Ronald J. Yurko, Jr.

CONTACT INFORMATION	Department of Statistics & Data Science Carnegie Mellon University Pittsburgh, PA 15213	724-331-4520 ryurko@stat.cmu.edu http://www.stat.cmu.edu/ ryurko/

EDUCATION

Carnegie Mellon University, Pittsburgh, PA

PhD Student, Statistics, 2017 - Present

B.S., Statistics, Dec 2015 (University Honors) GPA: 3.97/4.00

RESEARCH INTERESTS

Clustering, ensemble methods, computational statistics, statistics in sports

CONFERENCE & SEMINAR PRESENTATIONS

Invited Talks

nflWAR: A Reproducible Method for Offensive Player Evaluation in Football

Carnegie Mellon Sports Analytics Conference (Pittsburgh, PA)	Oct 28, 2017
Computational Sports Informatics Colloquium (Pittsburgh, PA)	Oct 12, 2017
New England Symposium on Statistics in Sports (Cambridge, MA)	Sep 23, 2017

Contributed Talks

Great Lakes Analytics in Sports Conference (Stevens Points, WI)	Jul 13, 2017
NFL Player Evaluation Using Expected Points Added with nflscrapR

Classification Society Conference 2017 (Santa Clara, CA)	Jun 23, 2017
Variable Selection for Consistent Clustering

UP-STAT (Buffalo, NY)	Apr 22, 2017
nflscrapR: An R Package for Easy Access to NFL Data and a
New Model for Expected Points and Win Probability
Second Place, Best Young Researchers' Award in Category C: Application

Poster Presentations

Dietrich Undergraduate Colloquium (Pittsburgh, PA)	Nov 6, 2015
Improving Predictions of Ensemble Methods Using Distributions of Estimated
Probabilities

Meeting of the Minds (Pittsburgh, PA)	May 6, 2015
Classifying Kepler Objects of Interest
First Place, Statistics Poster Competition

PAPERS IN PROGRESS

YURKO, R., NUGENT, R., VENTURA, S.L., "Variable Selection for Consistent Clustering"

VENTURA, S.L., NUGENT, R., AND YURKO, R., "PREDS: Prediction with Ensembles using Distribution Summaries"

YURKO, R., VENTURA, S., AND HOROWITZ, M., "nflWAR: A Reproducible Method for Offensive Player Evaluation in Football"

PREVIOUS RESEARCH EXPERIENCE	**Carnegie Mellon University**	Pittsburgh, PA

Undergraduate Research Assistant　　　　　　　　　　　Aug 2015 to Dec 2015

PREDS: Prediction with Ensembles using Distribution Summaries
Supervisors: Samuel L. Ventura, Ph.D and Rebecca Nugent, Ph.D

Undergraduate Research Course　　　　　　　　　　　Jan 2015 to May 2015

Classifying Kepler Objects of Interest
Supervisors: Rebecca Nugent, Ph.D and Peter E. Freeman, Ph.D

Independent Research　　　　　　　　　　　Aug 2014 to Dec 2014

The Science of Fooling Batters: An Objective Analysis of Pitch Sequencing
Supervisor: Andrew C. Thomas, Ph.D

TEACHING
EXPERIENCE
　　　　Carnegie Mellon University　　　　　　　　　　　Pittsburgh, PA

Graduate Teaching Assistant　　　　　　　　　　　Fall 2017 to Present

Course: Statistical Computing
Assist students in lab sessions, office hours, and grade homeworks

Instructor　　　　　　　　　　　Spring 2015 & Fall 2015

Course: Introduction to Sabermetrics & Exploring Baseball Data
Lectured and created course materials

Grader　　　　　　　　　　　Spring 2015 & Fall 2015

Courses: Introduction to Statistical Inference, Introduction to Probability Theory

Undergraduate Teaching Assistant　　　　　　　　　　　Fall 2013 to Fall 2014

Course: Statistical Reasoning and Practice
Assist students in Minitab lab sessions, grade homeworks and exams

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PROFESSIONAL
SERVICE
　　　　Carnegie Mellon Sports Analytics Conference

Program Committee　　　　　　　　　　　Oct 2017

170+ attendees from academia, industry, and professional sports responsibilities
included maintaining and assessing current research in field, event/speaker/press
management, marketing materials, budgeting

Reviewer:

Big Data　　　　　　　　　　　2017 to Present

SOFTWARE
　　　　R Packages

Maksim Horowitz, Ronald Yurko, Samuel L. Ventura (2017). nflscrapR: Compiling the
real-time NFL JSON API for easy use in R. R package version 1.0.

HONORS &
AWARDS

Honors

Andrew Carnegie Society Scholar   2015
Carnegie Mellon University

Phi Kappa Phi Honor Society   2015
Carnegie Mellon University

Honors courses: Mathematical Statistics Honors, Undergraduate Research Course
Department of Statistics & Data Science, Carnegie Mellon University

Awards & Academic Competitions

Second Place, Best Young Researchers' Award in
Category C: Application   Apr 22, 2017
UP-STAT

First Place, Statistics Poster Competition   May 6, 2015
Meeting of the Minds, Carnegie Mellon University

UNIVERSITY
ORGANIZATIONS

Carnegie Mellon Sports Analytics Club

Graduate Student Advisor   2017 to Present

Co-Founder, Vice President, Editor, and Writer   2013 to 2016
Student-run sports statistics club

INDUSTRY
EXPERIENCE

Analytics & Portfolio Management, PNC Financial Services   Pittsburgh, PA

Quantitative Analytics Intern and Associate   Jun 2015 to Mar 2017

Model Development Predicting Probability of Default and Loss Given Default
Preliminary methodology research, documentation preparation, data extraction,
manipulation, and statistical modeling in R and SAS

Baseball Operations, Pittsburgh Pirates   Pittsburgh, PA

Data and Analytics Intern   Mar 2014 to Oct 2014

Pitcher "Injury Zone" Analysis and Data Management
Ensure loading of data, distribute organizational reports, developed neural network
and hazard model for assessing elbow injury risk

MEMBERSHIPS

American Statistical Association
Society for American Baseball Research
Classification Society

COMPUTING
SKILLS

Programming Languages: R, SAS, Python, SQL, LaTeX
Operating Systems: MacOS, Windows

ACTIVITIES

Carnegie Mellon University Club Baseball Team   2013

Carnegie Mellon University Intramural Sports:
Flag football
Basketball
Softball

PRESS

"CMU alum, MLB stats expert to speak at sports analytics conference"
Pittsburgh Post-Gazette   Oct 27, 2017

"Steelers fans should worry about Patriots RB Rex Burkhead. These CMU statisticians tell you why."
Pittsburgh Post-Gazette   Aug 17, 2017

REFERENCES   Available upon request