

Experience Report by Leon Podehl

I was studying Engineering and Management at Technical University Berlin when I got the chance to go on a semester abroad with Nordic Water Network. The NWN and the chair of Fluid System Dynamics at TU Berlin gave me the opportunity to exchange to NTNU Trondheim to do research on tidal turbines for my graduation work. During my 4-month-stay in Trondheim, NWN and DAAD supported me with a scholarship. The monetary support enabled me to focus on my studies and was further very helpful to have a great time making many new friends, learning about a new society and hiking through Norway's impressive landscape.

Before I flew over to Norway I needed to set up only a few things. I have been put into contact with NTNU to activate the obligatory accounts and get some information concerning the first weeks at the new university. The administration was made quite simple but to participate in a Norwegian class I was unfortunately too late. Consequently I needed to learn some basics of the Norwegian language on my own. With the help of some app I already learned some easy vocabulary. The Norwegian people appreciate this striving quite much which helped me to find a housing on the private market in Trondheim. I was still quite lucky finding a flatshare in Norway since me and the potential roommates were only having a skype-interview to get to know each other. However, I found a nice flatshare on „hybel.no“, which seems to be a frequently used website for this purpose. My flat was quite cosy and even equipped with a sauna, but the best thing about the little room of mine, were the native Norwegian roommates who would make my stay a proper Norwegian experience.

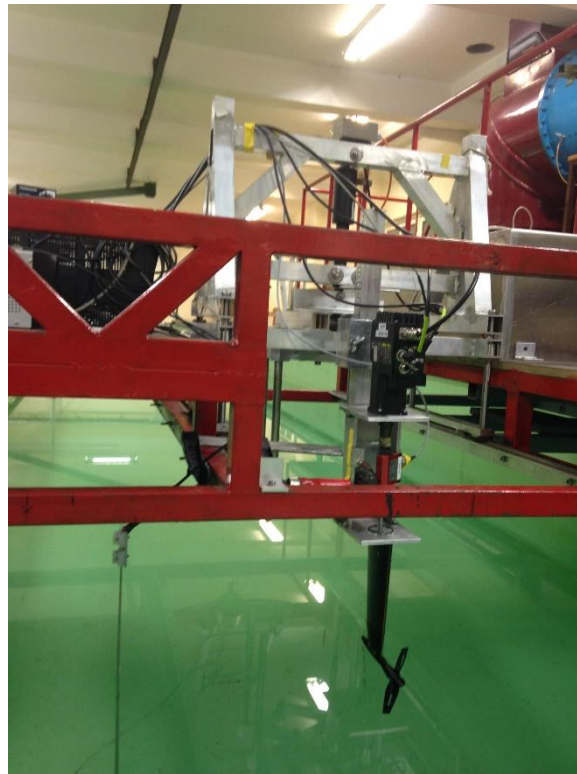


On the first days, contact was mainly made with other exchange students who also joined the highly recommended Orientation Week. We all had been invited to go hiking in the near-by mountains, do a city rally, play viking chess and visit a match of the local soccer team called Rosenborg. The activities helped a lot to get started in Trondheim and at NTNU and beside that, the organizers of Orientation Week and staff of International House used the different events to provide us with important information about studying at NTNU. They taught us everything to know about the applications which students use to sign into courses and exams, how to get your student-ID about two more registration surveys we needed to take, one at the police station and another one at the post office. Last but not least, I recognized I should buy myself a bicycle since the bus tickets are quite expensive and the distances you have in Trondheim are just fine for biking. I bought a ride on student market Trondheim, a group on facebook, on which exchange students basically trade everything. Finally, I was ready to start my semester at NTNU.

During the four months of my stay, my main objective was to conduct experiments and do the analysis for my bachelor thesis. My subject was the influence of surface waves on horizontal axis tidal turbines. I got access to a small towing tank at the campus of marine technology. I frequently discussed my plans

and my achievements with my professor at NTNU, prof. Bjornar Pettersen. He supported me finding the thesis and gave me a lot of freedom and motivation. I have been working together with Torgeir Wahl, an employee of NTNU, who helped me a lot to get all the equipment I needed and he moreover often provided me with helpful feedback. Beside that, I communicated quite a lot with various students either working on the same facility, working on related subjects or using some applications I would need later. I definitely had a lot fun and gained very valuable theoretical and practical experience in the field of technical experiments and tidal turbines.

Parallel to my graduation work I wanted to participate in a regular class at NTNU too. I found an interesting course called „Sustainable Utilization of Marine Resources“ which dealt with fishery technology, maritime biology and especially with aquaculture, Norway’s second largest industry after oil exploration. To get 7,5ETCS-Points I needed to pass an oral exam about the lecture’s content and deliver a group work. Me and my group worked on the topic „Environmental Benefits of Polyculture“. We gave a presentation and wrote a scientific paper. I enjoyed the class a lot because I learned about a new subject and I got to work together with other exchange students from Spain and Mauritius. On top of that, we even went on a trip around the fjord with a research vessel boat on which they showed us how they do trawling and we actually caught fish.



In my free time it never got boring either. First of all, I chose from NTNU’s great sports offer and decided to play soccer with „NTNU-Exchange-Team“ and try „Lindy Hop Dancing“. With the soccer team, I had fun practices twice a week and even supported the pack with their matches at the weekend. The dancing classes were not less exciting and the members even met Friday afternoon to have a social gathering. Second of all, my roommates gave me the hint to apply with Samfundet. Samfundet is a huge social club from students for students. They run a restaurant, several bars, theatre events, a café, political and fun talks, concerts, clubbing and even more. I have been voluntarily working at Samfundet as a bartender and waiter and had a great time. The Norwegian students at Samfundet organize many fun internal events and stand together as a family. I would say I got an inside view into a very unique Norwegian student initiative which was a very valuable experience.

One thing I must not forget to talk about that is the Norwegian landscape. The mountains and the ocean are probably most important to the Norwegian culture. Its nature made Norway loved by everybody appreciating outdoor activities with picturesque views in a breathtaking wild. Nearly every Norwegian family owns a little cabin in the mountains to go hiking, skiing, fishing or hunting and spent some calm days. Luckily the university owns some of these cabins situated around Trondheim too. It is a beautiful activity and special to Norway to go on a trip with your friends, taking cross country skis to one of these cabins and getting warm again at the bonfire.

All these different experiences I have made during my stay in Norway are very important to me. I was able to follow my interests in engineering deeper than ever before. I have been responsible for every step in my experiments' progress and dealt with many different problems, but I improved while taking on this challenge. I have made many new friends and learned a lot from all these interesting people along my path. I experienced life in a way different city and people with a different mind set. Consequently I learned a lot about my preferences and myself in general too. I clearly do not want to miss this time. I am very happy for the chance Nordic Water Network and the Chair of Fluid System Dynamics gave me.

Links: student market trondheim - <https://www.facebook.com/groups/288352844604218/>

Finding a flatshare - <https://hybel.no/>