**SEBASTIAN PORTER ZADRO**  E: sebastianporterzadro@gmail.com | M: 0433012907

**Personal Objective** To pursue my passions in applied biology and software development. I sincerely wish to make the world a better place by working on projects related to human health and the environment.

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| **EDUCATION** |
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| **UNIVERSITY OF NEW SOUTH WALES***Bachelor of Commerce* (B.A.) | 1. **– 2022**
 |
| * Major in Financial Economics (Distinction average)
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| *Bachelor of Advanced Science* (B.A.) |  |
| * Major in Bioinformatics (Distinction average)
* Foundational knowledge in Molecular Biology, Statistics and Computer science
* Experience with programming in languages; Python, Perl, R and C

*Advanced Science Honours** Supervisor, Dr Fatemeh Vafaee
* Thesis: Predicting Synergistic Drug Combinations for Cancer Treatment using Neural Networks (NNs).
* Using known Loewe Synergy scores from the DrugComb database, expression data of perturbed cell-lines from the LINCS L1000 dataset and drug features derived from the Chemopy python package, I am building and training a NN model. The hope being that for unknown drug combinations, given the expression profiles for each drug on the same cell-line and their respective Chemopy drug features an accurate prediction of their synergistic performance can be predicted.
* Data cleaning and model creation is being carried out in python, utilising the keras TensorFlow library for building NN architectures.
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| **ST ALOYSIUS’ COLLEGE** |  **2010 – 2015** |
| * 96.15 ATAR
* Reached rank of Corporal in Cadet unit
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| **EXTRACURRICULAR** |
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| **BASKETBALL SOCIETY EXEC** |  **2019**  |
| *Vice President*  | (1 year –) |
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| * Responsible for the coordination of half-court basketball games for two-hour sessions twice a week during term (Mondays 12pm-2pm and Thursdays 10am-12pm)
* Responsible for manning stall during O-week, where attracted over a hundred and fifty new members
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| **iGEM 2019***Team Member - Modelling,** Represented Australia in the UNSW team in an international Synthetic Biology competition.
* Competed against hundreds of universities from across the world - researching, developing and commercialising an idea in the field of synthetic biology that solves real world problems.
* Achieved a gold medal award for attempting to speed up the production of paclitaxel, a chemotherapy drug.
* I was solely, responsible for modelling our protein system – constructed a 3D structure of our system using freely available software and ran molecular dynamic (MD) simulations and analysis on said structure. Was briefly introduced to high performance computing to run MD.
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| **COMMUNITY SERVICE** |
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| **ST VINCENT DE PAUL’S SOCIETY**  | **October 2012 – November 2014** |
| *Night Patrol Member* | (2 years, 1 month) |
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| * Distributed food and supplies to homeless and marginalised members of the community in Surry Hills and Martin Place

**ST ALOYSIUS’ COLLEGE PHILLIPINES IMMERSION November 2013** *Member* (1 month)* Conversed and played basketball with inmates on visitations to maximum security prisons
* Aided the charity Gawad Kalinga by constructing homes for a local disadvantaged community in central Manila
* On multiple occasions ran impromptu lessons for local children, teaching English and Australian culture
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| **PART-TIME WORK EXPERIENCE** |
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| **ST ALOYSIUS’ COLLEGE** | **January 2018 – July 2019** |
| *Basketball Coach of 3/4 AB teams* | (1 year, 6 months –) |
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| * Organised trainings, coached games and communicated with young team members and fellow coaches.
* Successfully lead two teams to a combined twenty-three wins to one loss in first season with the 3/4 A team going undefeated.
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| **MCCONNEL SMITH & JOHNSON** | **January 2016 and January 2019** |
| *Part-timer* | (2 months) |
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| * Contributed to the creation of floor plan sheets for Coffs Harbour Hospital by doing data input, manipulation and processing using Revit Architecture software platform.
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| **KURTOSH**  |  **November 2017 – May 2019** |
| *Floor Staff* | (1 year, 5 months –) |
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| * Manage daily routine of the business while assisting production of bakery.
* Customer service from a cashier, serving counter and waiting tables.
* Consistent and dynamic working environment; cleaning dishes, clearing tables, helping couriers, but still prioritising the service of potential customers.
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| **REFEREES** |
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| Referees available on request |