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# Big Data and Decision Making in Industrial Development

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**ABB**



# Agenda

- Short Biography
- Data impact on
  - Organization
  - Leadership
  - Workforce
- Generative AI and Machine Learning
- Business case
- Case study
- Q&A



# About the Speaker



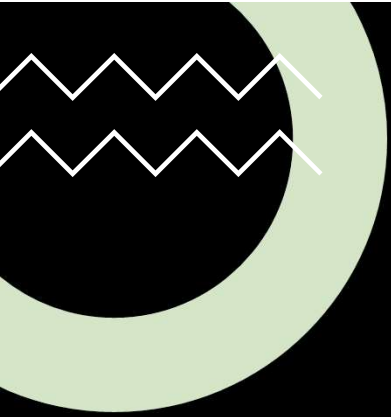
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I have a more than 25-year track record of success in operations management, delivering out-of-the-box concepts and solutions that result in cutting-edge positive effects on the bottom line and customer satisfaction. At ABB, I have helped transition distribution from a liability to a marketable asset.

Prior to joining to ABB, I helped Groupon in switching from a 3<sup>rd</sup> party distribution model to an inhouse distribution approach. By this transition, the cost-to-serve was reduced by more than 50%. With Nike, I instituted a global labor management system, improving labor efficiency by more than 20%. I was also a leader at Amazon where I helped build their internal “FedEx” system, opening up 19 cross dock facilities in 18 months. I also helped them integrate their unmanned Kiva system and was part of writing their algorithm system.

**KEN SHOTTS**

**VP – DISTRIBUTION, INVENTORY & LOGISTICS  
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Is data the next



or

Is it Fool's Gold



The answer to that question depends on you as a leader

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Are you going to allow your organization to drown in data?

Or

Are you going to be a leader who guides your company through optimal data resources?



# What to expect when first transitioning an organization to a data mindset



Individuals who continue to hold on to emotion-based decision making : “we’ve always done it this way”



Debates over the accuracy of the data



“ Your data just don’t understand our customer base, associates, vendors”



Didn’t believe the data – 95% of all statistics are made up



Change Management is key to this adoption



Important to this mindset change is data transparency

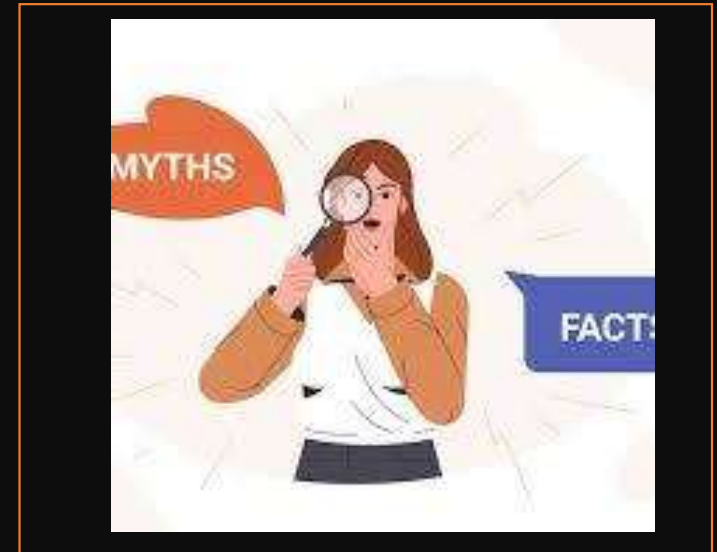


You are going to flatten your organization and drive end-to-end thinking instead of the present silo approach that many orgs take


# If you don't want your team to look like this

Here are some changes you need to make in your leadership style

- Be a continuous learner
- Return to fifth grade science
  - Use Null Hypothesis when problem solving
- Find a way to give yourself time to think throughout the day
- Your relationship with your team will become more collaborative
- Be comfortable that your team has skills you don't possess
- The most important thing to remember is that when the data provides the science, the people provide the art








Key changes  
in the  
workforce

**Partnership instead of hierarchy**



## Key changes in the workforce

- Become more strategic in thinking
- Be willing to challenge every process, practice and decisions of the past
- Be comfortable with cross-functional collaboration
- Start every review from a blank sheet of paper
- The data will guide you which leads to multiple projects and a lot of mid-course corrections

Is Generative AI and  
Machine Learning  
the monster hiding in  
the closet?



Across every organization  
and industry

Where can we apply data

- Demand and supply planning
- Inventory Management
- Network design
- Transportation routing
- Customer order profiles
- Affinity Ratios
- purchasing patterns
- Traffic patterns
- Bias identification
- Financial and growth modeling

# Business Case

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# Customer order dynamics



## Challenge:

Customer ordered multiple times a week (5-7 times) increasing labor, processing and freight costs



## Solution:

Analyzed order patterns over a 24-month period and discussed a beneficial proposition for both, customer and distribution center



## Results:

Order pattern changed to a once a week improving customer experience and reducing processing cost

# Network design and decision making



## Challenge:

Multiple ship locations for the same order



## Solution:

Analyzed



## Results:

Order

Q & A