

UNITED STATES BANKRUPTCY COURT  
WESTERN DISTRICT OF NORTH CAROLINA  
CHARLOTTE DIVISION

In re

ALDRICH PUMP LLC, *et al.*,

Debtors.

ARMSTRONG WORLD INDUSTRIES, INC.  
ASBESTOS PERSONAL INJURY  
SETTLEMENT TRUST *et al.*,

Plaintiff(s),

v.

ALDRICH PUMP LLC, *et al.*

Defendant(s).

AC&S ASBESTOS SETTLEMENT TRUST,  
COMBUSTION ENGINEERING 524(G)  
ASBESTOS PI TRUST, GI HOLDINGS INC.  
ASBESTOS PERSONAL INJURY  
SETTLEMENT TRUST, GST SETTLEMENT  
FACILITY, KAISER ALUMINUM &  
CHEMICAL CORPORATION ASBESTOS  
PERSONAL INJURY TRUST, QUIGLEY  
COMPANY, INC. ASBESTOS PI TRUST T H  
AGRICULTURE & NUTRITION, L.L.C.  
ASBESTOS PERSONAL INJURY TRUST, and  
YARWAY ASBESTOS PERSONAL INJURY  
TRUST,

Petitioners,

v.

ALDRICH PUMP LLC and MURRAY BOILER  
LLC,

Respondents,

Chapter 11

Case No. 20-30608 (JCW)

(Jointly Administered)

Miscellaneous Pleading

No. 22-00303 (JCW)

(Transferred from District of Delaware)

Miscellaneous Pleading

No. 23-00300 (JCW)

(Transferred from District of New Jersey)



VERUS CLAIM SERVICES, LLC,

Interested Party,

NON-PARTY CERTAIN MATCHING  
CLAIMANTS,

Interested Party.

**DECLARATION OF MICHAEL A. KAPLAN, ESQ.**

I, **Michael A. Kaplan, Esq.**, hereby declares under penalty of perjury:

1. I am a Partner at the law firm Lowenstein Sandler LLP, and counsel for the eight third-party asbestos settlement trusts identified below<sup>1</sup>.
2. Attached hereto as **Exhibit A** is a true and correct copy of Dr. Abraham J. Wyner's expert report, dated April 25, 2023.
3. Attached hereto as **Exhibit B** is a true and correct copy of the transcript from the May 8, 2023 deposition of Dr. Charles Mullin.

Dated: May 15, 2023

*s/ Michael A. Kaplan*

Michael A. Kaplan, Esq.

<sup>1</sup> The eight trusts are: (i) ACandS Asbestos Settlement Trust; (ii) Combustion Engineering 524(g) Asbestos PI Trust; (iii) G-I Holdings Inc. Asbestos Personal Injury Settlement Trust; (iv) GST Settlement Facility; (v) Kaiser Aluminum & Chemical Corporation Asbestos Personal Injury Trust; (vi) Quigley Company, Inc. Asbestos PI Trust; (vii) T H Agriculture & Nutrition, L.L.C. Asbestos Personal Injury Trust; and (viii) Yarway Asbestos Personal Injury Trust.

# **EXHIBIT A**

**UNITED STATES BANKRUPTCY COURT  
WESTERN DISTRICT OF NORTH CAROLINA  
CHARLOTTE DIVISION**

<p>In re</p> <p>ALDRICH PUMP LLC, <i>et al.</i>,<sup>1</sup></p> <p>Debtors.</p>	<p>Chapter 11</p> <p>Case No. 20-30608 (JCW)</p> <p>(Jointly Administered)</p>
<p>ARMSTRONG WORLD INDUSTRIES, INC. ASBESTOS PERSONAL INJURY SETTLEMENT TRUST <i>et al.</i>,</p> <p>Plaintiff(s),</p> <p>v.</p> <p>ALDRICH PUMP LLC, <i>et al.</i></p> <p>Defendant(s).</p>	<p>Miscellaneous Pleading</p> <p>No. 22-00303 (JCW)</p> <p>(Transferred from District of Delaware)</p>
<p>AC&amp;S ASBESTOS SETTLEMENT TRUST, COMBUSTION ENGINEERING 524(G) ASBESTOS PI TRUST, GI HOLDINGS INC. ASBESTOS PERSONAL INJURY SETTLEMENT TRUST, GST SETTLEMENT FACILITY, KAISER ALUMINUM &amp; CHEMICAL CORPORATION ASBESTOS PERSONAL INJURY TRUST, QUIGLEY COMPANY, INC. ASBESTOS PI TRUST T H AGRICULTURE &amp; NUTRITION, L.L.C. ASBESTOS PERSONAL INJURY TRUST, and YARWAY ASBESTOS PERSONAL INJURY TRUST,</p> <p>Petitioners,</p> <p>v.</p>	<p>Miscellaneous Pleading</p> <p>No. 23-00300 (JCW)</p> <p>(Transferred from District of New Jersey)</p>

<sup>1</sup> The Debtors are the following entities (the last four digits of their respective taxpayer identification numbers follow in parentheses): Aldrich Pump LLC (2290) and Murray Boiler LLC (0679). The Debtors' address is 800-E Beaty Street, Davidson, North Carolina 28036.

ALDRICH PUMP LLC and MURRAY BOILER  
LLC,

Respondents,

VERUS CLAIM SERVICES, LLC,

Interested Party,

NON-PARTY CERTAIN MATCHING  
CLAIMANTS,

Interested Party.

**EXPERT REPORT OF ABRAHAM J. WYNER, PH.D.**

**I. INTRODUCTION & QUALIFICATIONS**

1. I am a Tenured Full Professor of Statistics and Data Science at University of Pennsylvania's Wharton School. I am also the Chair of the University's Undergraduate Program in Statistics. I also co-direct the Wharton People Analytics Initiative and the Wharton Sports Analytics and Business Initiative.

2. I completed my undergraduate education magna cum laude at Yale University with a Bachelor of Science in Mathematics in 1988. I then earned my Ph.D. in Statistics from Stanford University in 1993.

3. My conclusions in this report are based on my more than 25 years of professional and academic experience in the relevant field of statistics. During this time, I have worked with many large intersecting data sets (including asbestos trusts) and I am familiar with the complexities involved in extracting the data that is needed to do an analysis. My research interests have been broad. I have published across many methods and applications including Applied Probability, Information Theory, Mathematical Analysis of Algorithms, Machine Learning, Applied Statistical Analysis, and Bayesian Hierarchical Modeling.

4. I am being compensated at a rate of \$1,000 per hour for my efforts in connection with the preparation of this report. My compensation is in no way contingent on the results of this or any other proceeding. I have no financial interest in the outcome of this matter.

## II. SCOPE OF MY REPORT

5. I have been asked by counsel for the DCPF Trusts<sup>2</sup>, the Delaware Claims Processing Facility, LLC, the Verus Trusts<sup>3</sup>, and Verus Claims Services, LLC, to respond to the Declaration of Charles H. Mullin, Ph.D.<sup>4</sup>, submitted in support of Aldrich Murray LLC and Murray Boiler LLC's (the "Debtors") Motion for Rehearing, regarding the relative cost/benefits of sampling versus a full population census of the 12,000 at-issue claimants. I will opine on the accuracy and sufficiency of a sample of 1,200 claimants (10% of total population) for reasonable purposes.

6. As described in detail below, it is my opinion that a random 10% sample of 1,200 claimants would fulfill all of the Debtors' reasonable needs. My opinion and others described herein reflect my evaluation of the sources listed in Exhibit A to this report. I expressly reserve the right to modify, amend, and/or supplement my opinions expressed herein to respond to any arguments made by the Debtors directly, or through the testimony of its experts, in response to my opinions expressed herein, or to consider any new evidence that becomes available.

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<sup>2</sup> The DCPF Trusts are the Armstrong World Industries, Inc. Asbestos Personal Injury Settlement Trust; The Babcock & Wilcox Company Asbestos PI Trust; Celotex Asbestos Settlement Trust; DII Industries, LLC Asbestos PI Trust; Federal-Mogul Asbestos Personal Injury Trust; Flintkote Asbestos Trust; Owens Corning / Fibreboard Asbestos Personal Injury Trust; Pittsburgh Corning Corporation Asbestos Personal Injury Settlement Trust; United States Gypsum Asbestos Personal Injury Settlement Trust; and WRG Asbestos PI Trust.

<sup>3</sup> The Verus Trusts are ACandS Asbestos Settlement Trust; Combustion Engineering 524(g) Asbestos PI Trust; G-I Holdings Inc. Asbestos Personal Injury Settlement Trust; GST Settlement Facility; Kaiser Aluminum & Chemical Corporation Asbestos Personal Injury Trust; Quigley Company, Inc. Asbestos PI Trust; T H Agriculture & Nutrition, L.L.C. Asbestos Personal Injury Trust; and Yarway Asbestos Personal Injury Trust.

<sup>4</sup> Declaration of Charles H. Mullin, Ph.D., No. 22-mc-303 (JCW) (Dkt. No. 55) (the "Mullin Declaration").

7. If called to testify, I may also explain principles and terminology referred and alluded to in this report, as well as any documents referenced herein. I may also use demonstrative exhibits, animations, and other such testimonial aids in support of my testimony to illustrate the bases of my opinion.

### **III. DR. MULLIN'S DECLARATION**

8. Dr. Mullin's declaration is fundamentally an analysis that compares the costs of sampling (a potential increase in analysis time for recipient of data and loss of accuracy) to its benefits (reduction in privacy risk and lowering of administrative costs for provider). Most of the report is an attempt to downplay the privacy risks and emphasize a potential loss in accuracy, while attempting to downplay the contradictory, pro-samplings arguments made in the *Bestwall* case<sup>5</sup> by his colleague at Bates White, Jorge Gallardo-García, Ph.D., who clearly states that sampling is sufficient. At no point does Dr. Mullin quantify the potential loss of accuracy. He implies the loss is substantial enough to justify the costs without explanation, calculation, or quantification of any kind.

### **IV. SUMMARY OF MY OPINIONS**

9. It is my opinion that a random sample that is large (10%), weighted or stratified towards larger settlement values, would be practically and materially no less accurate than a full census of the approximately 12,000 claimants in the targeted population. Such a sample has already been discussed in the *Bestwall* Declaration, which does not identify any attribute of the population that cannot be accurately studied with a sample. The Debtors have further proposed a

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<sup>5</sup> Declaration of Jorge Gallardo-García, PHD, *In re Bestwall LLC*, Bankr. No. 17-31795 (LTB) (Dkt. No. 2183) (the "*Bestwall* Declaration").

variation of that sampling design here, which they acknowledge provides a “reliable cross-section” of the targeted population.<sup>6</sup>

10. Consequently, there would be no practical or material benefit to requiring the production of the full population. In addition, there is a risk of an inadvertent dissemination of highly confidential data. The likelihood of such breach may be small, but the damage would be large if it occurred. If only 10% of the target population is produced, the damage in the resulting data breach to the individual claimants can be expected to be 10 times smaller because it would involve 10 times fewer claimants.

## **V. DISCUSSION**

### **A. The accuracy of sampling versus a full census**

11. Let me begin with an analogy. In the sport of football, it is generally regarded that taller quarterbacks are advantaged over shorter quarterbacks, if all other attributes are the same. Therefore, when drafting a quarterback, an NFL team has to consider height among the many considerations. If they were comparing two potential picks, one who is 6 feet and 1.00 inch (exactly) tall and another who is 6 feet and 0.99 inches tall, they would consider their heights to be practically and materially the same, even though it is technically true that there is a 0.01 inch difference in height. When comparing them, height would not be considered at all and only the other attributes would be discussed and weighed to make the determination. Similarly, when discussing samples of various sizes, it can often happen that there is no practical or material advantage gained with the larger dataset.

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<sup>6</sup> Dec. 19, 2022 Email from Morgan R. Hirst (the “December Sampling Proposal”). It is my understanding that, since the Debtors made the December Sampling Proposal, the Debtors nearly reached agreement with the Official Committee of Asbestos Personal Injury Claimants and the Future Claimants’ Representative on a sampling proposal. I cannot opine specifically on this sampling proposal as it was not provided to the DCPF Trusts, the Delaware Claims Processing Facility, LLC, the Verus Trusts, or Verus Claims Services, LLC.



12. Dr. Mullin emphasizes that smaller samples can be less accurate than larger samples<sup>7</sup>, but he does not address the central question at issue here: *is a large, efficient 10% sample, materially and practically equivalent to a complete census?* As explained below, the answer to this question is yes – a 10% sample, as a practical matter, is just as good as a full census for the purposes described by Dr. Mullin and the Debtors’ reasonable needs.

13. The starting point for this analysis requires an understanding of what can make a sample inaccurate. Samples are most familiar in matters that involve polling and surveys. These samples are indeed frequently deficient and inaccurate, but not because they are too small. The typical samples seen and discussed in the media suffer from “sampling bias.”<sup>8</sup> They have characteristics that are invariably different from the population in key ways. But sampling bias is not an issue here, since the population is enumerable and identifiable. In other words, all the claimants in the Debtors’ database are known.

14. In fact, a trained statistician with access to an enumerated list of individuals in a targeted population can easily create a sample that makes optimal use of the data. Such a design was already proposed in the *Bestwall* Declaration, and a variation of that design was proposed by the Debtors here in the December Sampling Proposal.<sup>9</sup>

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<sup>7</sup> Mullin Decl., ¶ 10.

<sup>8</sup> Sampling bias occurs when subjects with different attributes have different and unknown chances of inclusion in the sample.

<sup>9</sup> The sample set forth in the *Bestwall* Declaration and the Debtors’ December Sampling Proposal are of a stratified design, where samples of different sizes are taken from a large number of categories (called strata). Another approach, known as weighted sampling, would weight the probability of inclusion in the sample according to a specific attribute. For example, claimants can be included with probability in direct proportion to their settlement value. This “weighted” approach can be highly efficient and simple to analyze. It also requires fewer arbitrary decisions that may go into defining strata.

**B. A random 10% sample fulfills all of the Debtors' reasonable needs**

15. With an unbiased sample, it is possible to measure the precision of a sample when there is a specific characteristic of the population (called a “parameter”) that is the subject and purpose of the data analysis. Dr. Mullin does not specify precisely the parameter that he or the Debtors intend to measure. But he does sketch the general ideas:

Specifically, the data would allow us to compare exposure allegations to the products of the reorganized entities for which the trusts were established with the exposures those same claimants disclosed in their tort litigation against the Debtors. This would enable us to *quantify the proportion of alternative exposures* disclosed to the Debtors at the time of settlement.<sup>10</sup>

Thus, the first parameter of interest is a proportion of claimants that failed to disclose alternative exposures.

16. When the parameter of interest is a proportion (which is a percentage between 0% and 100%), then the equivalent sample proportion is an “estimate” of the parameter. The accuracy of an estimate is measured using the laws of probability theory, by calculating the “standard error” of the estimate, which is defined to be the typical<sup>11</sup> difference between the sample proportion and the population proportion.

17. For example, if the true population proportion of claimants that have undisclosed alternative exposures is 5%, and the sample proportion of the same quantity is 4% then the difference is called the sampling error, which in this example is 1%. The standard error quantifies this difference in frequency terms. For example, if the true population proportion were 10% and the standard error were 1% then most samples (about 2/3 of samples) would have a sample proportion between 9% and 11% and it would be very unusual (about 5% of samples) for the

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<sup>10</sup> Mullin Decl., ¶ 16 (emphasis added).

<sup>11</sup> The standard error is the standard deviation of the difference between the sample proportion and the population proportion, where the variation is caused by sampling.

sample proportion to be greater than 12% or less than 8%. This means that any attribute that the whole population has will be mirrored closely in the population. If the population proportion is 10%, the sample proportion is very likely to be very close to 10%. If the population has a proportion of 2%, the sample proportion will be very close to 2%.

18. One of the most useful formulas in statistics, tells us that, for a simple random sample, the standard error of a sample proportion is at most  $\frac{1}{2\sqrt{n}}$ , where  $n$  is the sample size.<sup>12</sup> Thus, a simple sample of 1,200 drawn from a population of 12,000 (10% of the total) has a standard error that is *less than 1.5%*. This means that, whatever the true percentage of claimants that failed to disclose alternative exposures, the results from a simple random sample of 10% of the population would likely be within 1.5% of the true population proportion.

19. It is common to double the standard error to be extra sure about the range of possible values. So in the case of a simple random sample of size 1,200, we can be nearly certain that the true population proportion is within 3% of the number that is calculated from the sample. If there is a practical purpose for this data that requires more accuracy than this, it has never been disclosed or argued, certainly not by Dr. Mullin.

20. In practice, however, the standard error for a simple sample of 1,200 observations (10% of the total) will usually be a lot smaller than 1.5%. If the true population proportion were 5%, then the standard error would be less than 0.6%. A stratified sample (like the methodologies proposed in the *Bestwall* Declaration and the December Sampling Proposal) can even be more efficient.

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<sup>12</sup> The precise formula for the standard error of a sample proportion is  $\frac{\sqrt{p(1-p)}}{\sqrt{n}}$  where  $p$  = true proportion. This is always less than  $\frac{1}{2\sqrt{n}}$ .

21. A stratified sample groups the population into different “strata” and samples more frequently from strata with higher variability. This approach is more efficient in the sense that it makes optimal use of each data point. The reason for this has to do with the importance of each observation to the conclusion. In a simple random sample, every claimant has equal likelihood of inclusion. In a stratified sample, like the one in *Bestwall*, claimants that have very low settlements are less likely to be included. This is more efficient since the consequence of any improper disclosure is smaller for smaller settlements so fewer small settlements are needed to estimate their impact. In the end, this means that, with the same sample size, the resulting standard errors can be lower than in a simple random sample.

22. Thus, for purposes of testing the first parameter of interest, the proportion of claimants that failed to disclose alternative exposures, a simple or stratified random sample would provide an exceedingly accurate result. The very small uncertainty in the proportion that remains after sampling will have no practical impact on the claim evaluation process. In fact, as I will explain later, this uncertainty is very much smaller than the modeling uncertainty about claims valuations.

23. Dr. Mullin also discusses a second parameter of interest:

Further, if full disclosure has not occurred, then variation in disclosure patterns would allow us to model the impact of partial information on settlement amounts. If that information is not communicated to a defendant, a plaintiff can artificially increase settlement amounts in a number of different ways.<sup>13</sup>

Dr. Mullin suggests that he wants to measure the impact of non-disclosure on settlement amounts. The assumption here is that a claimant who fails to disclose their exposure completely would have been owed a smaller settlement value had they in fact disclosed such information. The overall

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<sup>13</sup> Mullin Decl., ¶ 17.

average impact of such non-disclosures would be a population parameter of great interest. For this parameter, at issue before the Court is the following question: *If a sample were used to estimate this value, how precise would that estimate be?*

24. Because the *proportion* of non-disclosed claimants has a very small standard error, it follows, if all the settlements were the same size, that the standard error of the overall average impact would also be small. If the settlements are not the same size, a stratified sample can be drawn that oversamples the claims with the highest variation. When this happens an additional “finite sample correction factor” is added to the formula, which reduces the standard error.<sup>14</sup> Applying this here, since we know that the settlement amounts are not the same size for each claimant, a properly stratified sample of 1,200 claimants’ data, would allow Dr. Mullin and the Debtors to calculate the average size of the impact of non-disclosure on settlement values with uncertainty that is extremely small.

25. Beyond the two parameters discussed above, Dr. Mullin does not specify precisely or intimate any other parameters of interest. In my review of the relevant materials, I have not encountered any argument or specific identification of any need that cannot be fulfilled by a sample and that would require a full census. As discussed above, a sample would provide an exceptionally accurate result that would be commensurate with a result derived from the total population.

26. It is possible that there may be a desire to do more than accurately and scientifically assess the Debtors’ liability. For example, if the Debtors are looking for stories to support their arguments anecdotally, then having a larger pool of claimants would produce a larger pool of

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<sup>14</sup> The finite sample correction factor lowers the standard error by an amount  $c = \sqrt{\frac{(N-n)}{(N-1)}}$  where n = sample size in given strata and N=strata size. This can be substantial reduction in the standard error if the sample size is large relative to the size of the strata. This is why the sampling proportion will be high for certain strata with large settlements.

stories. To illustrate, if you want to study how much money gamblers lose on average in sports betting in an effort to marshal arguments to legalize sports betting, then a random sample of sufficient size would be sufficient to accurately and reliably measure the economic losses. If, on the other hand, the best argument requires an example of a losing streak, then a full census will generate more extreme results that could be used to illustrate this point.

**C. A full census provides no material benefit**

27. What I have demonstrated is that a 10% sample is completely sufficient and not materially worse than a census for the purposes outlined by Dr. Mullin or the Debtors' reasonable needs. So what benefit is there to doing a complete census? Dr. Mullin indicates that there are a few benefits, I will consider them and show that any such benefit is exceedingly minor.

28. Dr. Mullin discusses the "analytical burden" of sampling without defining or explaining it.<sup>15</sup> He does not say what that burden is exactly or how extensive that burden would be. Simple random samples are trivially handled, and unweighted stratified samples are not substantively harder to implement and analyze (for appropriately qualified experts) since there are readily available or derivable formulas that can be applied to stratified or weighted samples.<sup>16</sup>

29. While there are a few extra statistical calculations that are required to compute standard errors (that are not needed when doing a census), this is not hard or particularly burdensome. Data analysis on the full dataset is not substantively easier especially since there will be statistical challenges of all types that will arise, sampling or no sampling. Even if a full census were taken and analyzed, there would still be uncertainty about the parameters at issue. There are

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<sup>15</sup> Mullin Decl., ¶¶ 25-31.

<sup>16</sup> E.g., Ken Aho, *Confidence Intervals for Stratified Random Samples*, INST. FOR STATISTICS & MATHEMATICS, <https://search.r-project.org/CRAN/refmans/asbio/html/ci.strat.html> (last visited Apr. 25, 2023).

other unknowns that would have to be estimated and would require the creation of a statistical model. These will introduce new uncertainty, distinct and irreducible, and **not due to sampling**.

30. For example, it may be quite important to compute what the dollar value of a settlement would have been, under the counterfactual that a full and accurate disclosure had been made. This cannot be known precisely and would have to be estimated using a model for each claimant who failed to accurately disclose. Consequently, even if all the data for every claimant is collected (without sampling), a statistical model would be required to make an estimate of a counterfactual settlement amount. The uncertainty of this can be guessed, but not known. Based on my experience in modeling and statistics, the uncertainty in estimating the counterfactual would far exceed the standard errors caused by sampling. In short, as a practical matter a 10% sample is just as good as a full census.

31. In his Declaration, Dr. Mullin also cites the Internal Revenue Service (“IRS”) recommendation that samples should not be used when “it is reasonable to examine 100 percent of the items under consideration.”<sup>17</sup> This recommendation is given without any context and is not applicable. The IRS is not tasked with *estimating* the amount of taxes owed. It needs to know the amount exactly, if possible, thus the recommendation. The IRS is tasked with finding every incident of tax avoidance. If they were only interested in estimating the average size of underpayments then a sufficiently large sample can be practically and materially no worse than a complete census. In fact, sometimes a sample can be preferred because samples can sometimes be more carefully checked for inaccuracies. This is particularly important when some of the data fields consist of “narratives” (like descriptions of exposure histories) that require human readers and curation.

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<sup>17</sup> Mullin Decl., ¶ 20.

32. Because there is no practical loss in accuracy created by sampling, there is no need for, or material benefit from, taking a full census of the claimants' data, especially when balanced against the significant privacy benefits that sampling provides. It is always possible that a data breach will occur exposing the data and breaking the confidentiality that has been promised. The chance of such a breach can be minimized, but never eliminated. If the entire population of claimants is released than all the claimants private and confidential information is at risk. If a sample of 10% is released, then the size of the at-risk population is 10 times smaller. Since the damage in a confidentiality breach is measured in proportion to the size of the number of individuals that are exposed the potential damage to the individual claimants *is 10 times smaller*.

## **VI. CONCLUSIONS**

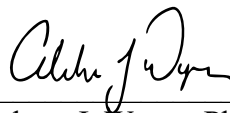
33. Dr. Mullin has argued that sampling should not be used because a full census is more accurate and the burdens of a full census are not sufficiently large to outweigh the benefits. What Dr. Mullin fails to do is quantify, even approximately, how much less accurate a sample will be. I conclude that a random sample that is large (10%), weighted or stratified towards larger settlement values, would be practically and materially no less accurate than a full census of the approximately 12,000 claimants in the targeted population.

34. A proper stratified random sample can accurately estimate the proportion of claimants that did not consistently disclose their exposure histories and also estimate the average difference in settlement amount if exposures were properly disclosed. With respect to these issues, there would not be a practical or material difference in the information acquired from a large, targeted sample of 1,200 than would be gained from the full census of the entire population of 12,000.



Pursuant to 28 U.S.C. § 1746, I declare under penalty of perjury that the foregoing is true and correct.

Dated: April 25, 2023  
Philadelphia, PA

  
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Abraham J. Wyner, Ph.D.

**EXHIBIT A**

**List of Sources:**

1. Motion of the Debtors for an Order Authorizing the Debtors to Issue Subpoenas on Asbestos Trusts and Paddock Enterprises, LLC [*In re Aldrich Pump LLC, et al.*, Dkt. No. 1111];
2. Reply in Support of Motion of the Debtors for an Order Authorizing the Debtors to Issue Subpoenas on Asbestos Trusts and Paddock Enterprises, LLC [*In re Aldrich Pump LLC, et al.*, Dkt. No. 1182];
3. Third-Party Asbestos Trusts' Motion to Quash or Modify Subpoenas [*DCPF Proceeding*, Dkt. No. 3];
4. Delaware Claims Processing Facility, LLC's (I) Motion to Quash or Modify Subpoena and (II) Joinder [*DCPF Proceeding*, Dkt. No. 4-2];
5. Aldrich Pump LLC and Murray Boiler LLC's Brief in Opposition to (A) Third-Party Asbestos Trusts' Motion to Quash or Modify Subpoenas; and (B) Delaware Claims Processing Facility, LLC's (I) Motion to Quash or Modify subpoenas and (II) Joinder [*DCPF Proceeding*, Dkt. No. 4-9];
6. Third-Party Asbestos Trusts' Reply in Support of Motion to Quash or Modify Subpoenas [*DCPF Proceeding*, Dkt. No. 6-2];
7. Delaware Claims Processing Facility, LLC's Reply in Support of its (I) Motion to Quash or Modify Subpoena and (II) Joinder [*DCPF Proceeding*, Dkt. No. 6-5];
8. Transcript for Hearing/Trial Held on November 30, 2022 [*DCPF Proceeding*, Dkt. No. 35];
9. December 19, 2022 Email from Morgan R. Hirst re: In re Aldrich Pump LLC, et al (Case No. 20-30608);
10. Debtors' Motion for Rehearing Concerning the Issue of Sampling on DCPF's Subpoena-Related Motions [*DCPF Proceeding*, Dkt. No. 54];
11. Declaration of Charles H. Mullin, Ph.D. [*DCPF Proceeding*, Dkt. No. 54];
12. Third-Party Asbestos Trusts' Opposition to Motion for Rehearing Concerning the Issue of Sampling on DCPF's Subpoena-Related Motions [*DCPF Proceeding*, Dkt. No. 70];
13. Declaration of Beth Moskow-Schnoll in Support of Third-Party Asbestos Trusts' Opposition to Motion for Rehearing Concerning the Issue of Sampling on DCPF's Subpoena-Related Motions [*DCPF Proceeding*, Dkt. No. 70];

14. Debtors' Reply in Support of Debtors' Motion for Rehearing Concerning the Issue of Sampling on DCPF's Subpoena-Related Motions [*DCPF Proceeding*, Dkt. No. 87];
15. Transcript for Hearing/Trial Held on March 30, 2023 [*DCPF Proceeding*, Dkt. No. 119];
16. Third-Party Asbestos Trusts' Motion to Quash Subpoenas and in Support of Stay [*Verus Proceeding*, Dkt. No. 2-1];
17. Verus Claims Services, LLC's Motion to Quash Subpoenas and to Stay [*Verus Proceeding*, Dkt. No. 2-6];
18. Respondents' Motion to Transfer Subpoena-Related Motions to the Issuing Court, the United States Bankruptcy Court for the Western District of North Carolina [*Verus Proceeding*, Dkt. No. 3-9];
19. Aldrich Pump LLC and Murray Boiler LLC's Opposition to (I) Third-Party Trusts' Motion to Quash Subpoenas and in Support of Stay; (II) Verus Claim Services, LLC's Motion to Quash Subpoenas and to Stay; and (III) Non-Party Certain Matching Claimants' Joinders and Motion to Quash [*Verus Proceeding*, Dkt. No. 5-2];
20. Third-Party Asbestos Trusts Reply in Further Support of their Motion to Quash Subpoenas [*Verus Proceeding*, Dkt. No. 5-10]; and
21. Verus Claim Services, LLC's Reply in Further Support of its Motion to Quash [*Verus Proceeding*, Dkt. No. 6-1].

**EXHIBIT B**

**Expert Testimony in the Last 4 Years:**

1. *Grayson v. Gen. Elec. Co.*, No. 3:13-cv-01799 (D. Conn. Feb. 9, 2018) (Deposition Testimony);
2. *United States, ex rel. J. Scott v. Ariz. Ctr. for Hematology & Oncology*, No. 2:16-cv-03703 (D. Ariz. Aug. 21, 2019) (Deposition Testimony);
3. *Arwood v. Broadtree Partners, LLC*, C.A. No. 2019-0904-JRS (Del. Ch. Oct. 2020) (Trial Testimony);
4. *Honeywell Int'l, Inc. v. N. Am. Refractories Co. Personal Inj. Settlement Tr. (In re N. Am. Refractories Co.)*, Adv. No. 21-2097-TPA (Bankr. W.D. Pa. May 2022) (Trial Testimony);  
and
5. *Mann v. Nat'l Review, Inc.*, 2012 CA 008263 B (D.C. Super. Nov. 2020) (Trial scheduled for June 2023).

### EXHIBIT C

#### **Publications in the Last 10 Years:**

1. Ryan Brill, Sameer Deshpande, Wyner, “A Bayesian Analysis of the Time Through the Order Penalty,” Submitted to the JQAS, Published at <https://arxiv.org/abs/2210.06724>
2. Elizabeth Walshe EA, Elliott MR, Romer D, Cheng S, Curry AE, Seacrist T, Oppenheimer N, Wyner AJ, Grethlein D, Gonzalez AK, Winston FK, “Novel use of a virtual driving assessment to classify driver skill at the time of licensure,” *Transp. Res. Part F Traffic Psychol. Behav.*, 2022 May.
3. Elizabeth A. Walshe, Abraham J. Wyner, Shukai Cheng, Robert Zhang, Alexander K. Gonzalez, Natalie Oppenheimer, Daniel Romer, and Flaura K. Winston, “License Examination and Crash Outcomes Post-Licensure in Young Drivers: Are the youngest drivers most at risk?”, 2022. JAMA Network.
4. “Is the Third Time Through the Order Penalty Real?,” Abraham Wyner and Russel Walters, To Appear, SABR 2021 Conference.
5. Matthew Olson, Abraham J. Wyner, Richard Berk, “Generalizations of the Random Forest Kernel,” KDD 2019.
6. Matt Olson and Abraham Wyner, “Modern Neural Networks Generalize Well on Small Data Sets,” NIPS, 2019.
7. Matt Olson and Abraham Wyner, “Do Random Forests Estimate Class Probabilities?,” Submitted Journal of Machine Learning Research, 2018.
8. Sameer K. Deshpande, Abraham J. Wyner, “A hierarchical Bayesian model of pitch framing,” *Journal of Quantitative Analysis in Sports*, Volume 13, Issue 2, October 2017.
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10. Abraham J Wyner, Matthew Olson, Justin Bleich, David Mease, “Explaining the Success of AdaBoost and Random Forests as Interpolating Classifiers,” *Journal of Machine Learning Research* 18 (May, 2017) 1-33.
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15. Richard Sander and Abraham Wyner, “Studies Fail to Support Claims of New California Ethnic Studies Requirement,” *Tablet Magazine*, Mar. 29, 2022.
16. Abraham Wyner and Alan Salzburg, “The insanity of mandating boosters for Kids,” *Tablet Magazine*, June 6, 2022.
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18. “I’m a Statistician Closing Camps would be a big Published Mistake,” *The Forward*, May 5, 2020.
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