

# C. Douglas Marcum

## CONTACT

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☎ 317.828.7699  
🏠 Indianapolis, IN

## PROFILE

A curious business analytics professional dedicated to creating a bridge between data scientists and stakeholders to develop data-driven solutions. Skilled at research, data modeling, machine learning, and visualization storytelling.

## EDUCATION

**Master of Science in Data Science** **GPA 4.00**  
Bellevue University Bellevue, NE Mar 2021  
**Coursework included:** Applied Statistics, Data Exploration and Analysis, Data Preparation, Data Mining, Predictive Analytics, Data Presentation and Visualization, and Big Data

**Bachelor of Science in Political Science and Sociology**  
Ball State University Muncie, IN Jun 2000

## CERTIFICATIONS

Data Scientist with Python - DataCamp  
[Certificate](#) - Dec 2020  
Python for Everybody - University of Michigan / Coursera  
[Certificate](#) - Jul 2019  
Customer Analytics - University of Pennsylvania / Coursera  
[Certificate](#) - Jun 2019  
IBM Data Science Professional - IBM / Coursera  
[Certificate](#) - May 2019

## DATA AND MODELING SKILLS

**Data Exploration, Extraction, Wrangling**  
**Machine Learning:** Supervised, Unsupervised, Reinforcement, Clustering, Deep Learning  
**Statistical Analysis:** Hypothesis and A/B Testing, Descriptive and Inferential Statistics

## TECHNICAL SKILLS

**Languages:** Python, R, SQL  
**Data Analysis and Wrangling:** NumPy, Pandas, Excel, dplyr, tidyR  
**Data Visualization:** Matplotlib, Seaborn, Tableau, Plotly, Folium, ggplot2  
**ML Frameworks:** Scikit-Learn, TensorFlow, Keras, PyTorch  
**Tools:** GitHub, PyCharm, Jupyter Notebook, MS Office Suite  
**Big Data Technologies (limited):** Hadoop, Spark, PySpark  
**ATS/CRM:** Compas, Avionte, Greenhouse, Sendouts, Salesforce

## BUSINESS SKILLS

Effective Communication and Deadline Management  
Leadership and Stakeholder Management  
Project Management and Oversight  
Talent Acquisition Background - Technical and Executive  
Creative and Perceptive Troubleshooter  
Devoted Continuous Learning

## DATA SCIENCE PROJECTS | [GitHub](#)

### Breast Cancer Analysis and Prediction | [GitHub](#)

- Reviewed the UCI Wisconsin Breast Cancer dataset and completed a thorough exploratory data analysis before model creation began.
- Reduced necessary features from 30 to 11 by utilizing Lasso Regression and OLS Regression.
- The Random Forest Classifier model provided consistent performance and accuracy (96%) in identifying cancerous tumors.

### NBA MVP Predictor | [GitHub](#)

- Conducted exploratory data analysis, generating insights into the selection process, as the NBA does not define MVP voting criteria.
- Evaluated feature correlations allowing the removal of all high multicollinearity instances.
- Implemented a Linear Regression model in R that correctly selected the MVP in 7 of 10 seasons and a player that finished in the top three of overall voting in 10 of 10 seasons.

### Consumer Ratings of Breakfast Cereal | [GitHub](#)

- Analysis of 16 features guided the predictions of consumer cereal ratings and scores.
- Constructed a Logistic Regression model that delivered precision, recall, and F1 scores exceeding .80 in each category.

## EXPERIENCE

### DMT Solutions Group Inc Indianapolis, IN May 2012 – Jan 2021 Director

Principal of boutique talent acquisition and consulting services firm.

- Weekly data mining to uncover and recognize patterns in candidate database and hiring patterns of current and potential clients.
- Created detailed dashboards, KPIs, and metrics to capture internal and external trending data to increase revenue by 87%.
- Implemented a SaaS applicant tracking system and phone network to facilitate a remote team, thus reducing monthly costs by \$4500.

### Pinnacle Partners Indianapolis, IN Jun 2006 – May 2012 Recruiting Manager / Coordinator Jun 2010 – May 2012

Promoted to RM and refined strategies and procedures for a cross-functional team of seven, accomplishing \$4.7 million in annual revenue.

- 125% of the 2011 profit goal and 105% of the 2010 profit goal.
- Developed detailed reporting and KPI tracking tools designed to increase production by 50%.

### Sr. Technical Recruiter Jun 2006 – Jun 2010

Led IT recruiters in profitability and placements (2008, 2009, 2010).

### Robert Half Technology Northbrook, IL Mar 2005 – Jun 2006 Technology Recruiting Manager

Recruited to partner in reestablishing the Northern Illinois territory, which led to recognition as a top 10% finalist in the national "Rookie of the Year 2005" standings.

### New Horizons CLC Chicago, IL Mar 2004 – Mar 2005 Director of Continuing Education

Directed a team of six, generating \$3.1 million in annual revenue.

- Designed activity dashboard, enabling complete monthly sales analysis, lead tracking, and trending data collection.