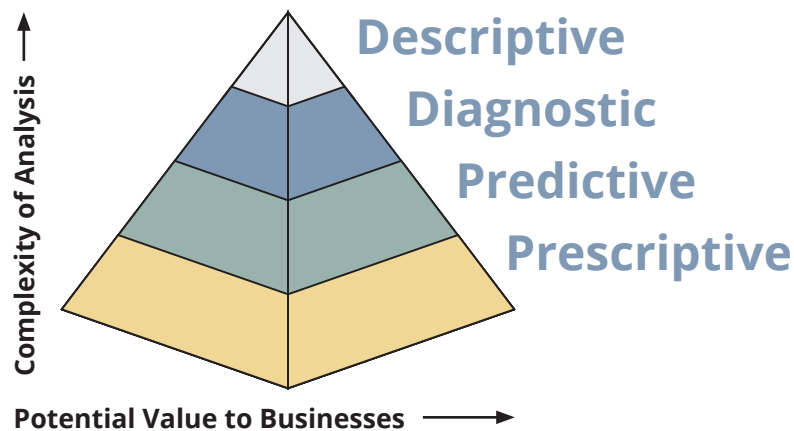# 4 Types of Business Analytics

Descriptive analytics The simplest form of analytics using data aggregation and mining techniques. It describes or summarizes an organization's existing data to get a picture of what is currently happening or has happened in the past. Associations can use descriptive analytics for a deeper look into the behavior of their members and how they can target marketing strategies to their audiences.

Diagnostic analytics shifts from the "what" of past and current events to "how" and "why." It focuses on past performance to determine which factors influence specific trends. Diagnostic analytics uses probabilities, likelihoods and the distribution of outcomes to understand why events may occur. Diagnostic analysis has limited ability to provide actionable insights because it provides relational information as opposed to confirmed causes.

Predictive analytics forecasts the possibility of future events by using statistical models and machine learning techniques. This type of business analytics builds on descriptive analytic results to develop models that interpret the likelihood of specific outcomes. This type is often used by sales and marketing teams to forecast opinions of specific customers based on social media data.

Prescriptive analytics uses past performance data to recommend specific actions that need to occur to have the best possible results. Predictive analytics allows us to understand what is likely to happen next, while prescriptive analytics provides calculated future next steps to take. Because of high startup costs, prescriptive analytics is not commonly used by many organizations today. This type of analytics can be expensive to generate and require the assistance of data science teams. Until prescriptive analytics become more attainable, predictive analytics will continue to be the standard.