

: How can data scientists cope with organization politics?

by Daniel Power

Editor, DSSResources.COM

Business analytics, data analytics and decision support often create political concerns for organization managers and other stakeholders. Sometimes a manager is concerned that sharing data will harm his autonomy, hurt her promotion chances or damage one's reputation. Sometimes managers fear that data transparency will result in uncontrollable change. Perhaps the changes will alter internal power relationships or hurt relationships with external stakeholders. Some individuals may see business analytics as a potential weapon in a power struggle. Some may be concerned the data or analyses can be manipulated. Data and its analysis can be perceived as dangerous. A data scientist and the business analytics and decision support team is at the focal point of disagreements about facts derived from data.

A data scientist analyzes and interprets complex digital data to assist managers in decision-making, control, and problem-solving. A data scientist often has computer science or information systems credentials with programming abilities who can access data in files, from the web, and from databases and then combine, manage and analyze data from a variety of sources. A data scientist also often has academic preparation as a statistician or management scientist. As Power (2013) notes "a data scientist is a person who has the knowledge and skills to conduct sophisticated and systematic analyses of data. A data scientist extracts insights from data sets .."

A data scientist is rarely prepared for the politics of data. Distilled wisdom like "data never lies" or "the facts will come out" heighten the concerns and hopes about the results derived by data scientists. On the flip side many people have heard of "how to lie with statistics" and "fake news". The integrity of a data scientist may be questioned by some, but integrity should be a fundamental value for a data scientist. Darrell Huff (1954) wrote in the classic book **How to Lie with Statistics** that "There is terror in numbers." A data presentation trick that Huff mentions is truncating the bottom of a line or bar chart, so that differences seem larger than they are. Scale distortion does happen both inadvertently and more intentionally and it changes perceptions about results.

Facts are useful and important in decision making and problem-solving. Not everyone involved in a situation is always honest and not everyone wants the "truth", the facts, known. Some people may give lip-service to data transparency while others find objections and reasons to delay or go back on promises about data access and sharing. What is a data scientist to do? How can a data scientist cope with political pressures?

Coping with company politics is a real problem and challenge (Hayes, 2018). He noted that data from the Kaggle 2017 [State of Data Science and Machine Learning survey](#) of over 16,000 data

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professionals showed 27% faced barriers and challenges with company politics in the prior year. The following suggestions may help data professionals cope with both mild and intense organizational politics. It seems the worse the performance of an organization, the more intense and dysfunctional the politics. Please consider:

Suggestion #1: Make sure you have an influential backer and sponsor.

Suggestion #2: Avoid any appearance of distortion, bias or favoritism. Try to stay focused on the facts and show no preferential treatment in how you gather and analyze data and in how you interpret the results. Integrity should be a fundamental value.

Suggestion #3: Be aware of weaknesses and limitations in the data and findings. If someone asks, share any information about limitations. A formal analytical report should include a section on limitations.

Suggestion #4: Don't be strident or accusatory when you present findings and results. A thoughtful measured presentation is best.

Suggestion #5: Focus more on solving issues and problems than on finding or placing blame.

Suggestion #6: Be willing to followup and do more analyses. Be open to alternative interpretations of the same set of "facts".

Suggestion #7: Be humble. Say you don't know when you don't know. Ask for advice in interpreting complex findings.

Data scientists and decision support developers can survive and overcome organizational politics. Awareness of the potential political problems and threats is the starting point in dealing effectively with this difficult challenge. Analysts and developers must recognize that in some situations actions and arguments are based more in self-interest than the best interests of shareholders and other stakeholders.

References

Hayes, B., "Top 10 Challenges to Practicing Data Science at Work," March 18, 2018

Huff, D. and I. Geis (illustrator), How to Lie with Statistics, Norton, New York, ISBN 0-393-31072-8.

Power, D. J., "What is a data scientist?" Decision Support News, Vol. 14, No. 13, June 23, 2013 at URL <http://dssresources.com/newsletters/347.php>

Author: Daniel Power

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