

## Exploiting data for Singapore's defence



**NAME:** Ho Chi Ming

**DEGREE:** Masters of Science in Business Analytics, 2016 and Bachelor of Engineering (Electrical & Electronic Engineering), 2006 from the National University of Singapore

**ROLE:** Principal Engineer, Enterprise IT Programme Centre

**EMPLOYER:** Defence Science and Technology Agency

### MY JOB

My role is to apply information technologies and data analytics to develop innovative solutions for the Ministry of Defence (MINDEF) and the Singapore Armed Forces (SAF). Currently, I lead a team to develop the Fleet Management System to enhance the management of weapons and other systems operated by the SAF. We use machine learning and data analytics to monitor the systems for anomalies so that problems can be rectified early.

### GETTING THE JOB

I wanted to pursue my interest in building software applications and envisioned a career that would allow me to do so while making a positive difference to the lives of people. I applied to DSTA as I was keen to develop applications to enhance and strengthen our nation's defence.

### THE HIGHS AND LOWS

Devising ways to examine and exploit raw data and applying those to practical applications has got to be the most fulfilling, yet most challenging aspect of my job. Data analytics is gradually taking centre stage in many areas and defence is no exception. With the vast amount of data available out there, it is constantly a challenge to use the data in a way that informs and educates. To deepen my competency, I was given the opportunity to pursue a Master's degree

in data analytics at NUS under the DSTA Postgraduate Scholarship. The knowledge and skills were useful in undertaking the project to develop the Fleet Management System when I returned from my studies. I am also glad to be part of a team that is passionate about their work, and open to sharing experiences and expertise.

### MY MOST MEMORABLE MOMENT AT WORK

The most memorable moment for me was when a project which I initiated – a one-stop platform for government procurement officers to search and access market information easily, was implemented. Like how we often look to platforms like TripAdvisor for travel reviews, I thought that a similar approach could be adopted on our procurement platform to consolidate available content to better inform and validate procurement decisions. It gives me great satisfaction to know that the solutions I design can aid our partners to make informed decisions more efficiently.

### SOME ADVICE

A career in defence engineering is more than just putting your technical knowledge and skills to use; it is also about how you and your team leverage each other's strengths and expertise to achieve what is perceived as the 'unimaginable'. If you've got the passion to create more possibilities for Singapore's defence, go for it!