Making sense of data

Professor Zhang Louxin shares how NUS' MSc in Data Science and Machine Learning will help students gain an edge in our data-driven world

PHOTO: NUS SCALE

BY GILBERT WONG

In a span of a few decades, computers have gone from taking up the space of entire rooms to fitting comfortably in our pockets. This remarkable progress has resulted in several technological advancements, including quicker and smarter computing processes and the birth of artificial intelligence (AI) and machine learning. With AI ever-present now, from smartphones to self-driving cars, making sense of what goes behind the technology is only going to be more important sooner rather than later.

National University of Singapore (NUS) recognises this and has designed new programmes to teach these important skills. One such programme is Master of Science (MSc) in Data Science and Machine Learning, which will begin in August 2020. Its academic director, Professor Zhang Louxin, 55, shares whom this course is for and what prospective students can expect to get out of this new post-graduate programme.

Q: What is this course about?

A: MSc in Data Science and Machine Learning is a self-funded inter-disciplinary graduate degree programme, and the candidature is one to two years. It will help to meet the growing demand for big data professionals in all industries by transforming graduates in quantitative science into data science and analytics practitioners.

Q: Whom is this course for?

A: The course is designed to nurture the next generation of leaders in data science. It is for learners who wish to learn the advanced topics and skills in data science and machine learning necessary for careers as data scientists and machine learning or AI specialists in several sectors – government, retail and logistics, computer vision, healthcare and finance.

Q: How important have data science and machine learning become in recent years?

A: We are now facing a massive explosion in the amount of data generated and retained by organisations, the government, and even individuals like you and me. In the future economy that is heavily reliant and driven by the adoption of new technologies and big data, the ability to analyse and process data has become a critical skill set. Data scientists will be able to make sense out of data and use it to steer business decisions.

Q: What can students look forward to?

A: The programme offers upgrading opportunities for those who wish to equip themselves with data science and machine learning knowledge and data analytic skills. It will provide students with a solid foundation in these two topics, and computing skills in data analytics. This is achieved by integrating statistics, maths and computing, as well as machine learning and AI.

Q: What will students gain after graduating from this course?

A: They will be well-poised to harness the power of data to solve problems and deliver meaningful outcomes for their organisation.

MASTER OF SCIENCE IN DATA SCIENCE AND MACHINE LEARNING

National University of Singapore, Faculty of Science

■ **Full-time:**
One to two years