

***Practical Significance* | Episode 67: Behind the Numbers—Insights from the ASA Work and Salary Survey**



Donna LaLonde: Well, welcome everyone to the July episode of *Practical Significance*. I'm really delighted to be able to have a conversation with two wonderful colleagues from Langer Research who have served the ASA community so well in a number of ways. Today, we're going to talk about the work and salary survey and maybe some other things as well. But before we dig into the results, I'm going to ask Christine and Gary to tell us a little bit about your day jobs. So, Christine, I'll start with you.

Christine Filer: Thanks for having us. My name is Christine Filer. I have a PhD in communication with a minor in government and public policy. Of course, I thought I was going to be a professor, but over the years in my graduate program, I found myself focusing more and more on research.

So, I've been really happy to have landed at a boutique custom research shop where I get to participate in every step of the research process—from the very beginning, when we're just starting to figure out what our design might be, all the way through to the end, when we're thinking through the best way to communicate results and convey them in whatever format is most appropriate.

Donna LaLonde: And Christine, I'm just going to tell our listeners that you and I always have to start the conversation with what races you might be running—and what races I'm not running these days. So, it's great to have you. And Gary, what drew you to this kind of work?

Gary Langer: Well, first, I want to point out that Christine is our most senior research analyst at our company. She's been with us for getting on 10 years now, and she's just a wonderful colleague and employee to have with us.

My own background is kind of interesting. Rather than being a researcher—although I do some of that—I'm a newsman by training and temperament. I started as a reporter at the Associated Press, covering train wrecks, plane crashes, and three-alarm fires. But AP had

me take over a little news poll they had going because all the other reporters were too math-phobic to go anywhere near it.

I parlayed that into a 20-year career at ABC News, mostly as director of polling, where, again, I was sort of covering the beat of public opinion for our news audience. Then, 16 years ago, I took the opportunity to start our company, Langer Research Associates.

We focus on purposeful social science research that serves the public good, which, if you think about it, is really not unlike the same motivations that informed my previous career in data-focused journalism. We do a variety of super-interesting research projects on public policy and public attitudes, chiefly for foundations and nonprofits, with a busy national and international practice.

Donna LaLonde: That's great, Gary. And I think that you have a strong connection to a former ASA president because I kind of have it in my mind that when Rob Santos was recognized by AAPOR, you actually did the interview. So, small world.

Gary Langer: Rob's a great guy and a good friend, too.

Ron Wasserstein: Yep. So, let's jump right in and ask you both what surprised you most about the results. Whoever would like to go first.

Gary Langer: I'll pick that up. Christine can follow.

One thing I'll say—a little bit of pushback on that question—is that going into any project, we have research questions and sometimes hypotheses, but I try not to have expectations per se because we don't want to filter our analysis through our own predispositions. We want to hear from our respondents in their own context, from where they're coming from. So, no expectations, no surprises.

That said, I think there are some really compelling results. If not surprising, then certainly very interesting. Particularly to me, when we talked about and asked about the impacts of the federal budget cuts over the recent period, 90% saw these cuts as a negative—90% of ASA members who participated in our survey—rising to nearly unanimous agreement among federal employees at 96%.

Eighty percent of ASA members said these budget cuts had impacted their employer negatively, and more than half, 55%, said they were personally negatively impacted by the federal cuts, rising to 75% of federal employees themselves.

As a result of these perceived negative impacts, we saw really dramatic shifts, particularly among federal employees, in declines in things like job satisfaction, job security, and overall morale. Just as one example, when we asked federal employees in 2020—the last

time we did this survey—84% said they were very satisfied with their job security. In this survey, it's 13%.

So, really dramatic shifts there.

Ron Wasserstein: That's a spectacular shift. Actually, I've never heard of such a thing. It's amazing. So, Christine, did you have any additional comments?

Christine Filer: I would just add, stepping away from the results for a second, I wasn't so much surprised—because this is not the first time we've done a survey with the ASA membership—but I was very appreciative that so many members took time out of their busy days to sit down and go through the survey.

Donna LaLonde: Great segue into our next question, Christine, and that is, we had a lot of conversations about the tradeoffs. We didn't want to make it too long, and we didn't want to make it too short. We wanted to make sure that we asked all of the most compelling questions. Can you talk a little bit about, from your perspective, what was the hardest call in terms of putting this work and salary survey together?

Christine Filer: Yeah, that length that you mentioned—I think that was the hardest thing for me—just thinking through the different topics of interest and what content we wanted to focus on. There are so many different things that would be really interesting and give us compelling results. But at the same time, we don't want to put together an hour-long questionnaire and expect people to sit through it, take it, and still give us good data.

So, I'd say that was the hardest call that we made together: figuring out exactly what we wanted to ask about in the questionnaire.

Gary Langer: Yeah, I would add that in earlier iterations—this originally started, I think, at ASA before our participation—as a salary survey really focused on compensation issues, which is of great value, I think, for members to know and hear about.

At the same time, we envisioned it as having a broader focus, not only on salary, but also on workplace conditions. We went into some of that in the original survey we did with ASA six years ago, but we revisited it in this case. I thought that, among other workplace experience and satisfaction issues, measuring attitudes toward the changes in the federal government and the cuts that were coming down was really important this time around.

We'll go back into the field, hopefully again in the future, and again look at what's going on and see what's timely and important to cover above and beyond the important compensation issues that we also examine here.

Ron Wasserstein: So, as you looked at those compensation issues across the spectrum, what stood out?

Christine Filer: To me, I think honestly, maybe it's just personally edifying, but compensation increases with professional experience as well as a higher degree.

When we look at median total employment income for full-time employees, that's lower for those with five or fewer years of experience across all sectors. But then it rises with each additional level of tenure that we looked at. It goes all the way up to about \$210,000 for those with 26 or more years of experience.

The same thing is true for educational attainment. Median total employment income is higher for those with PhDs—\$175,000—than for those whose highest degree is a master's, at \$145,000.

I think that's in line with what we might expect. But at the same time, I do think it's encouraging to see that professional experience and also going through a degree program are things that are rewarded.

Gary Langer: Yeah. We also saw interesting divisions by sector, in which the highest reported pay was among individuals working in business or industry, followed pretty closely by either federal government or nonprofit employees, and followed more distantly by those in academia.

Again, as Christine points out, tenure and education level are strong factors.

It was also interesting to me that nearly half—44%—of employed members who participated in the survey reported additional pay from their employer besides their base pay, chiefly in the form of bonuses.

Additional pay was particularly prevalent among those working for-profit businesses, followed by federal workers and then academia, and was lowest for those working in nonprofits.

So, if you're looking for a bonus, maybe nonprofit might not be your first choice.

Ron Wasserstein: I don't think too many of us went into the nonprofit sector thinking that we were going to get rich doing it. But as you were talking about these results, one of the things that occurred to me—not something that necessarily shows up in the data—is that our members are continual learners. It's just the nature of our field. They have to be doing professional development all the time, and that works its way out ultimately into compensation, although the mapping for that isn't necessarily direct.

Gary Langer: Yeah, I think looking at additional training—lifelong learning, if you will—would be a really interesting element to probe further in future studies. We looked at existing educational attainment, and it is a strong factor. But looking at ongoing refresher courses, certifications, and the rest, I think, could be super interesting.

Christine Filer: I'll point out, though, that we did ask about satisfaction with different factors in your primary job. So maybe something for managers to keep in mind is that learning and development opportunities are among the items people are least likely to be very satisfied with at their current job.

So, there's room for improvement there if you're in a position to provide additional opportunities for people at your company to pursue that professional development.

Donna LaLonde: And I just can't resist taking the opportunity to say, doesn't the ASA have some fantastic professional development opportunities? So, thank you for teeing that up for me, Christine.

We maybe have touched on this a little bit—the tension between getting rich, nuanced data and keeping the survey short enough so people finish it. I think that came out for me not only in the overall length, but even in your advice on how to construct the questions so the questions weren't a book long, right?

So, I just wonder if you all would talk a little bit about, in this project but maybe in other projects, how you navigate that tension.

Gary Langer: Yeah, this is a key element of our work, Donna, because questionnaire design is far too often the forgotten stepchild of the research enterprise, and it is really important.

We haven't seen a ton of research on survey length, but what's there indicates pretty clearly that what matters is not length per se, but cognitive length. So, long batteries, lots of repetition, and overly complex questions create cognitive burden, which impacts data quality, especially as the cognitive length increases.

What's important is to have an instrument that's clear, engaging, and designed to minimize cognitive burden. Keep it interesting, focused, and straightforward. If you get that right, then length isn't so much of an issue.

And with a good instrument, once people start, by and large, they finish. Among the people who took our survey and went through the first question, 96% stayed with us until the end.

Ron Wasserstein: So, I feel like I can really relate to the cognitive burden issue. The beasts that are carrying my cognitive burden these days are not holding up their end, I'm telling you.

But speaking of burdens, one of the big burdens that anyone in your line of work faces is nonresponse. So, recognizing that, and recognizing that our listeners are pretty sophisticated in this area, what are the caveats that you would want people to be especially aware of as they look through the results of this survey?

Gary Langer: Well, I can jump in on that.

A couple of things. We want the best cooperation and the highest response we can get, but nonresponse isn't the best standard for survey quality because what matters is whether the nonresponse is random or systematic, right?

Systematic nonresponse is potentially biasing if it's systematic in terms of anything related to the variables we're studying. If it's random nonresponse, then it still fits neatly into the principles of inferential statistics, so we're okay.

We'd like the best response we can get, but what we really care about is whether we have a representative sample. We compared our results to the data available in the ASA files in terms of the demographics of the audience.

Now, it's not a perfect census. There's a lot of missing data in the ASA records, so we didn't feel comfortable going ahead and weighting the data, but they really lined up pretty nicely. There's a table in our report that shows our unweighted demographic data among survey participants compared with what we can see in the ASA roster for the full population.

I think it really is pretty reassuring.

We also approached it with an abundance of caution. In our report itself, we say that because it's not a sample survey and it doesn't have a high response rate as a census—we went to the full membership—we prefer, and ASA prefers, to present the results as indicative, but not as reliably representative of the full population within a calculable margin of sampling error.

So, I think we're being very cautious and responsible. But I also think it's strong and compelling data and certainly worth a look.

Donna LaLonde: So, following up on that, as we release this podcast, we'll also make your excellent reports available on the website.

To our listeners, obviously we want them to read the whole report, but is there a section or a part or one thing that you would tell them to go to first and read? And maybe why does that stand out for you?

Christine Filer: To me, this is really a "pick your poison" situation.

We have an appendix where we give the topline results, and if you want to just scroll through that quickly and get a sense of what questions were asked, you can do that.

We also have salary tables, so if you want to look at median compensation for different groups, all of that is laid out there, too.

Or you can just start from the top and read through. I don't think either report is prohibitively long.

That can be a nice way to go through and read the narrative, which helps put everything in context as you go along.

Gary Langer: Yeah, I would just add to that that we really had two topics we focused on this time around.

We had a study focused on employment—who's working where among the ASA membership—and salary and compensation levels.

Then we had a separate section in which we looked at attitudes toward federal cuts and also workplace conditions.

We thought those topics were different enough that it made sense to break them out into two separate reports, as readers will see.

So, there's one report on where folks are working and how they're being compensated, and a separate report on workplace conditions, attitudes, and views of the recent federal cutbacks.

Whichever of those is of greater interest is a good place to start—although personally, I think they're both worth a read.

Ron Wasserstein: Indeed, we won't be choosing our poison. We'll be trying to decide which place at the banquet table we want to start feasting at first.

So, I think it's impossible—perhaps illegal—to have any conversation now without talking about AI somehow or another. There's lots of hype. If we can cut past that, I'd like to ask you: In what ways have you seen AI changing your work so far? And what do you see coming in terms of how it might change your work?

And no, I'm not asking you to predict the entire future of AI—just what you see may be happening in your line of work.

Christine Filer: This is a tough one for me in that it hasn't really changed the way I work yet.

I have been trying, and so far it only slows me down. Even when I get the prompts to really reflect how I think they should be, it's just no comparison to having spent years and years developing questions, editing questionnaires, doing data analysis, and writing that up.

I think it's very useful to me in terms of writing syntax, especially if it's a function or something that I haven't done in a while and I just don't remember what the code is.

Christine Filer: Like, I know it, but I don't remember it. I think AI is really quick to give me that.

But anything more complicated in terms of synthesizing information and putting that together, it's not doing it for me yet. And I think, in part, that's because we place such importance on the exact words we're using in our questions and in our questionnaires.

In terms of shifts we're embracing, I would say it's really the expectations around how long it takes to put together good work. I am concerned that, with generative AI becoming more and more popular, there will be expectations that things can be turned around more quickly than I think they should be for good, responsible research.

Gary Langer: Yeah, we're kind of like custom tailors in our shop. We spend a lot of personal time and attention—and draw on many years of expertise—in the work we do.

So far, other than checking code and checking syntax, we're not seeing a lot of opportunities for AI in the way we do our work.

Nearly everyone on our team attended the recent conference at AAPOR, and there were a lot of presentations on AI. A lot of them were fairly problematic. It left me thinking of AI pretty much as a really bad intern—someone who requires lots and lots of time and attention and, at the end of the day, doesn't produce a particularly good product.

So, we're keeping our eyes open.

I have to tell you, though, that on the business side, I received some really disheartening pitches at this conference from folks who were selling AI agents and tools.

One person had actually scraped together many poll analyses I had written over the years to show me how his agent could write as well as I could. What it turned out was nonsense, so that didn't work for me.

Then the next pitch was that AI is a way to eliminate low-level employees, and I find that just so objectionable. Even the concept of a low-level employee. Everyone I work with has great value and contributes meaningfully to the work of our group. To think of anyone as a low-level employee is exactly the way we don't do business.

The next thing was, "Well, it'll eliminate rote tasks, so you don't have to run tabs—AI will do it for you. You don't have to build tables—AI will do it for you. You don't have to build charts—AI will do it for you."

But in fact, running tabs, building tables, and producing charts are the very ways that we lay the foundations of our analytical work—by fully involving ourselves in the data and going through it line by line to learn it and understand what our research is telling us so we can then transmit it to our audiences.

So, the idea that a machine is going to do that for you is really not at all aligned with the way we approach our work.

Donna LaLonde: You know, Gary and Christine, we sort of jumped right in to the nuts and bolts of the survey and the analysis. So I wonder, before I ask you a final question, if I might just step back and ask: Is there anything about the process that hasn't come up in the questions we've asked that you would like to share?

Christine, I know you spent a lot of time with our IRB submission, for example, to make sure that we were following best practices. So, is there anything about the process you'd like to highlight?

Gary Langer: Well, I'll jump in on that only to say that the key to any data collection process is the participation of your target population.

We got good cooperation compared to surveys of this type done among other groups, but it's down from what it was six years ago. I think the results are really interesting, in many ways compelling, and highly valuable to the membership.

The key takeaway for me is to really encourage members, when this comes around again, to give serious consideration to participating. It's a pretty brief, straightforward survey, and the results are super important in informing the membership about each other's prospects, conditions, working environments, compensation, and other important factors that can be very helpful to learn about.

The more participation we get, the better data we get. I'd really like to encourage that piece.

Donna LaLonde: That's great. Thanks so much.

Well, we have a few traditions on *Practical Significance*, and one of the traditions is that we always like to end by adding to our TBR list, our watching list, our reading list, and our listening list.

So, Christine, I know from past experience that you are filled with wonderful suggestions, at least on the TBR side. Tell us what you're reading, listening to, watching—all of the above.

Christine Filer: Thanks for the compliment, Donna.

I just started a book called *Returns and Exchanges* by Kayla Rae Whitaker. I love a long family saga, and I think this book is going to give me that.

I'm also really excited because this summer we're getting the third installment in *Harlem Trilogy* by Colson Whitehead. So, I plan to go back to the start and reread *Harlem Shuffle* in advance of that third book coming out, which I'm really excited for.

I think reading all three of them together is going to be a really rewarding experience.

In terms of TV, I am a huge New York Yankees fan, so if my TV is on, there's usually a baseball game on.

Though, of course, right now we've also got the New York Knicks in the Finals. Go Knicks!

And listening—well, as Donna mentioned, I run, so I listen to a lot of mashups while I run miles and miles.

Donna LaLonde: That's great. And I guess for our listeners, I should let them know that you are on the East Coast, so that Yankees and Knicks thing is local, right? Those are your local teams.

Christine Filer: Yes! I'm local.

Donna LaLonde: Gary, what about you?

Gary Langer: Well, a few things here.

This is kind of horrifying, but most of my recent reading has been research papers on AI infiltration into online panels. It's actually really interesting. There's a lot of important work that has come out on that just in the past year.

The other thing I read a lot is RFPs as we assess new project opportunities.

My playlist is somewhere between Dad Rock and the New York Philharmonic. We went and saw Sergei Prokofiev a couple of weeks ago. It was just a wonderful performance.

On TV, we found a really fun little Danish political drama called *Borgen*. It's only two or three seasons, wonderfully acted, wonderfully scripted, and unusual. That might be a good tip.

But mainly these days, my home is about 50 miles north of New York City, and we spend most of our time running our dog and, this time of year, growing tomatoes and cucumbers. They're just starting to come out.

Donna LaLonde: Well, I heartily endorse the spending-time-with-the-dog thing, so that works for me.

Where was *Borgen*? Where can we watch it?

Gary Langer: Yeah, I think it's on Amazon Prime. It's *Borgen*—B-O-R-G-E-N—which is the name of the building that houses the federal government in Denmark.

It's a Danish series, so you've got to watch it with the subtitles on, but it's a great yarn.

Donna LaLonde: Wonderful. Well, thank you both so much for talking with us about the work and salary survey, and thank you again for the excellent work you did on behalf of the ASA in helping us produce the work and salary survey report.

We have another tradition on *Practical Significance*, and that is Ron's Top 10.

So, I will turn it over to my colleague Ron for the Top 10.

Ron Wasserstein: Thank you, Donna! Well, the 250th anniversary of the Declaration of Independence is here. The impending holiday got me to thinking – never a good idea – about crucial moments in world history that could have been different if there had been statisticians around. So, always eager to promote our profession, the Practical Significance Podcast presents the top ten historical events that statisticians could have influenced (had there been any).

10. 44 BCE – Statisticians could have warned Julius Caesar about the spike in his hazard function around the Ides of March.

9. 1066 – Arguably, the Anglo-Saxons might have fended off the French with the strategic use of the Metropolis-Hastings algorithm.

8. 1492 - Statisticians would have warned Columbus that the confidence interval on his longitude estimates was plus or minus one continent.

7. 776 BCE — At the first Olympic Games, statisticians would have provided crucial advice on the use of control charts in chariot construction.

6. 210 BCE – A statistician could have mentioned to the first emperor of the Qin dynasty that the expected value of drinking mercury as an immortality potion was not, in fact, immortality.

5. 1633 – Perhaps the Church would have absolved Galileo if he could have shown them that the AIC indicated the heliocentric model was a better fit.

4. 1215 – Any statistician would have observed that the 63 clauses in the Magna Carta left King John with no degrees of freedom.

3. 1776 – England might not have lost America as a colony if statisticians had taught King George III about conditional independence.
2. 1789 – The French wouldn't have needed to storm the Bastille if Poisson had developed a system for the equitable distribution of wealth rather than just a distribution of probability.

And the number one historical event that could have been influenced by statisticians, had there been any, is

1. 1347 – The Black Plague might not have been so bad if...never mind. No one would have listened to statisticians then, either.