**Jeff Monroe**

Memphis, TN 38120 | 901-483-7303 | [jmonroe@statmodels.net](mailto:jmonroe@statmodels.net?subject=Resume%20Response)

**manager of strategic analysis**

**Creates advantages for organizations in realizing transformational business results maximizing profitability, mitigating risk and reducing costs by delivering critical business intelligence.**

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| **Recognized Excellence In:**   * Revenue Optimization Modeling * Data Suppliers & Consultants Relationships * Advanced Statistical Modeling * Game Theory Applied to Industry/Market Trends * Artificial Intelligence/Machine Learning * Strategic Planning & Execution * Technology/Online Solutions * Linear Programming   **Technology Skills**  R | Minitab | SAS | MS Access | SQL Server  Linux Advanced Excel Business Modeling | C#  Crystal Ball | Web Scraping App | R Markdown & Shiny  Multivariate Adaptive Regression Splines (MARS)  Bound Optimization by Quadratic Approximation (BOBYQA) |  Hierarchical Hidden Markov Model (HHMM)  Programming: C++ / Python / VBA |

* Influences strategic planning, KPIs and identifies market opportunities with data-driven decision making and customer-driven analytics.
* Aligns data analytics in full support of mission, strategies and goals.
* Optimizes Sales, Marketing, Purchasing, Manufacturing and Operational performance by incorporating current and future business analysis.
* Thought leader and subject matter expert on optimal business analytical design, approaches and methodologies.
* Clearly translates complex information to users for rapid implementation.
* Improves staff performance, skills and innovation through mentorship
* Keeps companies nimble with current industry trends and best practices.
* Inquisitive, identifies and solves unseen business challenges.
* Continually improves processes that increase employee engagement resulting in a more efficient, profitable company by leveraging programming, econometrics and a strong business acumen.

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| *“Give me the business problems no one has been able to solve - I solve them then improve on the solutions.” – Jeff Monroe* |

Created optimization models that generated $60+M profits, saved $50+M, streamlined 3 high paying positions, identified untapped profitable markets/segments, streamlined department 75%, eliminating errors and costs while maximizing headcount.

*Tools Developed: Price Quote, Price Calculator, Market Mix Optimization, Global Trade, Trend Line Price, Global Demand & Price Elasticity.*

* **Revolutionized risk mitigation and identified unseen opportunities** in declining secular market by accurately predicting demand/volume growth potential with data used to capitalize on strategic opportunities in companies in metro areas within vertical.
* **Valued influencer** on Sales & Marketing with accurate long-term price/demand forecasts and cross referenced growth information with D&B and Social Media web scraping for contact information for target clients with highly probable of acquisition.
* **Optimizes Production** by identifying where to increase product purchasing to evolve manufacturing capacity and design.
* **Maximizes Global Trade Flows** using elasticity of demand and optimization **to amplify global trade flow.**
* **Cutting Edge Internal Innovation** developing ChatBot that automates routine tasks and building a humanoid robot for work tasks.
* **Long Term Dependability** of Price Quote Tool still in use after 15 years and Price Calculator Application still after 8 years.
* **Influences Strategic Planning and Saves Jobs** by accurately identifying long-term gradual decline in industry allowing top decision makers to convert products within manufacturing facility rather than closing facility and displacing nearly 2,000 people.
* **Recognized Business Contribution** earned highest company, Chairman's Award, and four Senior Vice President Awards

**Career Snapshot**

**Manager of Strategic Analysis** | Sr Financial Analysts | Pricing Analyst, International Paper Company, Memphis, TN, 1998 – Present

**Co-Instructor -** R-Immersion Workshop, FedEx Institute of Technology, Memphis, TN, 2017– Present

**Education & Certification**

**Master of Applied Statistics Certification**, Penn State University, University Park, PA, 2009

**Bachelor's Degree – Business Administration**, University of Memphis, University of Phoenix, 2004

**Key Leadership Initiatives & Footprints**

*Global paper/packaging industry leader | $28B+ annual revenues | 60k+ Employees in 20+ countries*

**− Manager of Strategic Analysis | International Paper Company | 2014 - Present −**

*Influences global lines of business by advising senior leadership on optimal product mix, pricing, promotional spend and placement. Optimizes region-specific demand, trade and consumer product marketing mix models that identify key opportunities for budgeting, marketing, sales, strategy, inventory and purchasing. Manages and maintains contracts for data suppliers and research firms.*

**Key Highlights:**

* Created Revenue Optimization Model that increased incremental revenues $60M and earned the *Key Driver Award*.
* Company realized increases of $120M in optimial pricing, $6M in pipelines and $500k in distribution using recommendations.
* Global demand and trade model relied on as the baseline of budgets for all lines of business globally.

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| *Challenge:* | High costs and inefficiencies in corrugated business, requested by executive to analyze business for solutions. |
| *Results:* | Estimated $50M savings on 18M ton system with a immediate win of $4/a ton savings. |
| *Tactics:* | * After extensive research, identified existing sytem’s fatal flaws: using 1950’s box optimization standards designed for railcar packing and shipping with only 6 box designs and estimation of 6 human touches. * Modernized parameters for multiple box sizes, 24 average human touches, conveyer systems and truck delivery. * Furthering impact by building a computer simulation leveraging all data collected from quality data sensors to test millions of designs while simultaneously running multiple algorithms. |

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| *Challenge:* | Inefficiencies throughout core business functions due to lack of data science knowledge and application. |
| *Results:* | Transformed all manual processes into automated reporting with output distribution to PowerPoint or Outlook. |
| *Tactics:* | * Created a data science team and facilitated a 3-day workshop for 20 corporate finance, supply chain, operations, IT and marketing staff on progress programing and data gathering. * Influences integration of data science throughout enterprise as a member of a high-level, ad hoc high strategy team composed IT, finance and operations that collaborate on indenfiying and solving critical business challenges |

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| *Challenge:* | Stagnate revenues due to Sales and Marketing intuitive pricing decisions instead of leveraging empirical data |
| *Results:* | Increase revenues of box line of business $180M in one year; saved $40M on 2M ton system on paper line of business. |
| *Tactics:* | * Identified optimal margin point using holisitic model with multivariate price influencers including demand elasticity, supply/demand relationship, volume change vs. price reaction, location, target markets, operating rate and promotions. * Advised box business of 89% optimial operating rate for price increase; after 10 years without price hike, business facilitated three increases in one year for multimillion dollar increase in revneus. |

**− Senior Financial Analyst | International Paper Company | 2006 - 2014 −**

*Promoted after completely automating divisions financial tasks, reducing headcount by two-thrids and company reorganization.*

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| *Challenge:* | Poor planning and instability in North American markets from inaccurate demand forecasts and unknown recession impact. |
| *Results:* | Revolutionized North America, Brazil and Europe market impact using price elasticity model that identified and predicted market factors, turning point indicators and low level drivers for accurately forecasting and optimal market mix and pricing. |
| *Tactics:* | * Built demand model that altered North American market focus from pricing to product mix resulting in increased revenues. * Model used across North American marketing, sales, supply chain and predictability for optimal productivity and profitability. * Requested to and successful in simulating success in Brazil and Europe markets by creating robust model that incorporated region-specific differential variables across 200+ countries and segments aggregated across all product lines. * Brazil/Europe markets realized increased revenues and recapture of $5+M spend each eliminating preexisting linear model. |

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| *Challenge:* | Potential threat of competitor who increased their monthly import 700% coupled with weakened dollar in the global market. |
| *Results:* | Accurately predicted import volume allowing company to optimize its trade-flows in light of these dynamics. |
| *Tactics:* | * Created short term model by calculating elasticity of demand for every country-country trade flow combination for three product segments.to demonstrate which regions were short-term sub-optimal. * Model predicted 140k ton volume,12% lower than actual, allowing company to reduce impact through strategic counters. |
| *Challenge:* | Clarify and demonstrate most appropriate strategy to increase pricing in European basedon two conflicting theories. |
| *Results:* | Increased trade flow $10M by creating revolutionary global demand and trade model that transformed global strategy.. |
| *Tactics:* | * Identified key market players (Asia), markets (Europe/Middle East) and their business drivers through holistic analysis.. * Asian competitor was priced lower in European market and had a high desire yet little involvement in Middle East market. * Recognized benefit to both companies if Asia focused imports to the Middle East rather than Europe. * Realized goal of increased pricing and dominating Europe market by increasing pricing in European market while removing company presence in the Middle East thereby removing competitor in Europe with their refocus only in Middle East market. |

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| *Challenge:* | Significant costs in Strategic Planning Department due to manual processes and consistent errors.. |
| *Results:* | Fully automated team’s tasks to realize zero departmental errors; staff maximized in new departments for greater value. |
| *Tactics:* | * Analyzed and documented each process recognizing duplication of reporting and requested raw data from data suppliers. * Organized script into SQL for report automation linking more than two dozen internal/external resources. * Removed all human interaction by synthesizing data, output charts, tables and commentary for exportation to PowerPoint and subsequent email reports to specified groups and key staff. |

**− Pricing Analyst | International Paper Company | 1998 – 2006 −**

*Fueled $12M profit increase with recommendations to senior level decision makers for business planning, budgeting and financial analysis based on statistical model measuring price elasticity, relative strength index, pricing/volume momentum, and weighted moving averages*

**Key Highlights:**

* Earned the *Customer Value Assessment Award* for improving quote/invoice accuracy and price realization through creation of Quote Trade-Off and Contract Management Tool with companion training and analytics.
* Supported business in surpassing $10M in one year by creating and training 200 Customer Servie Representatives on the Quote Trade-Off Tool; model used for 10+ years than mimicked within new SAP system.
* Added ~$12M in value with improved contract compliance by creating Contact Management Tool for Sales Department.
* Reduced price forecast MAPE 15% to 5% across all product lines by evaluating forecasting gaps for system/process improvements supported by effective stakeholder training.

**− Co-Instructor | FedEx Institute for Technology | 2017 - Present −**

*Co-Instructor for R-Immersion Workshop, December 2016 and March 2017. Topics included: Getting and Cleaning Data, Looping and Advanced Looping, Debugging, Visualizations, Advanced Web Scraping, Classification*

**Education**

**Master of Applied Statistics Certification** *- Penn State University, University Park, Pennsylvania, 2009*

**Bachelor of Business Administration** *- University of Memphis, University of Phoenix, 2004*

**Presentations**

Presenter, *“Using Data Science to Solve Real-World Problems”,* University of Memphis International Marketing, 2016.

Presenter, *“Mapping the Future of Paper with Big Data”*, Iowa State University, Voorhees Supply Chain Conference, 2015.

Presenter, *“Applying Theoretical Models to Solve Business Issues”,* University of Memphis, Business & Economics Honor Students, 2010

Panelist, *“Consumer Office Product Trends”,* Discussion at Industry Symposium, 2010

Founding Member Memphis R Users Group, with more than 150 members from a variety of disciplines.

**Publications**

*“Data Use: Toward a more optimized kind of revenue optimization”/*Quirks Marketing Research Media/May 2015

*“Data Science User Guide”/*International Paper/January 2017

*“Business Analytics with R”/Bookdown.org/August 2018*