# Hands-on Machine Learning/AI Course

Machine learning and AI skills for data science professionals towards the business impact

Thank you for putting on this course. Being brand-new to coding and R, it was difficult for me personally, but your obvious mastery of the subject area and step-by-step BADIR methodology has given me hope that someday I can master it too. **Paul Spiering, Retail Marketing and Merchandising Analyst, TBC Corporation** 

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### WHO SHOULD TAKE THIS COURSE?

Are you a practising Data Scientist looking to deepen your data science skills and become future ready? Are you ready to learn Machine Learning and applied AI? If so, the 'Hands-on Machine Learning and AI' course can provide the necessary skills as well as the assistance you need to energize and drive growth in your organization.



Develop Al expertise

Learn a step-by-step approach to ML and Al models using Python



Build accelerated real-life models within business and resource constraints



Learn feature engineering to drive maximum impact

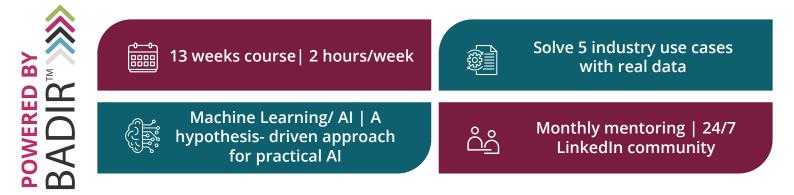


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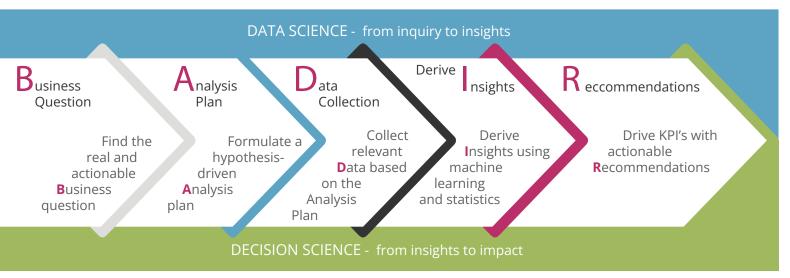
Become a thought partner to your stakeholders

# COURSE AT A GLANCE

| Торіс  | Duration                |
|--|-------------------------|
| Introduction to Python   | 100 minutes + exercises |
| Introduction to Machine Learning   | 145 minutes + exercises |
| Machine Learning Regression using BADIR: LASSO, Ridge and Elastic Net using Pandas and Scikit-Learn  | 180 minutes + exercises |
| Machine Learning Classification using BADIR: GBT, Random Forest, XGBoost using Pandas and Scikit-Learn                                       | 180 minutes + exercises |
| Unsupervised Learning using BADIR: Segmentation and K-Means clustering using Pandas and Scikit-Learn   | 95 minutes + exercises  |
| Principal Component Analysis   | 4 minutes               |
| Neural Networks using BADIR:<br>Introduction, techniques, model building, and hyperparameter tuning  | 195 minutes + exercises |
| Advanced Neural \Networks - CNN and RNN along with relevant examples   | 110 minutes + exercises |
| Machine Learning/Al Case: Hands-on deep dive using marketing, product, and operations scenarios from a beauty product subscription business: |                         |
| • Get to the real business question, lay out an analysis plan, and collect data  | 25 minutes + exercises  |
| Derive insights using all the techniques taught and pick the best model  | 260 minutes +exercises  |
| Make actionable recommendations  | 9 minutes               |
| ML in everyday life - recipes, short-cuts, tips for hyperparameter tuning,<br>NN intuition, model deployment and feature engineering         | 97 minutes              |



### What is **BADIR**?



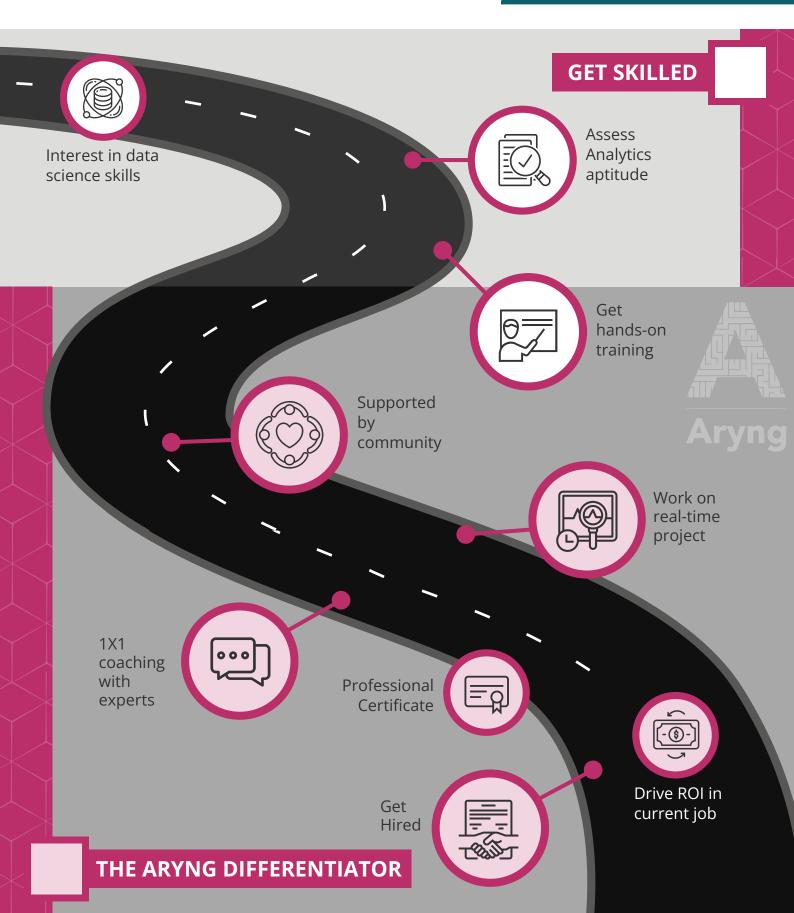
# TOOLS AND METHODS

This course is an applied, hands-on AI course covering the most commonly used machine learning and AI techniques in business using Python. Methodologies covered 1



Pre-requisites: BADIR - Hands-on Business Analytics, BADIR - Hands-on Predictive Analytics

- Lasso, Ridge and Elastic Net
- 2 **Random forest and GBT**
- 3 Neutral Network, ANN, and CNN
  - 4 Text Analytics and Clustering



### ATTENDEES RECEIVE



A Certificate of Completion -Social media ready



12 months of access to all course content and videos. Go back, pause, take notes, as many times as you like for 12 months



Templates, cheat sheets, and samples that help you take your training to your day-to-day workflow



# COURSE OPTIONS

Once you enroll, you will get immediate access to the online training content. You will receive information to enroll in the community and get updates about mentoring session. Training is done at your own pace. Mentoring sessions are scheduled over the web, via Skype or, by phone.

O 12 Months access (Access all throughout the year) ------- \$1,999

O One-day Free trial (Enroll now and get a glimpse of this course) ------ \$0

# ARYNG vs other programs

|   | Masters or<br>diploma courses | Learning platform corses | Aryng        |
|---|-------------------------------|--------------------------|--------------|
| Job-ready, hands-on training                                | ×                             | ×                        | $\checkmark$ |
| Focused on solving real Business problem for industry       | Rare                          | Marginal                 | $\checkmark$ |
| Learning of end-to-end process of Data Science project      | Modular                       | Modular                  | $\checkmark$ |
| Taught by analytics experts with Fortune 100 experience     | X                             | Rare                     | $\checkmark$ |
| Technical as well as non-technical (business / soft skills) | Rare                          | ×                        | $\checkmark$ |
| Lifetime access to live community of fellow learners        | $\checkmark$                  | Rare                     | $\checkmark$ |
| 1-on-1 access to Data Science expert instructions           | $\checkmark$                  | Rare                     | $\checkmark$ |
| Flexible, self-placed, online courses                       | $\checkmark$                  | . /                      |              |

| Industry-recognized certification | Accredited | Inconsistent | Professional<br>Certification |
|-----------------------------------|------------|--------------|-------------------------------|
| Cost                              | \$\$\$\$   | \$/free      | \$\$                          |

# INSTRUCTORS



### Piyanka Jain, Bestselling author and President & CEO of Aryng

Piyanka is the author of the Amazon bestseller book Behind Every Good Decision and is a well-regarded industry thought leader in analytics, keynoting at business and analytics conferences including Predictive Analytics World, Data Science Summit, TDWI Big Data Conference, Google Analytics User Conference, Business Performance conference on data driven decision making in an organization.

With her 15+ years of experience in analytics, she has had 180M+ demonstrated impact on business. Her prior roles include the head of NA Business Analytics at PayPal and senior marketing analytics position with Adobe.

**Detailed profile:** http://www.linkedin.com/in/piyanka **Forbes blog post:** http://blogs.forbes.com/piyankajain/

#### Swarnabha Ghosh

Swarnabha Ghosh is a Data Scientist at Aryng. A firm believer in data-driven decision-making and explainable AI, he has experience in working with advanced machine learning and deep learning algorithms. He has a postgraduate degree in Physics and research experience in computational physics. He likes to keep up with the latest advancements in the world of AI and incorporate deep learning and machine learning models to create customer-centric solutions for business problems. "In God we trust, all others must bring data." - W. Edwards Deming

#### Yash Shah

Yash has a Master of Science from Columbia University with a specialization in Business Analytics centered on employing statistical machine learning to drive decisions. Yash is passionate about using Al and Deep Learning to transform and disrupt organizational operating models and creating impact through data-driven strategy. He is currently a data scientist with the global predictive modeling team at Visa, Inc. Yash is instrumental in enabling credit access to small businesses and enterprises by leveraging Visa Cards data to build credit risk models.



#### 1. How long does it take to complete the courses?

This course consists of 13 sections each with 2 hours of self-paced online lectures. In addition, you will spend 2 to 4 hours/section on class assignments.

#### 2. What background knowledge is necessary to take specific courses?

You will need to have a working knowledge of Excel, high school level statistics, a passion for learning data, the basics of Python programming, and a knack for story-telling. You must also score 12 or higher in the Aryng's Aptitude Assessment. It is also recommended that you take the Hands-on Business Analytics, the Hands-on A/B Testing, and the Hands-on Predictive Analytics courses.

**3. What software will I need to complete the exercises and case?** You will need to have Python IDE-Jupyter installed.

# 4. What if I am unhappy with the course? We would never want you to be unhappy! If you are unsatisfied with your purchase, contact us within the first 2 days of joining or before completing 20% of the course, whichever is earlier, and we will give you a full refund.

- 5. Will I get a certificate for completing the course? Yes, you will get a certificate of completion after finishing all the modules in the course.
- 6. What do I do if I have questions while going through the training? If you have logistical issues while taking the course, please email support@aryng.com or call 408.412.7279 right away. If you have analytics-related questions, we recommend you use a mentoring package to spend 1-on-1 time with a senior Aryng expert. You can jot down your questions and get them all answered in a session or two at the end of your course.

### About ARYNG .....

Aryng is a Data Science consulting, training and advising company. Aryng's SWAT Data science team helps solve complex business problems, develop the company's Data DNA through Data Literacy programs and deliver rapid ROI using machine learning, deep learning, and AI.

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