

# Do's and Don'ts in Survey Design and Reporting

*Reporting Survey Data*



ASSOCIATION FOR INSTITUTIONAL RESEARCH  
Data and Decisions for Higher Education

Welcome to AIR's webinar series – thank you for attending! Today's webinar is the second of two focused on survey research.

## Presented by:



**Darlena Jones, Ph.D.**

*Director of Assessment and Research  
Association for Institutional Research*



My name is Darlena Jones and I am the Director of Assessment and Research for the association. I also lead the development of new educational opportunities for AIR.

In my previous role at a for-profit company, I wrote and managed over a hundred national benchmarking assessment projects surveying over a million students a year. I was also responsible for the online and written reports that were generated for over 1600 clients annually. But, when I started in that role, I was a new report writer and made a lot of mistakes. This webinar will discuss lessons I've learned.

# Housekeeping

We welcome questions! Please use the “Questions” section of the GoToWebinar control panel.

Slides available in the “Handouts” section and on the National Survey’s webpage ([www.airweb.org/NationalSurvey](http://www.airweb.org/NationalSurvey))

Webinar is being recorded and will be available

Please respond to the evaluation when you receive it via email. We appreciate your feedback!



Before we begin, we have a few housekeeping items to discuss. First, your microphone will stay muted throughout the webinar but if you would like to ask me a question, please type your question into the “Questions” section of the GoToWebinar control panel and click “Send”. I will receive those questions and answer as we time.

Second, if you would like a copy of the slides, please click on the “Handouts” section of the GoToWebinar control panel and download the file.

Next, this webinar is being recorded and will be made available.

And, finally, at the end of this webinar, you will receive an email to a short survey asking for feedback about the webinar.

# Second in a Two-Part Webinar Series

## **Webinar 1:**

*Survey Instrument Design*

» October 8, 2019

## **Webinar 2:**

*Reporting Survey Data*

» October 15, 2019



We developed this two-part webinar series to help higher education professionals improve the quality and reporting of data for decision making. Today's webinar focuses on the survey instrument design while next week's webinar looks at ways to report survey data more effectively.

# Why Worry about Effective Reporting?



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Before we begin working to improve our reporting, we need to ask ourselves why? Why do we need to go to all this trouble to write good reports?

The answer is pretty simple – poor or misleading reporting leads to bad decisions. And, those bad decisions could lead to bad outcomes for the institution.

So, if we're committed to a data-informed decision culture, we must also be committed to high quality reporting.



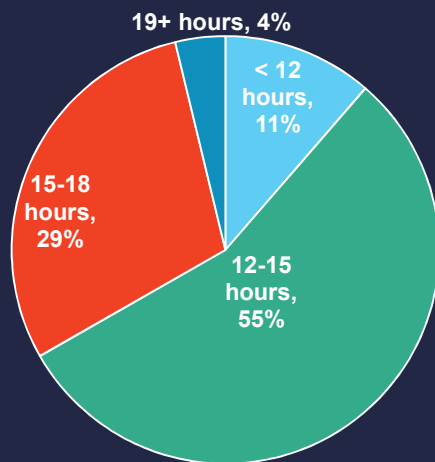
# Do's and Don'ts in Simple Visual Displays of Data



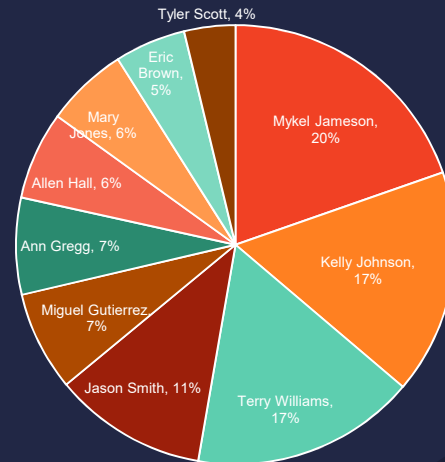
Now, let's start our "do's and don'ts" conversation by looking at some simple visual displays of data.

# Pie Charts

# of Credit Hours Currently Taking



% of Respondents by Advisor

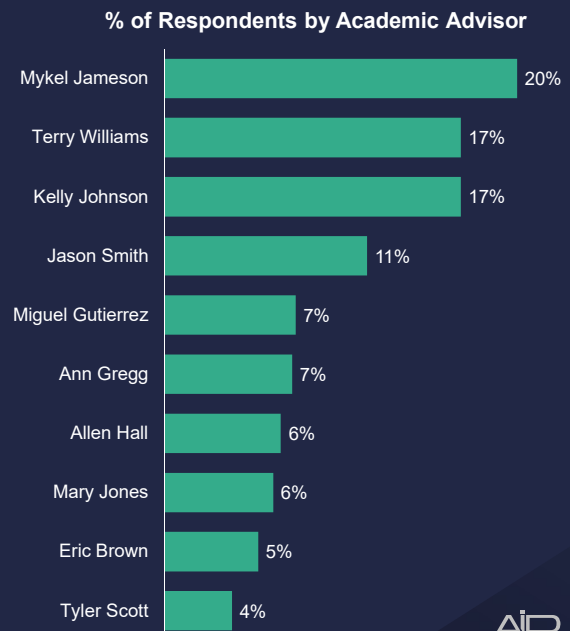
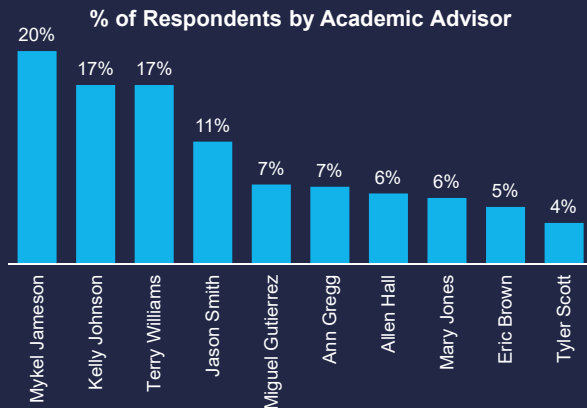


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Everyone's seen a pie chart. A pie chart displays information in an easy-to-read "piece of pie" format. The larger the slice, the more of that data was gathered. Pie charts can be used with any type of close-ended survey question like categorical or Likert-scaled. Here, we show the percentage of first-year students taking various credit loads.

A pie chart is a simple chart to create but an easy one to get wrong. Here is an example of a pie-chart-don't. There are so many response options that it's hard to read! Consider collapsing some categories so there is no more than 5 categories being plotted. If not possible to collapse, then consider another chart type.

# Bar Chart



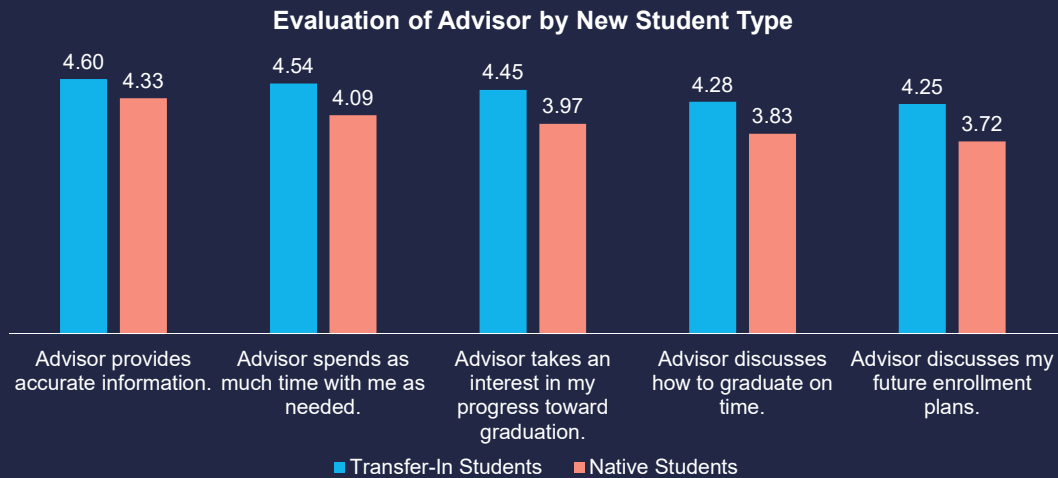
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Another simple chart is a bar chart. A bar chart uses bars to compare data across categories. The important thing to know is that the taller the bar, the greater its value. Bar charts consist of two axes: the horizontal axis (or x-axis) shows the response categories - in this example, the names of the academic advisors in an advising survey. And, the vertical axis (or y-axis) is the percentage of respondents who selected that advisor's name in the categorical question. The colored bars are the data series.

A vertical bar chart is another simple chart to create but can easily go wrong. You need to restrict the number of response options when the x-axis becomes difficult to read. In this example, each of the response category descriptions are easily read.

A horizontal bar chart is useful when the response categories of a vertical bar chart become difficult to read. Here is that same data plotted in a horizontal bar chart.

## Bar Chart (continued)

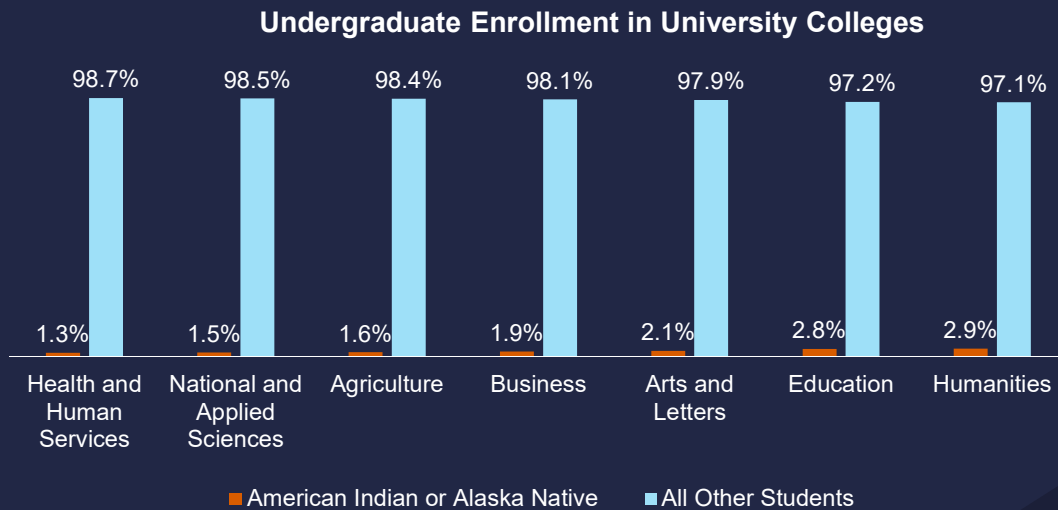


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You can also use bar charts to show differences between groups of respondents. In this bar chart, we calculated the mean for questions on an Academic Advising survey and disaggregated those data by whether they were a new-transfer-in student or a new native student. For every item, transfer-in students rated their advisor higher than native students; that message is easily conveyed to the reader since the blue bars are taller than the orange bars.



## Bar Chart - Don't!

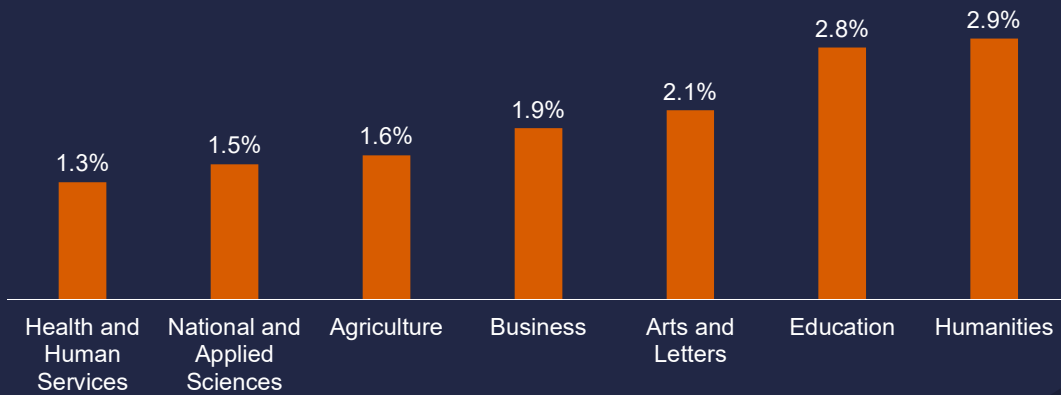


However, a “bar-chart don’t” is to report data in the same chart when those values are not commensurate. Here, we have charted the percentage of undergraduates in an institution’s colleges by American Indian or Alaska Native status compared to all other students. It’s virtually impossible to see the trend in the American Indian/Alaska Native status since the other data overwhelms the chart.



## Bar Chart - Fixed

Percentage of Enrollment in University Colleges:  
American Indian or Alaska Native

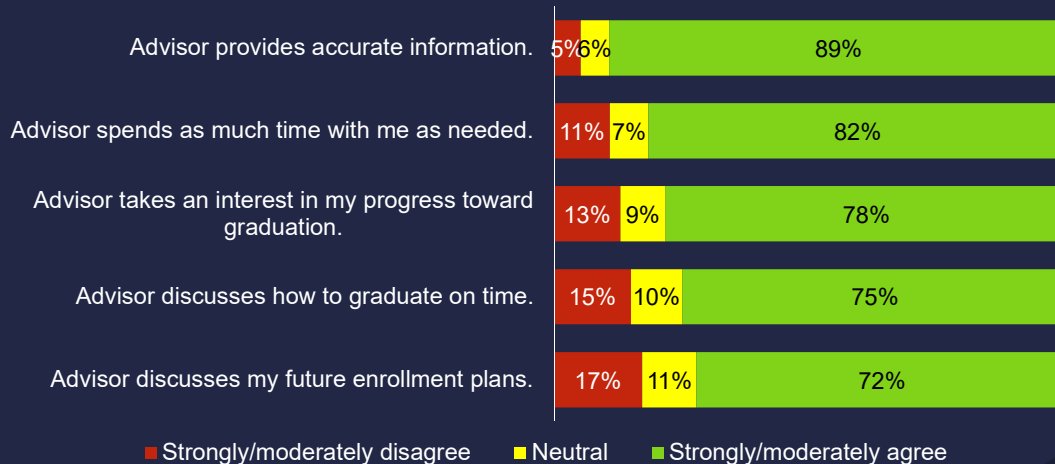


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But, if you separate out those data and plot in their own chart, it's much easier to view. Now, we can easily distinguish the colleges with higher enrollments of American Indian or Alaska Native students.

# Stacked Bar Chart

Evaluation of Academic Advisor



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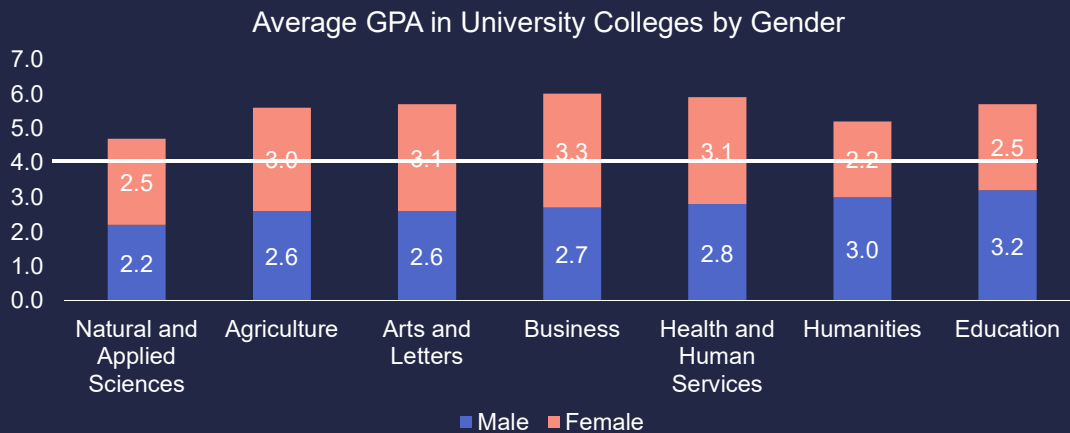
A stacked bar chart is a chart that is used to break down and compare parts of a whole. Each bar in the chart represents a whole, and segments in the bar represent different parts or categories of that whole. To “stack” data in chart means to stack each value on top of the previous.

In this example, we show a 100% stacked bar graph, and, as you can see, the values of each bar add to 100%. Here, we chart 5-point Likert-scaled questions where the first two answer options are collapsed (Strongly disagree and Moderately disagree) and the last two answer options are collapsed (Strongly agree and Moderately agree). We calculated the percentage of respondents in the bottom, middle, and top ranges and plotted them using this chart type.

It’s easy for the reader to scan this chart to find the question with the highest and lowest percentage of respondents in the “agree” category. In this example, 89% of respondents agreed that their advisor provides accurate information while only 72% agreed that their advisor discusses their future enrollment plans.



## Stacked Bar Chart – Don't!



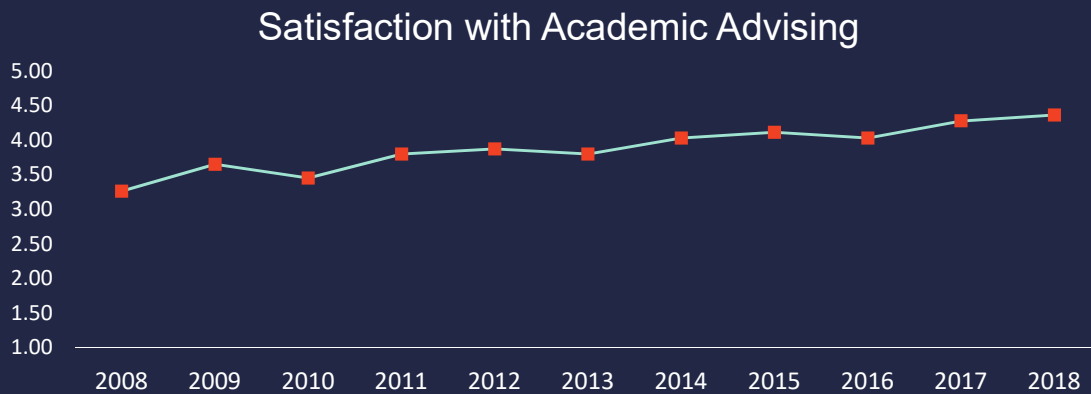
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A big “don’t” for a stacked bar chart is stacking data that causes confusion. For example, here we show a stacked bar chart for the average GPA across university colleges by gender. The blue bar represents the average GPA earned by men and the orange bar represents the average GPA earned by women.

While not technically wrong, it is deceiving to the reader because we’ve stacked (or in this case, added) GPAs together, so that it looks like we have GPAs above 4.0 which is impossible.

So, if you’re going to use a stacked bar chart, make sure the data makes sense to stack.

# Line Chart



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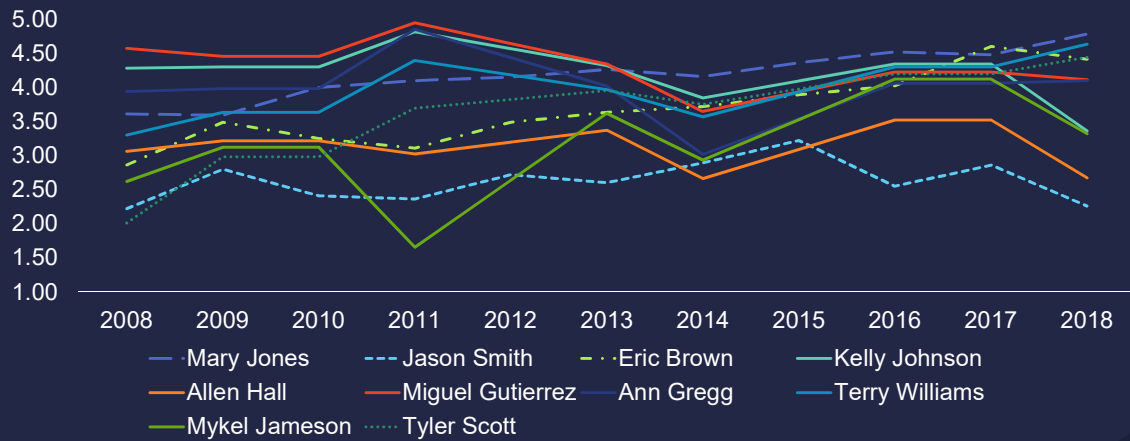
A line chart displays information as a series of data points called 'markers' connected by straight line segments. Line charts are typically reserved for longitudinal data which means the same survey is administered over several years.

As an example, we graphed the longitudinal results from an academic advising survey's metric called "Satisfaction with Academic Advising" to show that, while there are some dips, the overall trend shows improvement.



## Line Chart – Don't!

Longitudinal Trend of Satisfaction with Academic Advising by Advisor



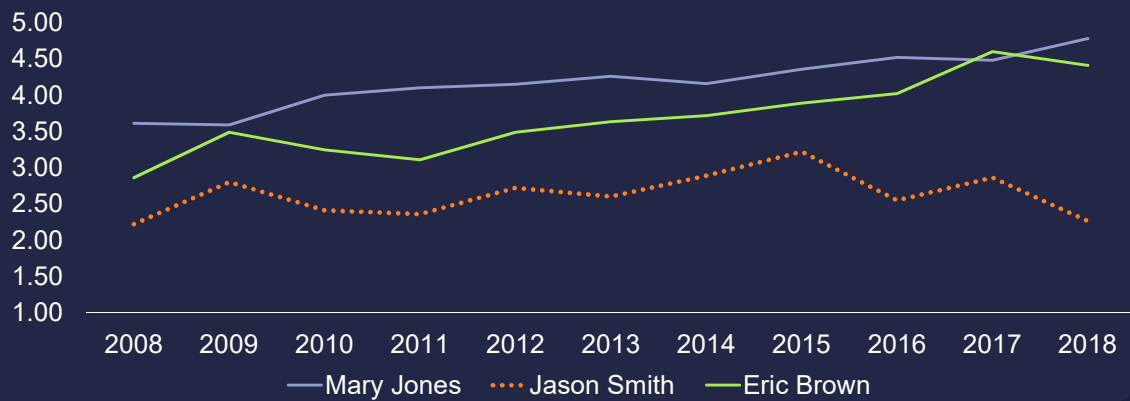
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A major “don’t” in creating line charts is plotting too much data in the same graph. Even if you have a wealth of different colors or line types like dashed or dotted, there is no way to make sense of this table.



## Line Chart - Fixed

Longitudinal Trend of Satisfaction with Academic Advising by Advisor



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But, having two or three lines on a single chart with enough separation of the data makes a readable chart. Here we see that Mary Jones and Eric Brown have shown improvement over time while Jason Smith hasn't seen the same level of improvement.

## Data Table

Evaluation of Advisor by New Student Type	Transfer-In Students Mean	Native Students Mean
Advisor provides accurate information.	4.60	4.33
Advisor spends as much time with me as needed.	4.54	4.09
Advisor takes an interest in my progress toward graduation.	4.45	3.97
Advisor discusses how to graduate on time.	4.28	3.83
Advisor discusses my future enrollment plans.	4.25	3.72



A data table displays calculated numbers in an easily-read format instead of creating a chart. If you know your audience is receptive to numeric data and its important that they have the actual numbers and not just viewing a trend, then consider using data tables.

When formatting your data table, consider using shading to help the reader scan across the line.

# Data Table – Don't!



Full Question Text	Answer Text	# Responses	% Total
Who is your academic advisor? This is a required question.	Mary Jones	29	6%
Who is your academic advisor? This is a required question.	Jason Smith	54	11%
Who is your academic advisor? This is a required question.	Eric Brown	25	5%
Who is your academic advisor? This is a required question.	Kelly Johnson	79	17%
Who is your academic advisor? This is a required question.	Allen Hall	31	6%
Who is your academic advisor? This is a required question.	Miguel Gutierrez	35	7%
Who is your academic advisor? This is a required question.	Ann Gregg	34	7%
Who is your academic advisor? This is a required question.	Terry Williams	79	17%
Who is your academic advisor? This is a required question.	Mykel Jameson	94	20%
Who is your academic advisor? This is a required question.	Tyler Scott	18	4%
Did you transfer to this institution from another postsecondary institution?	Yes	164	38%
Did you transfer to this institution from another postsecondary institution?	No	271	62%
How many credit hours are you currently taking?	Less than 12 credit hours	54	11%
How many credit hours are you currently taking?	12-15 credit hours	263	55%
How many credit hours are you currently taking?	15-18 credit hours	140	29%
How many credit hours are you currently taking?	19 or more credit hours	18	4%
What grades have you earned in your classes this term?	Mostly Ds or lower	15	4%
What grades have you earned in your classes this term?	Mostly Cs	29	8%
What grades have you earned in your classes this term?	Mostly Bs	129	35%
What grades have you earned in your classes this term?	Mostly As	196	53%
During this term, how often have you met with your advisor?	Met once for mandatory advising	44	9%
During this term, how often have you met with your advisor?	2 times	106	22%
During this term, how often have you met with your advisor?	3 times	164	34%
During this term, how often have you met with your advisor?	4 or more times	127	27%
During this term, how often have you met with your advisor?	More than 5 times	36	8%
During this term, what campus events did you attend?	Advising Fair	82	100%
During this term, what campus events did you attend?	Career Fair	53	100%
During this term, what campus events did you attend?	Personal Statement Writing Workshop	5	100%
During this term, what campus events did you attend?	Leadership Development Workshop	6	86%
My academic advisor provides accurate information.	Strongly disagree	11	2%
My academic advisor provides accurate information.	Moderately disagree	13	3%
My academic advisor provides accurate information.	Neutral	26	6%
My academic advisor provides accurate information.	Moderately agree	140	30%
My academic advisor provides accurate information.	Strongly agree	275	59%

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The big “data table don’t” is don’t put a huge amount of data in a table. You’re asking your reader to find the connections that you wouldn’t, or couldn’t, make for them.

## Data Table – Fixed



Who is your academic advisor? This is a required question.	# Responses	% Total
Mary Jones	29	6%
Jason Smith	54	11%
Eric Brown	25	5%
Kelly Johnson	79	17%
Allen Hall	31	6%
Miguel Gutierrez	35	7%
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Did you transfer to this institution from another postsecondary institution?	# Responses	% Total
Yes	164	38%
No	271	62%
How many credit hours are you currently taking?	# Responses	% Total
Less than 12 credit hours	54	11%
12-15 credit hours	263	55%
15-18 credit hours	140	29%
19 or more credit hours	18	4%
What grades have you earned in your classes this term?	# Responses	% Total
Mostly Ds or lower	15	4%
Mostly Cs	29	8%
Mostly Bs	129	35%
Mostly As	196	53%
During this term, how often have you met with your advisor?	# Responses	% Total
Met once for mandatory advising	44	9%
2 times	106	22%
3 times	164	34%
4 or more times	127	27%
More than 5 times	36	8%

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If you absolutely must have large data tables, then organize those data with sub-headers to make those data more consumable.

# General Do's and Don'ts

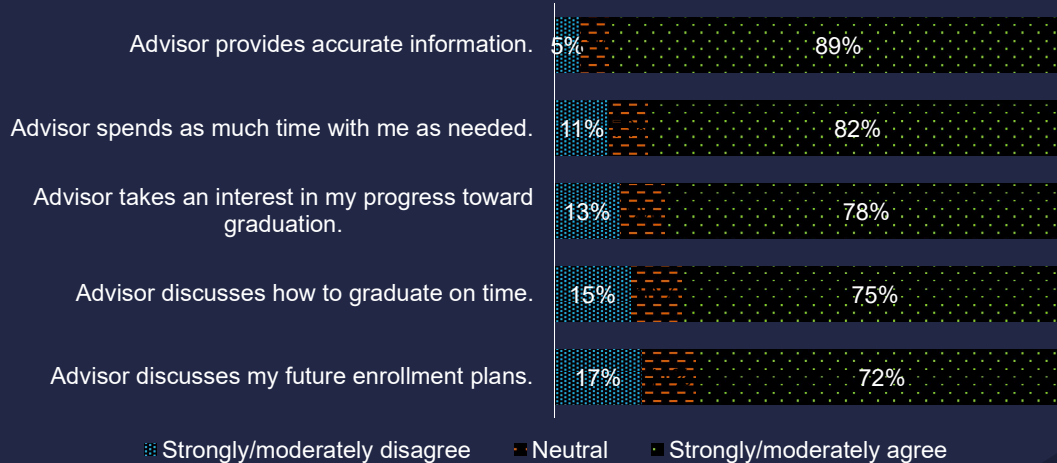


Now, let's move into some general do's and don'ts



## Choose graph colors/patterns wisely

Evaluation of Academic Advisor



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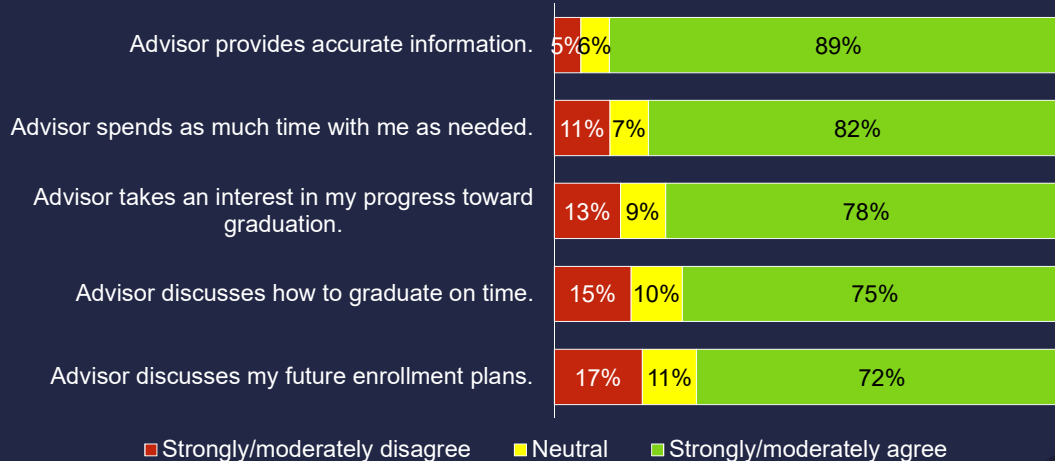
The owner of the company I worked for wanted us to use purple, blue, orange and all kinds of weird patterns in our graphs.

In reporting, I have a 5 second rule. If my reader can't understand the message I've relaying in 5 seconds, I've done a poor job of communicating. If your reader spends 5 seconds trying to understand your color coding or trying to read information contained in a harsh pattern, then I might lose their attention.



## Use “stoplight” colors when appropriate

Evaluation of Academic Advisor



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I’m a fan of the “stoplight” color scheme when it’s appropriate (red signals dissatisfaction/disagreement, yellow signals neutral ratings, and green signals satisfaction/agreement).

In this chart, we have color coded the three response categories in red, yellow and green. The beauty of the stoplight color scheme is that you don’t have to explain it; everyone intuitively sees green and thinks “positive”. Now, my user doesn’t have to spend their 5 seconds reading the legend.

It took me a year to convince my previous boss but, eventually, he agreed that a recognizable color scheme is better.

## Use directional symbols

Evaluation of Advisor by New Student Type	Transfer-In Students	Native Students
Advisor provides accurate information.	↑	↔
Advisor spends as much time with me as needed.	↑	↔
Advisor takes an interest in my progress toward graduation.	↔	↓
Advisor discusses how to graduate on time.	↔	↓
Advisor discusses my future enrollment plans.	↔	↓
↑: Mean of 4.50 or higher; ↔: Mean between 4.00 to 4.49; ↓: Mean less than 4.00		



If your audience is not comfortable reading data, consider using a directional symbol instead.

Here, we took the data table from the previous slide, calculated a mean for each survey item, and replaced the mean values with arrows. We also used the “stop-light” color scheme to further help our reader identify higher means, moderate means, and lower means.

Don’t forget to give your reader a legend that explains how you assigned color and directional symbols.



## Use directional symbols – Don't!

Evaluation of Advisor by New Student Type	Transfer-In Students	Native Students
Advisor provides accurate information.	■	■
Advisor spends as much time with me as needed.	■	■
Advisor takes an interest in my progress toward graduation.	■	■
Advisor discusses how to graduate on time.	■	■
Advisor discusses my future enrollment plans.	■	■
■: Mean of 4.50 or higher; ■: Mean between 4.00 to 4.49; ■: Mean less than 4.00		



You might be tempted to simplify your table even further and use the same symbol for each item (like a box) so that only the color indicates the mean.

But, for those with color vision deficiency (which is known as “color blindness”), this data table is useless since they might not be able to distinguish between the colors.



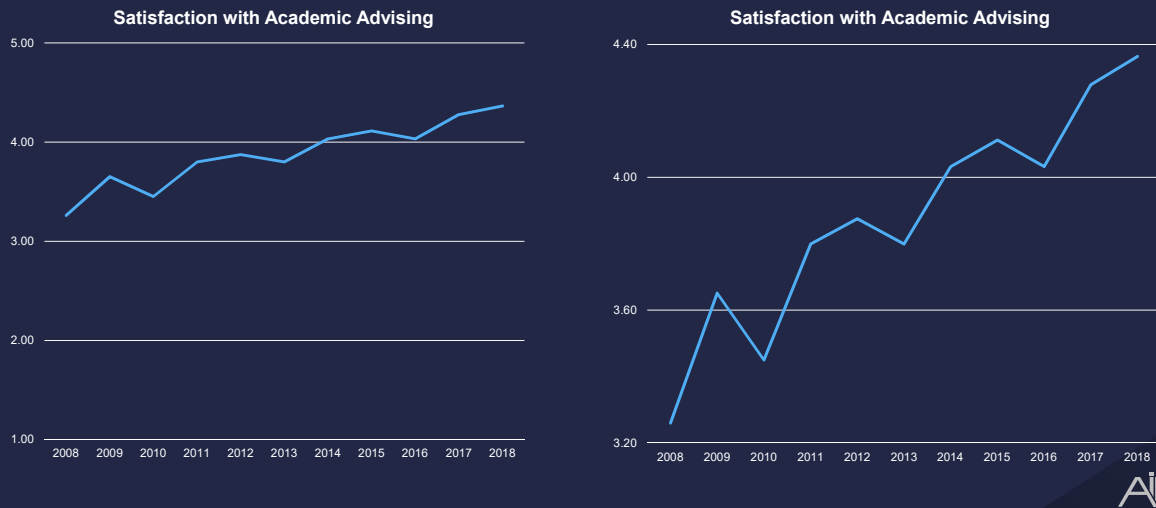
## Use directional symbols - Fixed

Evaluation of Advisor by New Student Type	Transfer-In Students	Native Students
Advisor provides accurate information.	↑	↔
Advisor spends as much time with me as needed.	↑	↔
Advisor takes an interest in my progress toward graduation.	↔	↓
Advisor discusses how to graduate on time.	↔	↓
Advisor discusses my future enrollment plans.	↔	↓
↑: Mean of 4.50 or higher; ↔: Mean between 4.00 to 4.49; ↓: Mean less than 4.00		



So, best practices tell us that, if you want to reduce your data to a single symbol, use color AND a directional symbol like this.

## Be careful with truncating the scale



This chart is an example of a trend line showing satisfaction with academic advising with a steady improvement in scores.

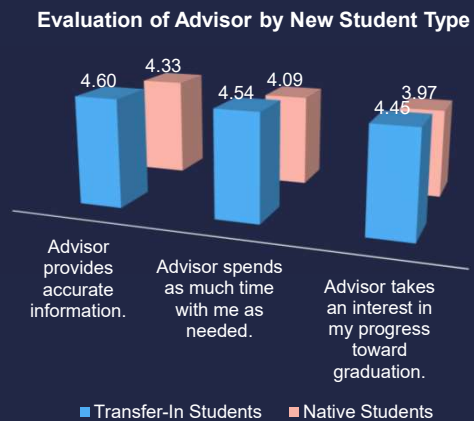
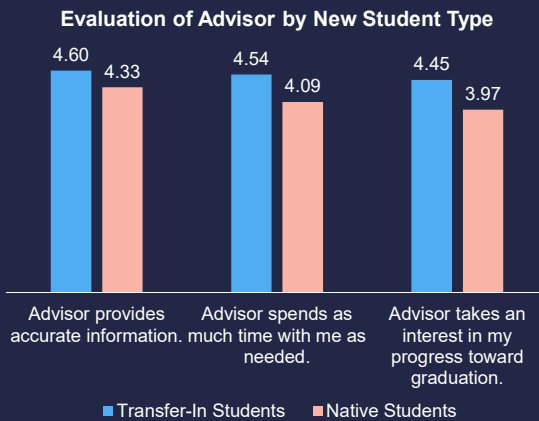
But, this second chart appears to have a much steeper and more impressive trend line. Would you believe this is the same data?

The left-side chart has the y-axis scale set from 1.0 to 5.0 which is the range of the Likert scale while the chart on the right has a truncated scale from 3.2 to 4.4. Truncating the scale effectively zooms into the trend line. This process is useful when there's a trend that is important but is masked if the scale is too large.

"Truncating the scale" isn't necessarily a "don't" but more of a "be very careful" because it can mislead the reader if he/she isn't skilled enough to notice the y-axis scale change or understand how small differences can appear large. When there are situations that call for this, make sure to note in the report that the scale has been truncated.



## Don't use 3-D charts



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My next “don’t” is – don’t use 3-D charts. Here we have a two-dimensional bar chart showing the mean of questions evaluating an academic advisor by the type of new student.

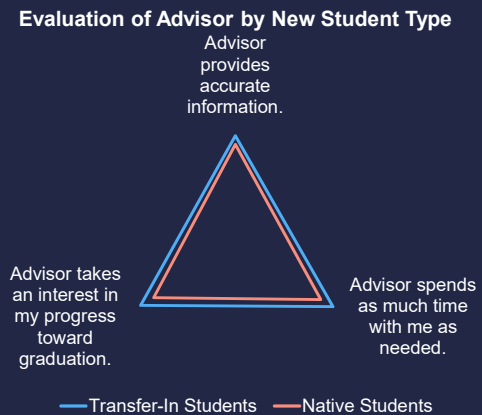
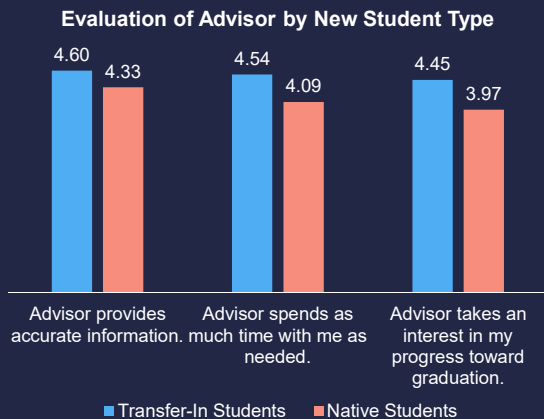
The right-side chart is the exact same data but now placed in a 3-D bar chart. While the chart may be more visually appealing, the 3-D enhancement distorts the magnitude of the differences across categories, making smaller differences look larger and minimizing smaller differences.

In this case, the orange bars associated with native students appear taller than the purple bars for the transfer-in students even though the means for the transfer-in students are higher than the native students. This distortion can cause significant confusion for your reader.

So, please don’t use 3-D charts unless you’re confident your reader can interpret the findings correctly.



## Don't use unusual chart types



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We've discussed several different chart types like pie, bar, and line. These are straightforward charts that most people can read with minimal instruction. There are other chart types, for example the radar or spider chart, that are popular amongst those who study visual data representation but it takes a knowledgeable reader to understand them.

As an example, let's use the metrics evaluating an academic advisor disaggregated by new student type. Most people can look at the bar chart and understand that transfer-in students rated these metrics higher than native students since the blue bars are taller than orange bars.

Now, let's plot those data on a radar or spider chart. If you study this plot long enough, you'll understand that the blue bar is always outside the orange bar and, thus, the mean is always higher. But, how long will it take your reader, who is unfamiliar with radar charts, to figure this out?

The rule-of-thumb for reporting is, if you can't relay your message in 5 seconds, you've lost your reader. Most people don't have the time or the commitment to study your report to understand what you're saying. You need to keep your message clear and concise. Which is more clear and concise – a simple bar chart or a radar chart?

So, while it's not sexy, when in doubt, stick with basic chart types like bar, line, or pie.

## Put information in a meaningful order

Question Description	N	Mean	Std Dev
Q1. Advisor knowledgeable about: Course requirements for general education/core curriculum	465	4.41	0.90
Q2. Advisor knowledgeable about: Degree requirements	466	4.13	1.21
Q3. Academic advising enhanced ability to: Identify majors that align with your professional goals	470	4.23	1.13
Q4. Academic advising enhanced ability to: Select courses for an on-time graduation	455	3.89	1.34
Q5. Academic advising enhanced ability to: Obtain financial aid if needed	461	3.98	1.26
Q6. Academic advising enhanced ability to: Locate help to overcome academic difficulties	470	4.36	0.97
Q7. Academic advising experience was an accepting environment.	465	4.40	0.93
Q8. Academic advising was a positive academic experience	437	3.80	1.31
Q9. I would recommend this advising experience to a close friend	455	4.00	1.22

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As I just said, you have 5 seconds to get your point across to your reader before they give up, so you have to make sure that your story is easily consumed. One way to do that, is to order your information by the story you're trying to tell.

Using our academic advising survey as an example, we want the reader to understand in which area academic advisors excel in and which area they need improvement. How can we order the data to convey that message loud and clear?

In this table, data are sorted by the survey's question number. Can you quickly identify which item has the highest and lowest mean in 5 seconds or less? If not, you just lost your reader.



## Put information in a meaningful order

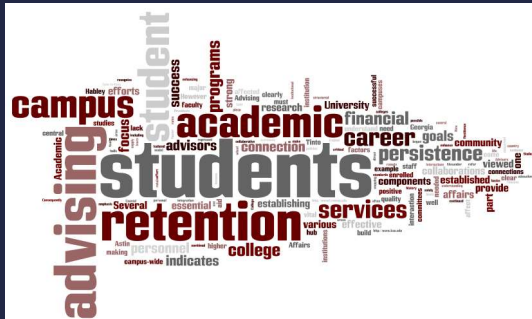
Question Description	N	Mean	Std Dev
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Q4. Academic advising enhanced ability to: Select courses for an on-time graduation	455	3.89	1.34
Q8. Academic advising was a positive academic experience	437	3.80	1.31



Now look at that same table but the data has been sorted from highest to lowest mean. Now your reader can look at the first and last question and know exactly what were the highest and lowest performing areas. In addition, I added a soft green and red color to subtly indicate high and low mean questions.

# Displaying Open-Ended Data

## Word Clouds



## Themes

Theme	# Instances
Homesickness	43
Financial issues	28
Lack of social integration	15
Poor academic performance	12
Physical/mental health issues	8



Your surveys will likely contain at least one open-ended text questions. These questions allow participants to explain, in their words, their thoughts and ideas. While this survey question type is powerful, it's also challenging to report. There are text-mining software available but I haven't had much luck using those.

One simple way to visually display text data is through a word cloud. Word clouds present words found in the responses and are sized based on the number of times that word is mentioned. The larger the word, the more often it was found in the text.

Another option is to code the text responses by hand and create a simple data chart listing the number of instances each theme has. While coding is a good method to summarize these questions, be aware of bias by the person doing the coding.

## Questions & Discussion



Let's pause to answer some questions. As people are formulating their questions, if they any, I'm going to answer a question I get a lot.

***On your charts, you always display the data value. Why?***

I'm a big fan of showing the data value in the chart when it can be easily read so, whenever I can, I display the data. That way, there's no confusion about what the table means. In addition, if your reader has a vision deficiency that prevents them from seeing color, then having the data there still allows them to see the information.



# The Survey Research Report



Now that we have discussed some visual representations of data, we're ready to write and share our final report.

# Delivering the Report



**Oral  
Presentations**



**Interactive  
Dashboards**



**Written  
Report**



Before we begin our conversation – let’s stop for a minute to talk about how you’re going to deliver that report. There are three main formats.

The first, and most active, is the oral presentation. Here, you’re meeting with the requester and you’re presenting those results which allows the requester to ask you questions. Your enthusiasm for your work and the topic will shine through. In my opinion, this is always the best way to deliver results but requires the requester to take time from their schedule which may be difficult.

Interactive dashboards fall between active and passive forms of communication. If the reader is data literate then he/she can actively ask questions of the report. But, if that reader is not data literate or doesn’t have time to learn how to use the dashboard, then your message isn’t communicated.

And, the most passive form of communication is a written report. Here you send the requester a summary report for them to read. You’re not there to answer questions and make sure the requester understands the results. While this is my least favorite way to deliver information, it’s the method most commonly used.

# Executive Summary

## *Academic Papers...*

- » Thoroughly explore a topic
- » Are long and methodical
- » Findings are buried in the paper

## *Executive Summary reports...*

- » Quickly convey findings
- » Are short and concise (2 pages)
- » Findings are front and center



So, we're going to assume that we're writing a summary report of our results. There have been volumes of books written on effective reporting which we invite you to explore but, for today, we'll focus on the most important report for decision makers: The Executive Summary. Most stakeholders (like presidents, deans, faculty, students) don't have a lot of spare time to study reams of analyses so a well-written Executive Summary may be your only opportunity to communicate the results of your work.

An Executive Summary is NOT an academic paper or thesis.

An academic paper's purpose is to thoroughly explore a topic while an Executive Summary's purpose is to convey findings quickly.

Academic papers are typically long and methodical but an Executive Summary is short and concise. Typically no more than two pages, easy to read without a lot of statistical jargon, and includes visual charts and tables to highlight key findings.

Academic papers typically begin with an abstract followed by a lengthy literature review and a discussion of research methodologies. The important findings are found buried deep in the paper. An Executive Summary is the exact opposite. You won't include a literature review or research methodologies in the summary but you should include those in an appendix. The reader assumes you are familiar with the literature and appropriate methodologies and have used that information to inform the study and report. You'll discuss your findings almost immediately in an Executive Summary.

# Executive Summary Recipe



## ***Page 1***

**Section 1 - Project Description (~1/4 page)**

**Section 2 - Major Findings (~3/4 page)**



## ***Page 2***

**Section 3 - Recommendations or Next Steps (~1/2 page)**

**Section 4 - Summary (~1/2 page)**

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**Appendices**



This is a recipe for an Executive Summary that I've used for years and has been well vetted.

Section 1 is the Project Description - it should be no more than a quarter of a page.

The second section is "Major Findings". This is the meat of the report. This section should be around three-fourths of a page to a full page.

Section 3 is "Recommendations or Next Steps" and should be no more than a half-page.

The fourth section is "Summary". These are the three to five most important "takeaways" for this project.

The last section, Appendices, is as long as you need it to be.

# Section 1: Project Description

What should you include?

- › The mission, the requester, and units involved
- › The launch and close date, data collection type
- › A description of the population, number of participants, number of responses, and the response rate
- › A statement confirming data quality



AIR

The Executive Summary starts with a brief description of the project – no more than one-fourth of a page. Consider including the following:

- The mission of the survey, the person or unit who requested the project be conducted, and any other institutional units that were involved
- The survey launch and close date and how the data was collected (was it an online survey, paper survey, focus group)
- A description of the target population, number of participants, number of responses, and the response rate
- A statement confirming the quality/representativeness of the collected data to the target population

Remember to keep your project description short and concise – no more than a quarter page.

## Section 2: Major Findings

What should you include?

- › The mission? The research questions? Requestor input?
- › Create visual representations of those data
- › Choose the most critical results; use the Appendix for details



AIR

As the survey researcher, your interpretation of the data is critical. Rarely will your readers have the knowledge, expertise, time, or access to interpret these survey data for themselves so they rely on you to paint an honest and thoughtful picture. Your selection of the most important and appropriate items, as well as your methods of presentation and the conclusions drawn will be crucial to the success of decision-makers in your organization.

But, how do you decide what are “major findings”? There is so much information that can be gleamed from even the smallest surveys. How do you decide?

Go back and remind yourself of the mission of this survey. Review the research questions and any notes you made about what you hoped to learn from the study. Also, work with the original requester of this work to get their input.

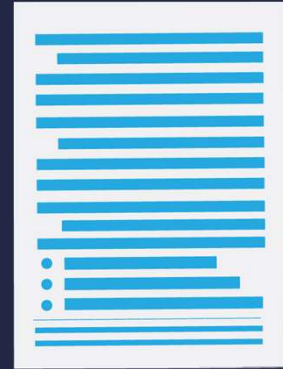
Next, the data you’ve identified as answering the mission and research questions need to be visually represented to tell the story better. Use simple and colorful charts or well formatted data tables. Keep in mind that some people may only look at your visual charts/tables and may never read the accompanying descriptions. Make sure that you tell your story through your visual representations.

While you may be tempted to discuss all of the research results, cherry-pick the most critical and push other information into an Appendix which can be referenced from the Executive Summary.

## Section 3: Recommendations/Next Steps

What should you include?

- » Draft recommendations and share with your supervisor and/or project requester before disseminating the report
- » If subject is outside your expertise, work with a project requester/SME



AIR

Now that we have identified the major findings, we must link theory to practice and provide some practical recommendations for improvement or next steps.

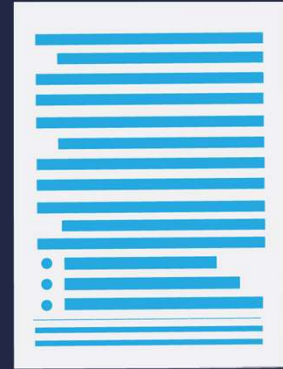
First, if you are comfortable with the subject matter then draft your recommendations. Share those with your supervisor and/or the project requester before disseminating the report. They should know if there are other issues to be considered. For example, in our Academic Advising survey, we could easily recommend that all academic advisors need to undergo comprehensive training. The project requester might disagree with that recommendation and change it to “select academic advisors should receive additional training”. Since, we ultimately work for the project requester, we must make sure their voice is heard as long as it doesn’t conflict with the results.

If the survey explores content outside your expertise and you don’t feel comfortable drafting recommendations, then work with your project requester and/or another subject matter expert and have them frame recommendations and next steps.

## Section 4: Summary

What should you include?

- » Likely the most important section of the report
- » The 3-5 “takeaway” points you want your reader to remember



The Summary section should be a short, bulleted list of summary ideas or talking points (3 to 5 bullet points). If a stakeholder can only spend a couple of minutes reading your report, make sure that the Summary hits the most important issues.

## Section 5: Appendices

Potential appendices to include:

- Literature review
- Research methodologies
- Sample size construction and testing
- Reliability and validity testing
- In-depth analyses
- Advanced analyses like statistical testing



AIR

In the Appendix, you have the luxury of telling the full story of this research project. For those more accustomed to writing academic papers, this is where you could report the following:

- Literature review
- Research methodologies
- Sample size construction and testing
- Results from reliability and validity testing
- In-depth analyses showing differences by participant group and internal or external benchmarking
- Results of advanced analytics like statistical testing

There is no limit to the size that the Appendix section can be. You will likely be constrained by time and energy but you won't be constrained by protocol. But, only include the appendix if the audience needs that level of detail.

## Questions & Discussion



Let's pause to answer some questions. As you're writing in your question, I'm going to discuss a question I get asked often.

***Do I need to write different Executive Summaries for different people on my campus?***

The answer is, no but you might want add a new appendix. For example, if you conducted a survey to measure the factors affecting student retention, you should find that nearly every department at your institution would be interested in the results. Would you share the exact same Executive Summary? Yes but you might also consider writing an appended, targeted 1-page report for each specific office. So, while the Executive Summary remains the same, the targeted report for Residence Life might include how residents are impacted by these factors. The targeted report for Student Athletics would look at issues affecting student athletes.

If you can speak to the needs of each unit affected by your study and discuss issues you know they're interested in, you'll likely get them to read your report.

Alternatively, you could adjust the "Major Findings" section of the Executive Summary to include issues of interest to the particular audience.

***Another thing I get asked about is what to include in an oral presentation.***

In this case – it's essentially the same as your written executive summary but, because it's an oral presentation, you can easily inject information that you know the audience will be interested in. And, because you're in the same room, you read their body language and know if something is confusing.

## Learn More

### Publications (sample)

- Trudy H. Bers and Jeffrey A. Seybert. (1999). *Effective Reporting* [PDF file]. Tallahassee, FL: AIR. Retrieved from [www.airweb.org](http://www.airweb.org).

### Survey Research/Assessment Conference Content (sample)

- AIR Forum
- IUPUI Assessment Institute
- NASPA Assessment and Persistence



There have been volumes written about effective reporting. Here is one book that is available for free with an AIR membership – you can download this book from our Publications section on the website.

In addition, many organizations, like AIR, host educational opportunities to improve your survey research and reporting skills. I've attended these and recommend them.

# Thank You

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Darlana Jones, AIR



Thank you for your participation in this webinar series! If you would like to check out other educational opportunities on survey research, assessment, and statistics, please visit the AIR website.

Also, don't forget that you'll be receiving an email with a link to a survey to give us feedback.

Thank you for attending and have a great rest of your day and week!