

# The Six Phases of Data Analysis

---

1. Ask
2. Prepare
3. Process
4. Analyze
5. Share
6. Act

## Ask

---

1. Define the Problem to be Solved.
2. Understand Stakeholders expectations.

- First, Defining a problem means you look at the current state and identify how it's different from the ideal state. Usually there's an obstacle we need to remove or something wrong that needs to be fixed.
- To understand expectation of stakeholders you need to identify who the stakeholders are. They may include, **your manager, an executive sponsor, or a sales partner..** There can be many stakeholders, but what they all have in common is that **they help make decisions, influence actions or strategies, and have specific goals they want to meet.** they also care about the project and that's why it is so important to understand their expectations.

## Prepare

---

- This is the step where you collect and store data that will be used in the project.
- Learn about the different types of data and identify the types important to solving a particular problem.

## Process

---

- Here you find and eliminate any errors and inaccuracies that can get in the way of the results. This usually means cleaning data, transforming it into a more useful format, combining two or more datasets to make information more complete and removing outliers, which are any data points that could skew the information.
- Also this is when you check the data to make sure it's complete and correct. This phase is all about getting the details right. You'll fix typo's, inconsistencies, or missing and inaccurate data.

## Analyze

---

- Analyzing the data involves using tools to transform and organize that information so that you can draw useful conclusions, make predictions, and drive informed decision making.
- Here we use tools such as spreadsheets and SQL Databases.

## Share

---

- This is where an analyst interprets results and shares they with others to help stakeholders make effective data-driven decisions.
- Creating Visualizations happens during this phase.

## Act

---

- This is the time when the company takes everything you, the data analyst, has learned and puts decisions into action.