

學校簡介

達姆施塔特工業大學 (Technische Universität Darmstadt) 位於德國黑森邦 (Hessen)，距離大城市法蘭克福只需要 20 分鐘左右的車程，交通位置十分方便。達姆施塔特工業大學為德國九所卓越理工大學聯盟 (TU9) 的成員之一，而其所在的城市 (Darmstadt) 也因此被譽為科學城 (Wissenschaftsstadt)。順帶一提，化學元素週期表中的鎵元素 (Ds) 即是在此大學被發現的。該學校的多個科系皆提供充分的英文課程，也有高比例的國際學生。此外在每個學期開始前的一個月，會提供為期四週的德文密集課程，依個人德文程度分級，從最初階 A1 到最進階 C2 的課程皆有提供。學校也具有完善的國際生組織及社團，例如 ISS (International Student Service)、ESN (Erasmus Student Network) 以及 ITT (Interculture Tutors Team) 等，會定期舉辦課外活動讓學生參與。

國外研修之課程學習（課內），另外推薦受益最多/最喜歡的課程

在達姆施塔特工業大學材料課學所中，我修習了一門必修課：Theoretical Methods in Materials Science，以及一門選修課：Density Functional Theory – A Practical Introduction。系上的課業對我而言並不輕鬆，必修課每週都有作業需要完成，並在課堂上會抽籤讓同學上台解題。期末考的筆試出題靈活，需要熟知理論並加以延伸應用才能順利作答。而選修課則是學習寫程式來模擬計算，且期末考試為口試，對我也是個大挑戰，還好最後都順利通過。此外，除了開學前的德文密集課，我也推薦學期間繼續修下個分級的德文課。藉由德文課我可以更認識德國的文化及歷史，並且嘗試用德文與同學討論或分享各種主題，雖然德文真的不簡單，單字又長又難背，文法的規定也很多，不過每堂德文課真的都讓我收穫滿滿！

國外研修之生活學習（課外）

在歐洲的七個月，我也充分利用課餘時間到各地旅行，去了瑞典看極光、荷蘭體驗大麻、柏林夜店生活、大加那利群島度假，體驗了波瀾震撼的集中營、義大利的藝文氣息、巴黎充滿藝術的博物館、奧地利維也納的音樂會、匈牙利的溫泉、捷克有名的黑光劇、波羅地海三小國獨立的歷史、德國黑森林的無限速自駕、克羅埃西亞及斯洛維尼亞的自然美景、慕尼黑啤酒節等等，還有太多地方無法一一列舉，每段旅程對我而言都很有意義，也因為拜訪這些城市而更深入了解歐洲各地的文化及歷史。除了旅行之外，我也參加了學校的運動會、湖上 SUP 的活動，以及系上朋友的生日烤肉派對，和許多外國朋友一起創造特別的回憶。

交換/研修之具體效益（請條列式列舉）

1. 增進獨立思考能力：
與自己獨處的時間增加，因此需要更常獨立思考並做決定。
2. 外語能力 (德文、英文) 進步：
德文課程讓我能夠應付日常對話，以及聽懂車站或商店廣播；而與國際生的交流也使我的英文溝通能力進步。
3. 增進國際視野：
歐洲的文化與歷史非常值得探索與學習，透過旅行能體會到更深入且不同的觀點。
4. 體驗授課方式與學習氛圍：
課堂上有許多師生間的互動，使課程不枯燥乏味。
5. 享受生活，勇敢做夢：
歐洲較緩慢的步調，加上德國人率性的性情，我學會如何不在意世俗眼光，更懂得享受人生。

海外生活期間是否曾遭遇困境，及是否解決問題?如是，請說明如何解決問題;如未解決，請說明事件最大的啟發及思考未來可以怎麼解決?

在德國生活的時候遭受到多次歧視，印象深刻的有搭手扶梯的時候一群小孩故意故意按緊急停止鈕，使我和朋友們驟停；以及晚上走在街上有男子在我們背後竊竊私語，說我們是freak。遭受歧視一直是我無法解決的問題，也思考過很多次該怎麼做才是最好的，每次都是自己氣一氣就過去了，沒有一次採取行動，也不知道如果為自己發聲反擊會有什麼後果。後來我選擇放寬心無視，相信這個世界大部分的人都還是善良的，少數的人可能內心有什麼缺失才會如此攻擊他人。

海外生活期間是否曾遭遇文化衝擊，您如何去面對及適應?

由於德國的鐵路非常容易誤點，而且幾十分鐘是家常便飯，幾個小時也是常情，甚至會有班次直接取消的情況，對於討厭等待的我來說是一大困擾。不過德國人都習以為常，因此後來的我都決定下載電子書或影片，可以在車站或車上打發時間。而如果是旅行，就都走隨興的行程，不事先安排太滿，如此一來也就漸漸適應瘋狂誤點的德鐵了。

海外生活歷練是否為您人生帶來不一樣的改變或者個人特質上的轉變，最大的成長是什麼?

由於我很喜歡也很享受獨自旅行，因此透過安排旅程及設法獨自融入當地而感受到自己變得更獨立，也更能夠處理遇到的困難或危機。此外，歐洲許多地區受藝術薰陶，讓喜愛藝術的我欲罷不能，也在用心感受藝術之際，覺得更能勇敢做自己，也更懂得慢下步調享受生活，對我來說就是最大的成長。

您認為獎學金對您海外研修最大的幫助是什麼?有無獎學金是否會改變您的出國計畫?

歐洲的開銷龐大，獎學金可以補貼一些日常生活所需的花費。若無獎學金，在國外期間可能就無法放心的消費，每一筆錢都需要精打細算並且花在刀口上。

感言及心得感想

很感謝有這次的機會可以出國交換，對我而言非常充實，不僅為我人生畫下了精彩的一頁，也是很多想法改變的轉捩點。其實在國外的這段日子也很不平靜，因為戰爭而親身體會到了非常明顯的通貨膨脹，除了加油站看板上顯示的油價越來越高，食物與生活用品的價錢也不斷上漲，而且我的宿舍房租也在最後幾個月宣布調漲。天然氣及電力的短缺，迫使學校採取許多節能措施來應對即將到來的冬天。

世界很大，很多人事事物都值得我們去發現、去關心，如果能慢下腳步來多體驗不同的生活，而不是只一直關注有關自己事物，我覺得心胸會寬大許多，待人處事也會有所改變。

英文心得(包含學校簡介、課程學習、生活學習、具體效益、心得感想等等)

Technical University of Darmstadt is located in Hessen state, Germany, which is about 20 minutes from Frankfurt by train. The university is a member of TU9, a network of the most notable German universities of technology, and Darmstadt is known as a science city as well. By the way, the element Ds in periodic table of element is found by the university. There are many departments which offer a plenty of courses in English, and the ratio of international students is high. Besides, the university also offers intensive German courses for four weeks before the semester starts, and the courses are provided for both beginner and expert. Furthermore, the international organizations are well planned, such as international student service, Erasmus student network and intercultural tutors team, etc. They would hold activities for students.

I major in material science in TU Darmstadt, and I take two professional courses: Theoretical Methods in Materials Science and Density Functional Theory. The courses are not easy, and I have to spend a lot of time on them. For the former one, home assignments have to be done every week, and students are chosen randomly to present their solution. The final exam is quite difficult, since we need to be really familiar with the theorem and consider the application of it. The latter course I mentioned is about modeling and calculation. The final exam is an oral exam, which is a big challenge for me as well. Fortunately, I pass the exams and get the credits for both courses.

I also take German course during the semester. By the lectures, I can realize more about the culture and history of Germany, and try to discuss many topics with classmate in German. Although German is difficult, for example, the words are often too long to remember and the grammar rules are complicated, I still gain lots of knowledge from every German course.

I spend most of my spare time traveling in Europe. I go to Sweden to see aurora. I experience weeds in the Netherlands, the pub in Berlin, the concert in Vienna, the black light drama in Czech, and the thermal bath in Hungary. I am attracted by the beautiful scenery in Gran Canaria, Croatia and black forest in Germany. I also visit Auschwitz Nazi concentration camp in Poland, art museums in Italy and Paris, history museums in Baltic states, and Oktoberfest in Munich. Every trip is meaningful to me, and I learn more about the places after visiting the cities. Except traveling, I join the school sport game and the birthday party with my foreign friends, making a special memory.

There are some advantages I have gained during the exchange period. First, the ability of thinking independently is improved, since I have to decide many things alone. Second, I can speak English and German more fluently by using these languages frequently. Third, by traveling to different places, I can learn other views of points and broaden my international perspective. Besides, exploring different teaching way is also a special experience. Last but not least, with the slower living path and the truly behavior of German, I realize how to enjoy the life without caring others' eye.

I really appreciate that I have the opportunity to go abroad for this exchange program. The life in Germany is not only fulfilling, but also the turning point of my thought. Actually, the life is not peaceful all the time, since the war results in an obvious inflation. The price of petroleum, food and daily necessities are all raising, and the rent of my dormitory raise at the last two months. The shortage of natural gas and electricity force the school to take measures about energy conservation.

The world is large, and there are many things which worth concerning. The more we experience others' life, the broader our mind would be. Therefore, I hope that I can keep paying attention on this changing world.