. I remember not knowing that there was an issue with the paper at the time.

- Q That's fair, that's what you said. You were asked what you think of this? And you said, I don't know. It's the first time I've seen that someone has an issue with this paper. And so you knew there was an issue with the paper, though, when you wrote your report in Alberta, your surrebuttal report, which was in July, when you changed the language from "perhaps the best peer-reviewed" to "another." And the reason is because of what Manitoba showed you in the trial in *Gateway*; right?
- A No, not because of what they showed me, but because I looked into the issues underlining the criticism.

Q Okay.

A I don't still agree that the criticism is likely right, but I will say that it's still a scientific issue that the authors disagree with the criticism.

Q And --

 A The best I can tell from what I've seen from that underlying issue, the issue is -- and I'll describe it again, just so we're clear -- what is the time delay between the imposition of lockdown and when you should expect to see a mortality effect?

Q Well, I think that's --

A And the authors say that the results are robust to that, and the criticism is that it's not robust to that. I mean, as best I can tell, for some time delays, there's no correlation at all, just as the authors say. What's the exact time delay one should expect between an imposition of a lockdown and a mortality effect, and what effect that should have on the correlation is a complicated statistical question. I don't believe that this is a sufficient -- I wouldn't, if I were editing the adjourn, I would not have done a retraction on this. I would have just permitted a note to be impended by the authors that are criticizing it, the reasons for the note.

40 MR. GREY:

For whatever reason, we can't hear Mr. Park.

1 2	MR. F	RATH:	I've lost yes, thanks.
3	MR. F	PARKER:	Sorry, I thought
5	MR. F	RATH:	I thought I was the only one.
6 7	MR. F	PARKER:	I'm sorry, folks.
8			
9		GREY:	We lost you for about ten seconds there,
10	Mı	r. Parker.	
11		A DATE	
12		PARKER:	I will try not to let that happen again, Mr. Grey.
13	M	y apologies, everyone.	
14	0	MD DADVED.	The editors of Coinstific Report said in this
15	Ų	MR. PARKER:	The editors of <i>Scientific Report</i> said in this
16 17		retraction note that: (as read)	
18		Given these concerns	
19		Given these concerns	
20		The concerns of the other commentat	ors who had wrote in on this article:
21			
22		the editors no longer have	confidence that the conclusions presented
23		are adequately supported.	•
24			
25		And you don't agree with that, though	n, Dr. Bhattacharya?
26	A	No, I don't agree with that.	
27			
28	Q Let's go to the document that's in front of you, sir. This you remember seeing this		ont of you, sir. This you remember seeing this
29	•		
30			
31		this particular version of this docume	nt, no.
32	0		
33			
34	А	I don't remember them putting this to	me.
35	0	I thought this was the document that	y nut to you which was the criticism of the name
3637			
38			at all that they put this document to me
39	$\boldsymbol{\Lambda}$	They did not I have no reconcetion	at all that they put this document to me.
40	Q	Okay. Well, we will, we can go to the	he transcript and show you that they did, and we'll

do that when we have some time. Maybe this will help, because there was some

discussion. Can you go to page 2, please, Mr. Trofimuk? And if you look at the, here they give you, you described one of the criticisms being that they didn't put a lag into their model. But there were actually six criticisms listed, and that was the, that was the -- sorry, there is seven criticisms listed, and that was number six on page 2. And this was discussed in your transcript.

1 2

Do you, if you read what's at number 6 now, does that help you refresh your memory about being shown this document by counsel for Manitoba in the *Gateway* matter?

A No, I don't remember this particular document. I do remember the particular criticism, I've seen discussions around that in various parts of -- I forget exactly where -- I don't remember seeing this particular document, no.

Q Okay. My apologies. I may have the wrong document. Although it has the quote that's in the transcript, and that quote is at number 6. So I may just have, I may just have a different document that has the exact same language in that was put to you in Manitoba, and that is, again, if you look at number 6 there, that whole paragraph was put to you in a question in Manitoba.

So ignoring 6 there, number 6, do you remember that language being put to you in a Manitoba hearing?

A I don't remember the specific language. I think I've described exactly this criticism, though, the question of lag in the --

Q Right.

A -- expected effect between implementation of an NPI -- or, you know, lockdown measure -- and the mortality outcomes.

Q Sure. And do you remember when you were shown this criticism in Manitoba -- and I appreciate you're saying it's not this one, and so I accept that. It's a document that had that same language as number 6, and it may not be this one. That you suggested that this was very -- sorry -- that this was, you were asked whether this was not a common occurrence. And you said that this criticism was not evidence one way or another for anything. You said that this doesn't mean that it's wrong, and that you said that this wasn't unusual to have this kind of criticism. It was just part of the give-and-take of the scientific debate -- and I'm paraphrasing now, not trying to use exact language.

Does that sound fair? Do you recall giving that evidence, sir?

A I don't remember the specific language, but yeah, I do. I still think that's true. I think that after publication, there's often a robust discussion in the scientific community about the robustness of findings.

1	Q	And you did say, though, that although having this robust discussion wasn't unusual,
2		what would be unusual in fact, you didn't use "unusual," you said well, here, I'll
3		read it to you so I don't get it wrong. It's in your transcript, page 124, at line 16: (as
4		read)
5		
6		I think it's not possible to infer from the fact that they put that note up
7		one way or the other, whether the article is right or wrong. The
8		extraordinary things are articles being retracted. That's not what has
9		happened here. What's happened here is a note that this is subject to
10		criticism. In the COVID era, that I've seen with many many scientific
11		articles, perfectly good ones, they'll say there's a lot of information
12		around COVID, and you should look at other resources or footnotes.
13		
14		Do you remember giving that evidence, sir?
15	A	I do, yes.
16		
17	Q	Okay. And so you agree that this article being retracted by the editors is an
18		extraordinary thing; correct?
19	A	I mean, I think that retracting the article is more common now than I've seen it at any
20		other time. While it would have been seen as an absolutely extraordinary thing before
21		COVID pandemic, I've seen many prominent articles now, during this pandemic,
22		retracted. Which makes it less extraordinary than it wasn't was.
23		
24	Q	And the critiques of this article were, there are two footnotes to the retraction note.
25		And one of the footnotes is the authors are Meyerowitz-Katz, Besançon, Flahault, and
26		Wimmer. Do any of those names ring a bell to you, sir: Gideon Meyerowitz-Katz?
27	A	I'm sorry, can you repeat the names again?
28		
29	_	Gideon Meyerowitz-Katz, Lonni Besançon, Antoine Flahault, and R. Wimmer?
30	A	I think I've heard of Meyerowitz-Katz. I have not heard of any of the others.
31	_	
32	Q	Okay.
33	ъ.	•
34	Discu	ssion
35	MD	DADVED.
36		PARKER: Justice Romaine, that's my questions that I had
37	on	this. And now would be an appropriate time to wrap up for the day, if that's okay?
38		

Okay. That is just fine.

40 41 We will resume again at 9:00 tomorrow -- I am sorry, 10:00 tomorrow.

39

THE COURT:

1		
2 3	MR. PARKER:	Sure.
4 5	Was there anything that we were going to resolve and still needed to resolve?	
6	THE COURT:	I think that Mr. Grey suggested let me just see
7 8	what my notes say suggested that you l	nad made an incorrect statement
9 10	MR. PARKER:	Right.
10 11 12	THE COURT:	and I asked
13 14 15	MR. PARKER: could?	I am ready to address both those points, if I
16 17	THE COURT:	Yes. If the two of you could
18 19	MR. GREY:	Did you want to
20 21 22 23	MR. PARKER: The first one sorry, are you asking me to address them, Justice Romaine? Can I do that now? And I think, Dr. Bhattacharya, we were hoping would be out of here at this point.	
24 25	THE COURT:	Yes.
26 27 28	MR. GREY: he lets me?	I may be able to save Mr. Parker the trouble, if
29 30	THE COURT:	Okay. Go ahead.
31 32 33 34 35	MR. GREY: I think in hindsight, given the flow of questioning, it was probably a tempest in a teapot. But if Mr. Parker wants to address something that I said, that's quite all right. But I do not require any further clarification. I was satisfied with how the Court had dealt with the situation.	
36 37	THE COURT:	Okay.
38 39 40	MR. PARKER: Dr. Bhattacharya can see us tomorrow at	I would like to respond, and perhaps this point. Would that be okay?
41	THE COURT:	Okay.

1		
2	MR. PARKER:	I do want him out of here when we're dealing
3	with this.	•
4		
5	THE COURT:	Mr. Parker, though, I am not talking about you
6	and Mr. Grey responding in front of me	e. I am talking about you contacting him, if you
7	would still like to respond. I have no	w found my notes. Mr. Grey suggested that a
8	comment you made	
9		
10	MR. PARKER:	Sorry, Dr. Bhattacharya is still here though.
11		
12	THE COURT:	Yes, no, no.
13		
14	MR. PARKER:	I thought you wanted oh, okay. You're okay
15	with that?	
16		
17	THE COURT:	It is okay.
18		
19	MR. PARKER:	Okay.
20		
21	THE COURT:	A comment that you made about the widespread
22		e. And that is, you know, we dealt with the other
23	•	Grey about that comment, go ahead offline. And if
24	you decide that something has to be done	e, we can deal with it tomorrow, okay?
25	MR. PARKER:	Livet yyell I doubt think anything has to be
26 27		I just, well, I don't think anything has to be ckly to what he said, because I've got a response
28	right here to the points	ekry to what he said, because I've got a response
29	right here to the points	
30	THE COURT:	Okay.
31	THE COCKT.	chaj.
32	Dr. Bhattacharya, we will say good nigh	t to you, okay? See you in the morning.
33	, , , , , , , , , , , , , , , , , , ,	
34	A Bye, now.	
35	• '	
36	THE COURT:	Thank you.
37		
38	MR. PARKER:	Thank you.
39		
40	(WITNESS STANDS DOWN)	
41		

MR. PARKER: Thank you so much. 2 3 The first one was that I stopped the witness from speaking about the Johns Hopkins' study 4 that I believe he was going to. Mr. Grey said that I should not say that it's not relevant to the first wave. Of course it is. That's not what I said. It's the same point we discussed 5 this morning when they wanted to update their evidence. This is a study that came out 6 7 last week. It's not relevant to what happened during the second and third waves. That's 8 what I said on there. 9 10 On his second point, I believe -- and we'll see what the transcript said -- I was talking about widespread community transmission during the second wave in December. 11 12 believe that is fully supported by the evidence -- particularly the evidence of Dr. Hinshaw. 13 If I misspoke in some way, I apologize, and that will be picked up on the transcript. But that's my recollection. 14 15 16 Thank you for letting me make those comments, Justice Romaine, I appreciate that. 17 18 THE COURT: Okay. So, Mr. Grey --19 20 May I respond? MR. GREY: 21 22 Yes, of course. THE COURT: 23 24 MR. GREY: Firstly, what Mr. Parker, what I heard him to say -- and perhaps I heard him incorrectly -- I had heard him to say that the Johns 25 Hopkins' study was not relevant to what happened during the first and second waves of 26 27 the pandemic. And I have read that report, and that's not what it says. 28 29 Secondly -- and I may be corrected -- but my detailed study of the respondent's evidence about the infection rates -- and this is in evidence -- during the relevant time frame truck 30 31 waited between 99 percent and 87 percent negativity. So to phrase that and characterize that as "widespread infection in the province of Alberta," I object to that. And I will 32 object to that every time Mr. Parker tries to say that, because it's not supported by the 33 34 evidence, as I understand the evidence. 35 36 THE COURT: Okay. 37

So if Mr. Parker wants to readdress that and put

39 40

38

MR. GREY:

41 THE COURT: No, I do not think --

that to Mr. Bhattacharya in terms of infection rates, that's a different --

1			
2 3	MR. GREY:	matter, and I may be corrected, but that's my	
4	understanding of the evidence.		
5	THE COURT:	Okay. Here is what we are going to do about	
6 7	•	e transcript and determine what was actually said. nat Mr. Parker misspoke, then next time it occurs,	
8	you can object, Mr. Grey.	int init i unter misspone, then next time it occurs,	
9			
10 11	Otherwise, it will probably be an issue for argument, because there may be, in fact, two views on that, okay?		
12			
13 14	MR. GREY:	Thank you.	
15	MR. RATH:	While we're all together, just quickly, I just	
16	wanted to clarify with my friend,		
17 18	cross-examination in its entirety, or just	for the day, sir?	
19	MR. PARKER:	Just for the day.	
20	MD DATII.	A11 .:-1.4 N. I : 1 4- 1 :6	
21 22	MR. RATH: would be starting with (INDISCERNIB)	All right. No, I just wanted to know if we LE).	
23	Ç ,	,	
2425	THE COURT:	Okay.	
26	MR. RATH:	Thank you.	
27	THE COLUMN		
28 29	THE COURT:	Okay, thank you.	
30			
31 32	MR. PARKER:	Thoule you	
33	WIR. PARKER.	Thank you.	
34	MR. GREY:	Thank you.	
35 36			
37			
38	PROCEEDINGS ADJOURNED UNTIL 10:00 AM, FEBRUARY 11, 2022		
39 40			
41			

Certificate of Record

2 3

 I, Michelle Palmer, certify that this recording is the record made of the evidence in the proceedings in the Court of Queen's Bench, held in Courtroom 1702, at Calgary, Alberta, on the 10th day of February, 2022, and that I was the court official in charge of the sound-recording machine during the proceedings.

Certificate of Transcript I, J. Aubé, certify that (a) I transcribed the record, which was recorded by a sound-recording machine, to the best of my skill and ability and the foregoing pages are a complete and accurate transcript of the contents of the record, and (b) the Certificate of Record for these proceedings was included orally on the record and is transcribed in this transcript. 690512 NB Inc. Order Number: TDS-1000818 Dated: February 15, 2022