**Using Workflow Management Systems Preface**

**Preface**

**Who are we**

***Joseph DeArce*** *is a Database Manager with over 15 years of experience with RDBMS systems, expert with Data Warehousing, ETL/ELT, Dimensional Modeling, Apache NiFi, Programming and Tuning, Application Integration, Data Architecture (RDBMS and NoSQL), Database Design, PL/SQL, SQL, TSQL, SAS, R, Python and Java.*

Presented at the NYOUG (6/13/2017, 9/12/2012, 9/10/2008) “How to create a seamless R processing environment”, “How to Integrate Clear Case into Your Oracle Development Environment”, “Steps Necessary to Configure a Sun Server to Use Clariion CX3-40 Storage.”

*Areas of specialization: Database Design, Database Administration, Database Architecture, programming, project management, database migrations.*

**Deborah Perez** is a Lead Developer that uses a variety of programming languages, OS and technologies ranging from and not limited to: Python, Java, Linux, Windows, Hadoop, AWS, SQL Server, MySQL, etc. She was Valedictorian of her 2018 Data Engineering training cohort from Platform by Per Scholas sponsored by Cognizant. She has working experience in a variety of industry environments such as academia, clinical research, federal agencies, food and beverage corporations, investment banks, storage systems, marketing and advertising, and more.

Areas of specialization: Programming, Leading/Managing, Tutoring, Consulting.

***Young Wook Baek*** *is a full stack developer and a technical instructor with years of experience. He is an expert in building applications, has taught various courses including Data Engineering, Application Developer, Full Stack Developer, Application Value Management, and Programming Basics in Java and Python.*

**Why we wrote this book**

I began writing this book as a presentation for NiFi and an abstract halfway through my presentation, the abstract had grown to over sixty pages long and I knew I had a problem. I then tried various ideas I tried cutting down the size and dropping some of the content this made the presentation very narrow and defeated the purpose of the presentation.

Phase 2 and my crazy idea to write a book where I had never done this before, my friend Norell Gutman convinced me that I should try it. The original idea was to do a book on NiFi which I brought to O’Reilly’s Jess Haberman she was not over whelmed. But my backup idea she liked a book on Workflow Management Systems which would cover Apache NiFi, Apache Airflow and Luigi and so my book was born.

Now I had to write a book on three software packages Nifi, Airflow and Luigi and I had a deep knowledge of only NiFi which I had used extensively. Then I began my search for some co-author’s that could help me bridge the gap in my skill set. I approached several people not all were interested in doing it Deborah, Young were, and they were enthusiastic, so we began.

**Who should read this book**

This book should be read by anyone with a technical background who wants to control and streamline their company’s data using these frameworks. People who are database Administrator (relational), NoSQL Databases, Hadoop Admin, Data Engineer, Python Engineer, Java Engineer, Full Stack Engineer, System Administrator, Data Architect, are ones who want to control, streamline their enterprise data.

**What is in this book**

*This book is about Workflow Management Systems, a class of software that orchestrates the movement and processing of data streams between systems. This book will explain what these systems have in common: features, architecture, installation, configuration and use. These systems keep data provenance, have customizable security protocols, extendable by the user and is scalable. We also include including use cases, practical examples and a troubleshooting section.*

*This book is unique in its scope. It covers three software packages: Apache NiFi, Apache Airflow and Luigi. It will cover each of the software’s features by designing workflows in each software through step-by-step examples. This book is for the tech professional who needs to automate processes within an enterprise system*

**Using code examples**

Supplemental material (code, examples, exercises) are available for downloading at <https://github.com/datatree/WorkflowManage>.