



The Future is Robotics

■ **By Andrew Bonallack**
Editor

A future Navy robotics engineer may well be among the ranks of Year 13s at Paraparaumu College.

Last month Commodore Mat Williams, Deputy Chief of Navy, was invited to observe the college's Robotics Club projects. The Navy, through the Navy Experimentation Programme, has been sponsoring the club since 2018 as an opportunity to encourage potential future RNZN autonomous systems operators and engineers.

Around 16 senior students demonstrated the club's two main projects. The first was an unmanned beach robot, capable of honing in on beach rubbish and using a claw to collect it and transfer it to another robot for transport off the beach. The

other was a sizeable Remotely Piloted Aircraft System (RPAS), designed to help locate a person who had fallen overboard.

CDRE Williams, joined by Navy Experimentation Manager Colin Moore and Kapiti Coast mayor K. Gurnathan, says the Navy's Defence Technology Agency is doing very similar things. "We have a group of scientists, and 10 to 15 years ago, they were doing things like this, building remote controlled planes and developing technology. It's now at a stage where we are doing it for real. So the stuff you are doing, it's exactly the way the industry is going. I think it's fantastic.

"STEM (Science Technology Engineering Maths) is really important for the future of the country. I'm really interested in this. I used to love this stuff. I wish I had had it at my school."

Robotics tutor Jack Penman says the students are doing everything by the book with the RPAS, adhering to the appropriate legislation and procedures with the Civil Aviation Authority before its maiden flight.

"By the end of term three, we should be flying, and picking up rubbish." He says the students work on these projects three hours a week, after school hours.

Principal Craig Steed says the students are amazing. "We absolutely appreciate Defence investing in the potential of young people," he says. "This equipment is not cheap, and any support helps this become a reality."

CDRE Mat Williams, Deputy Chief of Navy, has a look at the robotics projects the Navy is sponsoring at Paraparaumu College.