

Professor Martin Crimp – Michigan State University, USA

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I am on sabbatical from Michigan State University, where I have been on the faculty in the Department of Chemical Engineering and Materials Science for the past 33 years. Here at the University of Canterbury I am teaching the Failure Analysis course in the Department of Mechanical Engineering. I teach a similar course to our seniors at MSU, but some of the nuances are a bit different. I am working with Professor Milo Kral, who has extensive experience in failure analysis, which is allowing me to expand my understanding of the field into different areas.

My wife and I enjoyed a three week trip of New Zealand in 2017 and found the country and people very much to our liking. At that point I casually thought that New Zealand would be a nice place to do a sabbatical, but didn't know much about the universities in NZ. A few months later I ran into a colleague from a different department at MSU who I hadn't seen in a while and discovered she had been at UC on an Erskine Fellowship. The program sounded wonderful, so I reached out to a few people in the UC Mechanical Engineering Department to see if there might be any opportunities for me. Professor Kral responded that he thought I would be a good fit. The original plan was to come to UC in the later half of 2021, but of course COVID meant there had to be some adjustments to the schedule.

Thus far I have been really focused on teaching the failure analysis course. As the focus on failure analysis is a bit different in New Zealand than in the USA, I am completely re-working my notes and slides. One area I have not done a lot of work on in the past are corrosion failures, but I am finding that in New Zealand a significant fraction of the failures encountered deal with various aspects of corrosion. One of the things I always enjoy about teaching failure analysis is spending time mentoring students in the lab. I am finding the students here at UC to be very enthusiastic with strong backgrounds, making the time in lab very enjoyable.

There are so many things. First, across the board I have found the academic, technical, and support staff great to work with. Likewise, the facilities are great. More broadly, my wife and I love spending time in the outdoors, and UC/Christchurch is a great place to access those activities. So far we have been doing some skiing and some short hikes, with some longer multi-day treks planned. We have also been enjoying the wonderful parks in the area and the great variety of restaurants.

We really appreciate how welcome we have felt here at UC and in NZ. I am very grateful for the opportunity the UC and the Erskine program have afforded me.