

## RuhrFellowship 2017



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Wir danken allei für die Bereit Bilder für dies Verfüg

### Vorwort

Lobende Worte für die Industriekultur und die Forschungslandschaft im Ruhrgebiet, die Begeisterung für Currywurst und Döner sowie die Erkenntnis, zwei aufregende und interessante Monate erlebt zu haben - das alles verbindet 17 Studierende der US-Eliteuniversitäten Berkeley, Harvard, Pennsylvania und Princeton, die im Sommer als RuhrFellows 2017 das Ruhrgebiet kennenlernen durften. Auf Einladung des Initiativkreises Ruhr und der Universitätsallianz Ruhr (UA Ruhr) absolvierten sie Praktika in Unternehmen der Region, verbesserten ihre Deutschkenntnisse und besuchten eine Summer School, organisiert von der Universität Duisburg-Essen. Ihre Erlebnisse, Erfahrungen und Gedanken haben die Ruhr-Fellows in persönlichen Einträgen und mit zahlreichen Fotos dokumentiert. Ergebnis ist dieses Flipbook.

Mittlerweile sind unsere Gäste wieder in ihr Heimatland zurückgekehrt – als Botschafter der Region. Denn wir sind sicher, dass wir die US-Stipendiaten von dem hohen internationalen Standard unserer Hochschulen und Unternehmen überzeugen konnten. Während ihres Aufenthalts lernten die Studierenden die Universitäten der UA Ruhr kennen und knüpften Kontakte in die Ruhr-Wirtschaft. Praktikumsplätze boten die Unternehmen Brenntag, Contilia, duisport, EMSCHERGENOSSENSCHAFT und LIPPEVERBAND, Evonik, HOCHTIEF, innogy, ista, KPMG, NATIONAL-BANK, RAG und Vaillant an. Zahlreiche Exkursionen führten zu Einrichtungen und Orten, die den Studierenden Einblicke in die wirtschaftliche Vielfalt und kulturelle Attraktivität der Ruhr-Region ermöglichten. Ein besonderes Highlight war das Treffen mit dem höchsten Diplomaten der USA im äußersten Westen Deutschlands, Generalkonsul Michael R. Keller.

In den USA erwartet die RuhrFellows 2017 nun das Alumni-Programm des Verbindungsbüros der UA Ruhr in New York, in das sie eng eingebunden werden. Und wer weiß: Vielleicht zieht es einige von ihnen schon bald wieder zurück ins Ruhrgebiet. Sie wären nicht die ersten Teilnehmer des Programms, auf die das zutrifft. Schon heute haben sich einige der US-Stipendiaten dazu entschieden, ihre berufliche Zukunft bei Unternehmen der Ruhr-Wirtschaft zu suchen.

Das passt zur neuesten Entwicklung des RuhrFellowships. Denn ab jetzt heißt es: Auf zu neuen Ufern. Beim Transatlantic RuhrFellowship können besonders begabte und interessierte Studierende aus unserer Region Einblicke in die amerikanische Unternehmenskultur gewinnen und praktische Arbeitserfahrungen in der Metropolregion New York sammeln - RuhrFellowship "reverse" sozusagen. Das im Sommer 2017 gestartete Format kam bei den Studierenden so gut an, dass es auch 2018 stattfinden wird. Organisiert wird der Aufenthalt von der UA Ruhr, der Initiativkreis Ruhr unterstützt das Programm.

Wir sind davon überzeugt, dass die Transatlantic RuhrFellows unvergessliche Erfahrungen in den USA sammeln werden, von denen am Ende auch die Universitäten und Unternehmen im Ruhrgebiet profitieren.

Wir wünschen Ihnen viel Spaß bei der Lektüre.

Mit den besten Grüßen

Dirk Opalka Geschäftsführer der Initiativkreis Ruhr GmbH



Prof. Dr. Ulrich Radtke Rektor der Universität Duisburg-Essen

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### **Preface**

An appreciation of the industrial heritage, culture, and research environment in the Ruhr Area, a love of Currywurst and döner kebab, and the memory of two interesting and exciting months are just some of the things that will remain with seventeeen students from the US elite universities Berkeley, Harvard, Pennsylvania, and Princeton after their summer visit to the Ruhr Area as Ruhr Fellows 2017. Invited by the Initiativkreis Ruhr and the University Alliance Ruhr (UA Ruhr), they completed internships with companies in the region, improved their German language skills, and took part in a summer school organized by the University of Duisburg-Essen. The Ruhr Fellows have documented their impressions, experiences, and thoughts in a series of personal accounts and photos. This flipbook is the result.

Our guests have meanwhile returned home - as ambassadors for the region. We are confident that the US Fellows have taken with them a positive impression of the high international standard of our universities and companies. During their stay, they were introduced to the UA Ruhr universities and made contacts in the Ruhr economy. Internships were hosted by Brenntag, Contilia, duisport, EMSCHERGENOSSENSCHAFT und LIPPEVERBAND, Evonik, HOCHTIEF, innogy, ista, KPMG, NATIONAL-BANK, RAG, and Vaillant. The students took part in excursions to institutions and places of interest that reflect the economic diversity and cultural appeal of the Ruhr Area. A special highlight of their stay was meeting with the most senior US diplomat in the far west of Germany, the Consul General Michael R.

Back in the USA, the Ruhr Fellows 2017 can now look forward to being closely involved in the alumni program of the UA Ruhr Liaison Office in New York. And who knows. some of them may find themselves back in the Ruhr Area soon. They would not be the first of the program's participants to do so. Some US Fellows have already decided to look for career opportunities with companies in the Ruhr economy.

That ties in neatly with the latest development in the Ruhr Fellowship. As part of the Transatlantic Ruhr Fellowship, especially talented and motivated students from our region now have the chance to look inside US corporate culture and gain practical work experience in the New York metropolitan area - the Ruhr Fellowship in reverse, so to speak. The new program launched in summer 2017 and was so well received by students that it is being repeated in 2018. The stay is organized by the UA Ruhr, with the Initiativkreis Ruhr supporting the program.

We are certain that the Transatlantic Ruhr Fellows will have an unforgettable time in the USA, and that their experiences will ultimately benefit the universities and companies in the Ruhr Area.

We hope you enjoy reading the book.

Kind regards,

Dirk Opalka Managing Director Initiativkreis Ruhr GmbH



Prof. Dr. Ulrich Radtke Rector of the University of Duisburg-Essen

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## Übersicht der Teilnehmer Overview of Participants

Studierende	Universität	Hauptfach	Nebenfach	Unternehmen
Agajanian, Mary	Harvard	Mechanical Engineering	Mathematical Sciences	ista
Born, Ryan	Princeton	History and Practice of Diplomacy (prospective)	Entrepeneurship (prospective)	NATIONAL-BANK
Clemente, Jeah	UC Berkeley	Integrative Biology	/	Contilia
Grizos, Alexandra	UPenn	Health and Societies, Concentration in Healthcare Markets and Finance	/	Contilia
Hui, Jasmine	Princeton	Economics	Finance, German	KPMG
Istvan, Brooke	Harvard	Applied Mathematics focused in Economics, German		Duisburger Hafen
Kalemaj, Iden	Princeton	Mathematics	Computer Science	KPMG
Lee, Cynthia	UPenn	Computer Science	Physics, Cognitive Science	innogy
Liu, Kristina	UC Berkeley	Chemistry	/	Evonik Industries
Prabhu, Anand	UPenn	Mechanical Engineering, Business	Mathematics	Vaillant Group
Saravanan, Shilpa	UPenn	Linguistics, Computer Science	French	RAG
Sharma, Sumesh	UC Berkeley	Chemical & Biomolecular Engineering	Concentration in Biotechnology	Evonik Industries
Soldini, Andrew	Harvard	Applied Math: Economics	/	HOCHTIEF
Tong, Cynthia	UPenn	Chemical & Biomolecular Engineering	Engineering Entrepreneurship	EMSCHERGENOSSENSCHAFT und LIPPEVERBAND
Wu, Quinn	UPenn	Computer Science, Statistics (Wharton)	Mathematics	innogy
Yoon, Kevin	Harvard	Electrical Engineering	Computer Science	innogy
Zhou, Frank	Harvard	Chemistry	German Languages and Literatures	Brenntag





**O** UC Berkeley

## Phase 1 Summer School

The University Duisburg-Essen organized this year's summer school for the RuhrFellowship. In June, the students improved their German language skills in a four-week intensive language course. Besides the language course, the RuhrFellows visited UDE's main research centers, like Nanoscience and Urban Systems, and the UA Ruhr Partner Universities Ruhr-University Bochum and Technical University Dortmund. This provided the students with an excellent overview of the academic offerings of the region and gave them an idea of how it must feel to study and research in the Ruhr area.

Throughout the month of June, the RuhrFellows visited some of the most important companies in the Ruhr area as RWE's open brown coal pit in Garzweiler or duisport with

the world's largest inland port. One of the highlights was the visit of RAG's mine Prosper Haniel. Going down more than 1000 meters below the surface, witnessing the work of today's coal miners and getting an experience only few will get in the future as German coal mines are going to close by 2018.

#### **Program icluded CEO talks**

At a talk with Vaillant's CEO Dr. Carsten Voigtländer the RuhrFellows could experience the importance of family owned German business for the German economy and how they prepare for the future. For the first time the program included three CEO talks. Apart from Dr. Voigtländer the students got the chance to interact and discuss with



Nikolaus Graf von Matuschka, CEO of HOCHTIEF Solutions AG and member of the board of HOCHTIEF AG, and Dr. Thomas A. Lange, CEO of NATIONAL-BANK and Co-Moderator of Initiativkreis Ruhr.

Furthermore, the RuhrFellows visited Landtag NRW, the state parliament of North Rhine-Westphalia (NRW) and had the opportunity of a discussion with Vice President of NRW Landtag Angela Freimuth. It was also of importance to give the group an impression of the cultural heritage and vibrant cultural scene which the Ruhr Area offers. Visiting the UNESCO World Heritage Zeche Zollverein with a guided tour to Ruhr Museum, showing different aspects of the Ruhr Area's past, present and future. In addition, a visit to the famous Klavier-Festival Ruhr with a piano concert by

Rafał Blechacz made the Fellows feel the cultural diversity of the region. A visit to Landschaftspark Duisburg Nord gave insights into the transformation from a former steel mill to a recreational park and location for cultural events. Visiting the Football Stadium of Borussia Dortmund gave a first taste of what football means to Germans and especially to the people from the Ruhr Area.

Language course, company and cultural visits got framed by UDE's buddy program. The idea: Bringing together one RuhrFellow and one student from UDE to experience intercultural communication, to help each other and simply to get to know more about Germany and Europe.

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## **Resümees aus Übersee** Résumés from Overseas



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## **Mary** Agajanian



efore the Ruhr Fellowship, I had never heard of Essen, never spoken a word of German, and never seriously considered studying and working internationally. When I landed at Düsseldorf International Airport in early June, I wasn't sure what to expect. Soccer, beer, schnitzel - and coal mines?

From the beginning, the Ruhr area was an intriguing combination of industrialization and nature: green hills and fields interrupted by factories, the Ruhr and Rhine rivers flowing besides castles and old mines without discrimination, and beautiful old towns preserved in full splendor immediately upon exiting the Deutsche Bahn. It was the single most contradictory yet beautiful place I had seen. The Ruhr Fellowship made sure we had the chance to see it all.

#### Incredibly diverse experience

In the first month of the program, we wore hard hats and protective suits and went down to the last working coal mine in Germany, visited the Landtag in Düsseldorf and met the Vice President of North Rhine-Westphalia's Parliament, toured a power plant and saw firsthand the magnitude of Germany's efforts towards sustainability and clean energy, and enjoyed the view from the best seats in the BVB Dortmund stadium on our personal tour of the stadium. We had opportunities to hear from and question CEOs of prominent local companies and to network with other students from the US studying or researching in nearby cities. Our calendars were always full and our mornings always early, but the incredibly diverse experiences and opportunities available to us through the Ruhr Fellowship were unique, specific, and unparalleled by any other study or work experience abroad.

#### **Exploring the Ruhr**

As we lived in student dorms only a short walk away from the Hauptbahnhof, the rest of the Ruhr fellows and I took every opportunity to travel during this first month. As Essen and the Ruhr area are conveniently located in northwest Germany, travel was always fast and accessible.



We spent every weekend exploring both the Ruhr and the rest of Germany and the EU, booking spontaneous flights to Munich; taking the DB on day trips to Münster, Köln, and Aachen; sleeping on overnight buses to Paris; and getting lost on road trips to Belgium. Through these experiences, we became incredibly close friends; these were all students I would have never met without the Ruhr Fellowship, but students I now can't imagine never knowing.

In addition to seeing the sights, we also learned a lot about higher education in Germany. We took German language classes at the University of Duisburg-Essen, met local German students at a Stammtisch in Duisburg, and heard presentations about the academic opportunities available to university-level students in Germany. Though by the end of the summer I wasn't fluent in German by any means, I





## "The Ruhr area is an intriguing combination of industrialization and nature"

could guess at a German sentence's meaning with relatively high accuracy and navigate without a problem.

#### **Experience work culture in Germany**

I spent the second half of the summer working at ista International GmbH, as part of their Electronic Development division. As an honorary member of Team Sensors and Actuators, I had the opportunity to see firsthand the interaction between all kinds of scientists and engineers throughout the product development process. I was initially nervous that my lack of German would make for a silent and lonely internship experience, yet my coworkers always made time to grab a coffee, chat about their favorite soccer teams, and give me pointers when I was struggling. Although my project was daunting at first, with the

guidance of the Electronic and Mechanical Development teams, I was able to contribute ultimately in a way that was both interesting and educational for me and useful to the team. Throughout my time with ista, I got to experience "work culture" in Germany for myself and, by the end of my seven weeks, I was sad to leave.

When I returned to the US in August, I felt as though I were entering a foreign country – life in Germany had become my norm! The Ruhr Fellowship provided an incredible summer that I hope every student interested in German and Germany can experience. I look forward to Essen and the Ruhr area again in the future!



y grandmother is from Bremen and my Opa is from the Rheinland, so going to Germany is always like going home for me. That was especially the case when living in Essen for two months as part of the Ruhr Fellowship Program. Before I came to the Ruhr Area, I knew that it was historically the industrial heartland of Germany as well as its coal country. What I did not expect is how thoroughly coal has been supplanted in the region as well as the huge diversity of both manufacturing and business interests as well as cultural enterprises. I can safely say that the Ruhr Area made me more optimistic about the potential for progress in my home state of Michigan, which like Essen was primarily industrial and now looks for a new place in the world, as well as other regions of the U.S (Appalachia, and the Rust Belt, especially).

### **Ryan** Born

#### Many highlights during the program

Highlights of the program are almost too many to count, given how many things we did. CEO talks with Vaillant AG, HOCHTIEF AG, and NATIONAL-BANK AG were particular highlights as we learned and laughed with business leaders. I personally appreciated being able to explore the last hard-coal mine in Germany and appreciating the conditions that coal miners face now and what they would have faced back in the day. We kept returning to the Ruhr Area's coal mining roots with a visit to Prosper-Haniel, one of RWE's soft-coal mines, as well as the Ruhr Museum in Essen. Speaking of Essen, how could we forget the magnificent performance from a world-champion Polish Pianist in the Essen Philharmonie? I also think visiting North-Rhine Westphalia's capital building to be a big plus, especially the tour we were given and being able to talk with a politician.

My internship was at NATIONAL-BANK at its Essen Headquarters, where I worked two weeks for the equity research division and then two weeks at its international division. When working for the equity research division, I saw how

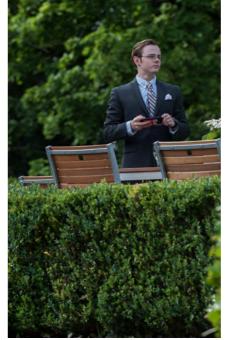




NATIONAL-BANK can use its research team to secure customers, as well as doing my own research on equities. As part of the International Department, I learned about die Akkreditive (letters of credit), which are vital naturally to the German Mittelstand's ability to export and grow Germany's export economy. I also learned about currency hedging. I highly enjoyed being under the mentorship of senior management officials. All in all I think it was a great move for my own personal development.

#### Experience will open many doors

Speaking of personal development, it would be hard to say I did not grow as a person as part of the Ruhr Fellowship Program. It is not an easy thing to live abroad, even when it was my second time living and working in Germany. I grew more confident in myself in my ability to be my own person and set my own agenda while in Germany, and I continue to appreciate several aspects of German culture even more and perhaps with more nuance than I did before. I





appreciated the ability for me to review my six years of German learning with instruction at the Ruhr University in Essen. Language is not only important for learning or business but also as a connection to my family history. The ability to work in a bank, especially abroad, was also key to my professional development. I trust that my experience living and working in Germany within the context of the Ruhr program will open many doors for me; perhaps even causing me to live here once again.

I think in sum, not only did I experience a lot and learn a lot from my time in the Ruhr Area, it also had a profound effect on me moving forward. Whether it was seeing how electricity is generated, or Germany's adaptations towards climate change, the history of the coal miner, or the innerworkings of one of Germany's foremost regional banks, the Ruhr Area offered a lot to me. More than anything, as a student of philosophy and history and politics, the Ruhr Area

is representative of many different ideas through the ages that have relevance today.

The ability to adapt and prosper and grow is a tremendous accomplishment. And that's how I'll leave this:

"The Ruhr Area means for me the possibility of change"

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## **Jeah** Clemente



v summer with the Ruhr Fellowship Program has been one for the books! I spent two months in the North Rhine-Westphalia area where I got to hang out with a group of incredible students from all around the world, explore new places, and get the opportunity to work as a microbiology lab intern at Contilia Hospital.

#### Visiting historic places in Europe

Before I got to Germany, I spent a few days hanging out in Paris. This was my first time traveling outside of the US alone, as well as my first time visiting any part of Europe!! I spent my days trying to overcome jetlag, visiting historic places, and chatting with both locals and travelers that I met while eating meals throughout the day. Some of my favorite places that I visited were the Musée d'Orsay - an old train station turned into an art museum - the Eiffel Tower, and the Louvre. These incredible places displayed centuries worth of art and history, and I was in total disbelief that I was actually walking through the rooms of Napoleon's apartment, taking pictures right in front of the Eiffel Tower, and seeing the famous Mona Lisa painting live and in person! Being in Paris felt a

dream, and I am so glad I spent some time there before heading to Essen, Germany.

#### Learning a new language

When I landed at Dusseldorf airport, I was greeted by the friendliest, most caring, and best program director that ever existed - Mr. Florian Vollweiler. Mr. Vollweiler and his student assistant, Ashley, were the two people in charge of keeping us fellows up to date about our daily excursions and plans while we were in Germany. We got to see Mr. Vollweiler and Ashley nearly every day for our first month stay in Germany, and I'm glad to say that all the Ruhr fellows and I fostered a great relationship with both Mr. Vollweiler and

Ashley. We often times called Mr. Vollweiler "dad" and we always shared all our travel experiences with Ashlee whenever we were commuting to our excursions.

The first month of the program consisted of a mix of a German language class and daily excursions that included meetings and lunches with CEO's, company tours, and exploring the North Rhine-Westphalia area. Since I had never spoken a word of German in my life, I was placed in the beginning German course with about half the students from the program. It was great being able to start with everyone with no background in German because we really got to bond on the experience of learning a new language. Our class typically would start out with worksheets and then would move towards a more discussion based section where each student would have a turn practicing saying words and sentences in German. When we weren't in class, we got to go on daily excursions all around the North Rhine-Westphalia area. We visited and met CEO's at major companies such as Vaillant and HOCHTIEF, got tours of universities near the area, and we even got the honor of going gown into the last open coal mine in the Essen area. These excursions not only provided us with invaluable opportunities to see the "behind the scenes" in the industry world, but they also gave us the opportunity to get to know the people behind such successful companies and organizations.







#### Respect for the coal miners

Visiting the last opened coal mine was one of the highlights from the entire trip. Everyone who went got to dress up in the coal miner outfit: long pants, long shirt, a big jacket, a bandana, heavy duty boots, and knee-to-ankle pads. We traveled down 1200 meters below ground and got to see, firsthand, how the RAG company mines its coal every day. I really enjoyed being able to get to know the coal miners and seeing how much pride and comradery they had for the work that they do. I gained a whole different sense of appreciation and respect for the coal miners after seeing them on fully committed and enthusiastic about their day to day, deep underground work. The excursion ended with

a debrief with the workers of the coalmine and some delicious curry wurst and bread.

For the second half of the program, each Ruhr Fellow was assigned an internship to companies that matched their studies and interests. I was very fortunate to work with Conitlia Groupe, a hospital system spread throughout the Essen area. I worked as an intern in a microbiology lab inside the hospital where I got to help lab technicians on their day to day work. All of the hospital's human samples would be sent to the lab, and each person had a specific job at their parts of the lab. Working in the lab gave me the opportunity to shadow the different work stations of a general hospital lab,





learn more about the microbiology behind diseases and illnesses, and even got to grow my own colonies of bacteria! To help me with the language barrier and to get acclimated with my work, I had a fantastic lab mentor named Danny; she not only trained me on the weekly and daily duties that I was responsible for, but she also helped me practice my German and gave me really great tips on places to visit near the area.

#### Travel to nearby countries

On the weekends, I would often travel to nearby countries and cities. Over the eight weeks I was in Germany, I got to visit Prague, Vienna, Amsterdam, Mallorca, London, and I even squeezed in a weekend road trip with some of the

### "The Ruhr Area is an area with successful companies and organizations"

Ruhr fellows to a few cities in Belgium. I was so amazed at how close all the countries and cities were to one another, and how easy it was to jump from place to place. Coming from the United States, I was used to places being hundreds and thousands of miles from one another; traveling around Europe didn't seem like such a case. These trips gave me the opportunity to see the world, and I found myself feeling so lucky to be able to immerse myself in such amazing places. One of my favorite trips was a weekend in Mallorca – an island off of Spain. I spent nearly all my time swimming in some of the clearest, bluest waters, and when I wasn't in the water, I was riding a Vespa and beach hopping all around the island.

I feel very blessed to have had the opportunity to come to Germany as a Ruhr Fellow. This program gave me an incredible summer experience that I will always remember. I not only got to work with and meet professionals in their field, but I also gained 16 new friends who I believe I'll have long lasting relationships with. Big shout out to my fantastic roommate, Brooke Istvan, who I had the pleasure of living with and making dinner for on most nights!

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## **Alexandra**Grizos



s a Pennsylvanian, I came into Essen with a preconceived idea of what being a "coal town" meant. Many of the towns in Pennsylvania, once booming during the heyday of coal and steel, now find themselves left in the dust after the decline of these industries.

#### **Ruhrgebiet**

Upon arriving in the Ruhrgebiet I quickly found that it is thriving. The innovation of the Ruhr area in regards to its adaptation to a new rise in industry is striking. Instead of relying on its old industries, the area has embraced entirely new forms of industry diversification while still maintaining a strong remembrance of its past.

The greatest embodiment of the Ruhrgebiet for me was Landschaftspark in Duisburg. The park, created out of an old coal and steel mill, highlighted how the area has been able to transition from its industrial past to a green capital. Surrounded by colossal metal pipes and endless stairs, we played on the slides, climbed the rock wall, and even enjoyed a beer! The integration of nature and industry reflected the Ruhr area's dedication to creating open public spaces.

#### Classes and CEO talks

During our first month, we alternated between excursions, German class at the Universität Duisburg-Essen, and CEO talks. For one of our visits to energy company RWE, we toured an opencast coal mine and saw the massive





machinery. On another visit to Vaillant, a home heating and cooling company, we were lucky enough to have an open discussion with CEO Carsten Voigtlander! I found the international presence and strategy of Vaillant to be particularly fascinating because the brand is tailored well to expanding markets.

Finally, living in Germany would not have been complete without experiencing the culture around Fußball, or soccer! At the end of the month our group toured the astoundingly large BVB Dortmund stadium. We saw everything from the field to the locker rooms and even sat in the most expensive seats! Later into the program, a few of us went to the BVB vs Bochum preseason game. Needless to say, it lived up to the hype- even though we accidentally sat in the Bochum section.

#### **Working in Germany**

As someone who studied Health and Societies, I was thrilled to have the opportunity to work in the German healthcare sector. My company, Contilia Gruppe, is one of the largest hospital systems in the Ruhr area. I found my

time at Contilia to be the most challenging and rewarding experience of the Fellowship. Despite only having one year of German, I had to quickly adapt to the language and culture of the German working environment. At first it was difficult to express myself to my coworkers due to the language barrier. I had sticky notes all over my desk to remind me of which words to use. In addition to the language, it took me a while to get used to the formalities. For example, nearly everyone referred to coworkers, even ones they had know for years, as Herr or Frau.

Despite these challenges, I greatly enjoyed my time at Contilia. It felt great to finally be able to exercise my German while learning about my coworkers. Daily conversation became easier as the weeks went on, and by the fourth week I found myself excited to start new conversations with those around me. Overall, my coworkers warmly welcomed and encouraged me.

In addition to the work environment, I was also fascinated by the daily operations of the hospital. Through tours of the hospital and a trip to the local courthouse to learn

### "Das Ruhrgebiet ist für mich eine Inspiration für Innovationen in Deutschland und auf der ganzen Welt"

about employee rights, I became familiar with the critical aspects of running a hospital in Germany. I was particularly lucky to meet with one of the hospital's leaders to discuss how hospital care fits into the German healthcare ecosystem.

#### Einmal um die Welt!

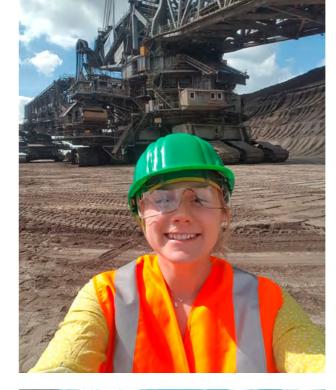
One of the best parts about living in Germany was how easy it is to travel to an entirely different area with its own distinctive culture. We took advantage of our weekends by traveling all across Germany and Europe! Within Germany, I traveled with other fellows to Düsseldorf, Cologne. Munich, Berlin, Stuttgart, and Heidelberg to name a few. Since Düsseldorf was only a short train ride away, we visited the city on many occasions for local government, the Tour de France, a carnival, and many fun nights out!

During July I travelled to perhaps the two most popular cities in Germany- Berlin and Munich. While I spent more hours on a train than I can count, I would not give up those long hours for anything. These cities highlighted some of the key differences between northern and southern Germany. While they each have their own vibe. I found them both incredibly appealing in their own way and would love to live in either of them. Additionally, Germany has a rich variety of geographies that was illustrated by the contrast between these major cities and Heidelberg. Heidelberg presented a picturesque, Disney-castle feel stemming from its beautiful castle and scenic location.

Outside of Germany, we visited Amsterdam, Vienna, and Prague. While Amsterdam and Vienna were fascinating, Prague stood out as the most beautiful place I had visited outside of Germany. Even though none of us spoke Czech, we found our way around and explored as much as possible.

#### Bis später!

Looking back on the Ruhr program, I realize just how much this program has impacted my development. After living in Germany, I cannot wait to return. As a graduated senior who has become a professional young adult, I know the experiences the Ruhr Fellowship offered me has, and will continue, to play a role in my daily life and long term goals. The Ruhr Fellowship allowed me to grow by inspiring me to take on challenges in new environments. Moreover, the Ruhr Fellowship has left me with the lasting goal to incorporate Germany into my professional life. Germany is now no longer a European country across the globe to me- it's a place I have called my home and greatly hope to again in the future.









## **Jasmine** Hui





nis summer with the Ruhr Fellowship was an amazing experience, allowing me to practice my German skills, travel around the country, learn about the history and industry in the Ruhrgebiet, and experience firsthand German work culture. Looking back, I gained much more than what I expected going into the Fellowship, both in terms of experience and the friendships I have made over the past two months.

#### Focus on renewable energy

The first month of the program was, for me, the time when I learned the most about the Ruhrgebiet. Though we toured many companies and talked to many leaders, the trip that stands out most in my memory is the visit of the RAG coal mine. We had been told a lot about how the area's economy had been historically based in heavy industry, especially coal and steel, but before that visit, those had just been words, and I didn't have any picture of what these industries looked like. Traveling so far down into the shaft gave me a headache, and along with the dirt, heat, and general discomfort of the working environment there. I was shocked. But what left the deepest impression were the workers in the coalmine. They laughed, joked with one another, sat on each other's laps despite the taxing nature of their work. It was quite inspiring to see that joy could be derived from what we see to be the some of the worst

work conditions possible, and that this entire area was built upon this backbone.

To me, the coalmine visit really cemented in my mind the idea that the people of this area were quintessentially German. They built this area up with their hard work, and in a very matter-of-fact manner, without complaint or resentment. Even after the Energiewende, when they were forced to reevaluate and restructure everything their economy was built on, many of the companies we visited set to work and redirected their focus to renewable and alternative forms of energy. They understood the world and their economy needed to change, and they worked to make it happen. In my mind, that is a very admirable, very 'German' way of thinking, and I really experienced and appreciated it in the Ruhrgebiet.

#### Internship was a highlight

My internship was another highlight of the summer. I worked at KPMG in the Strategy department, which is similar in nature to some of the work that consultants do. Consulting is something I had considered pursuing after university, and this summer further cemented this idea. The people I met at work, especially my boss, spent a lot of time getting to know me and introducing me to the work that they do. Through helping them out with presentations

and research, but more so through reading and observing their work, I gained a good understanding of both the industry and also of what work life is like in Germany. I'm not sure if it's just KPMG or if it's Germany in general, but the friendliness, cooperation and work-life balance I saw during my internship left a very positive impression on me.

Other than the coalmine visit and the entire internship experience, the other highlights of the program were things that my peers planned. I think I was very lucky this year to have such a great group of peers who were genuinely interested in this country, its history, culture, and language. I traveled with them on the weekends, cooked with them, went running with them, and had many, many beers with them. One of my highlights was seeing a pre-season football match at the end of July in Bochum, a friendly match between Bochum and Dortmund. It was not until I was physically at the football match and feeling the stands shake under my feet as fans cheered that I really understood what football meant to Germans. It was, of course, a lot of fun to stand under the sun surrounded by slightly drunk, hollering Germans, but it was also an incredible experience to see how passionate this country is about this sport. It may seem trivial, but it really seemed like something that kept family and friends together in the face of political and social troubles.

Though there are many immigrants and refugees in NRW, I really did feel in my two months there that it was a quintessentially German area. From its history and economy to the way that people dealt with the change that it had to confront, I found all of it quite remarkable, and I feel very lucky to have been able to call it home for a

"Das Ruhrgebiet ist für mich ein Beispiel von wirtschaftlichen Veränderungen, ein wesentlicher Teil der deutschen Geschichte, und ein Ort, der sich immer verändern wird"













## **Brooke** Istvan

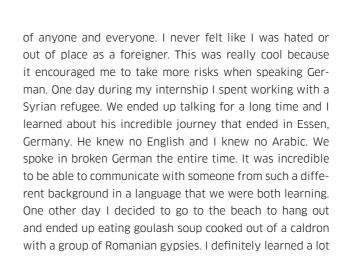


ne obvious and most striking thing about the Ruhr area to me was how progressive it was in so many ways. I had heard that the area is the heart of the German rust belt and had expected to find myself in a region full of factories, smoke, pollution, concrete cities, working class people stuck in their ways, and little innovation. What I found was the exact opposite. The area still may not be the most picturesque in Germany, but it is the most impressive in so many other ways. I think partly due to European/German energy and emission standards as well as incredible innovation, the Ruhr area has been a leader in the so-called "energy revolution." It was interesting to see how present this was in the strategy of all of the companies we visited. Even the large coal burning power plant was building more efficient generators that pollute less, and experimenting with the process of sequestration in which they essentially capture the CO2 to be used in carbonated beverages or to feed moss and algae rather than releasing it into the environment. The amount of renewable energy already in the area as well as the amount of time and resources dedicated to innovating and finding new renewable energy sources is astounding. I already knew

Germany and Europe in general were much more socially progressive than at home in America, but this type of environmental progressivity was amazing to me.

#### The People

Speaking of social progressivity, I was not only impressed by social systems like healthcare, parenting time off work, money for raising children and the unemployed, housing for the homeless (which don't exist in Germany because they all get houses!), but I thought the people were themselves progressive. The area is incredibly diverse. It is the area in Germany with the most immigrants. This generally means that the people are very welcoming and accepting



about German culture, but thanks to the amazingly open and welcoming diverse group of people living in the Ruhr region my horizons were infinitely expanded.

#### The Program

The Ruhr Fellowship program was the best possible summer opportunity I could have asked for. The first month our program went on cool excursions almost every day. The excursions were so interesting and fun. One time we went down in a coal mine and the next time we were eating dinner in a castle with the CEO of the National Bank. I learned so much more from the month of visiting different companies and parts of the region than I could have doing an

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internship anywhere else. I loved getting to talk with CEOs of different companies and understand what problems they were thinking about and their strategies to address them. I learned just as much from the organized events as I did from the other students in the program. Our group of students from UPenn, Princeton, Berkley, and Harvard was so diverse but got along so well. We frequently ended up sitting in the kitchen in my room just talking late into the night. Having a group of students to live with from such different backgrounds who are experiencing the same things was very valuable for when things got uncomfortable in a foreign country, working in a foreign language. They were automatic best friends. We were also assigned buddies who were students at the University. I am so thankful to the Initiativkreis Ruhr for organizing housing and events as well as giving me an automatic group of friends and a

German buddy to give us advice and fun things to do.

#### The Internship

For my internship I worked in the corporate development group of Duisburger Hafen AG. That is the port of the city of Duisburg in Germany. This ended up being a fascinating experience for me. The port is the largest inland port in Europe (where two rivers meet) and a major player along the New Silk Road. Something like 70% of trains from China to Europe go through Duisport. This means that China's One Belt One Road Initiative has been hugely important to the companies business. I did a lot of work with the One Belt One Road initiative, China's plan to connect China to the west via trans Eurasian railroads, like doing research, making a background PowerPoint for investors, and attending meetings related to the topic. I found this fascinating. The international political implications of a project this large are innumerable. And, my work at Duisport has inspired me to do further research

and write a thesis on the topic. I also got to work on projects with renewable energy and Startport, a logistics startups accelerator program in Duisburg pioneered by Duisport.

#### The Travels

Of course one of the best parts of being in Europe for the summer is the ability to travel to such a variety of places with such amazing and different cultures. I am really thankful that the Ruhr Fellowship program was flexible (letting us have Friday afternoons our first month off) and encouraged us to travel. Not only did I get to see and do so much in the Ruhr region, but I also traveled to Bad Tölz, Barcelona, Brussels, Antwerp, Bruges, Amsterdam, and after the program ended to Stockholm and Copenhagen. Some of the trips I made on my own, and some of the trips were made with groups of other Ruhr fellows...and of course these trips were the most fun!

"Das Ruhrgebiet ist für mich progressiv"

## **Iden** Kalemaj



"I look forward to going back to the Ruhr Area"

i there! I'm Iden, a senior at Princeton University, studying Mathematics. I grew up in Albania and moved to the United States for college. In my first year at Princeton I studied German and spent the summer in Munich. I was very excited to go back to Germany this summer and experience work and everyday life in the country. What I enjoyed the most about the Ruhr region is the friendliness of the people living there. The organizers of the Ruhr Fellowship were always supportive and excited to show us the region. The people I interacted with were always ready to help me with my German. My coworkers were always offering to help me with any questions.

#### So many interesting cities

I really enjoyed living in an area where so many interesting cities are just a train ride away from each other, and you can always plan something interesting to do. A dance show at the Tanzhaus in Düsseldorf and a piano concert at the Essen Philharmonie were two of the highlights of this experience. I was also very impressed by the way the region had used education, cultural development and clean technologies to move away from a coal-mining past. The understanding of climate change and the determination of the people and companies to find forward-looking solutions to environmental concerns provide valuable lessons for the rest of the world.

I highly value my internship at KPMG, in the branch of Consulting. This was my first experience working in the field of Consulting and I was able to learn a lot from the various tasks and explanations that my mentors and colleagues assigned me. Everyone I met during my time at KPMG was extremely welcoming and open to share from their experience in the company. Thanks to this internship I can consider Consulting as a future career path, and know that I can rely on the connections I made during my time there to get started on this path.









#### Inspiring CEO talks

Moreover, during this internship I learned a lot about the way German people approach work-life balance, and how supportive KPMG was of such a balance for its employees. Companies like KPMG provide their employees with many benefits that make their life easier. Learning about these aspects of work life in Germany convinced me even more of my plan to work in Germany for some time in the future. I am grateful for the work that Initiativkreis and UA Ruhr put into exposing us to the various industries and research directions in the area. The CEO talks we attended were both inspiring and gave important insight into these industries. I was particularly impressed by our trip underground in the last operating coal mine in Germany. We could feel the sadness of the coal miners about the fact that the coal mine was going to close soon, although they were aware of its necessity. Their profession seemed strenuous beyond anything I have seen before, and their determination while working in such hard conditions was really inspiring.

Now that the fellowship is over, I try to keep in my heart all the people I got to know during those two months, especially the other fellows with whom I shared living spaces, home-cooked food and many travel adventures. I also try to remember all the impressive things I learned about the Ruhr and the places that I visited most often during my time there.



## **Cynthia** Lee



aving spent my previous summer in Aachen, I was excited about the chance to experience a new side of Germany, while reliving some of the highlights from last year. For this summer I was looking for a mixture of work experience at an established company and gaining more cultural understanding. The Ruhr Fellowship definitely met these expectations.

#### A variety of excursions

The first month started off with days filled with language classes and a variety of excursions. Through both the German lessons and the cultural immersion. I was able to leave Germany with a much better grasp of the language. Forcing myself to speak German wherever I went (instead of defaulting to the stereotypical American inability to speak anything but English) was challenging at first, but I definitely saw the benefits when my German improved.

The excursions covered a wide-range of topics and events, which allowed for a more holistic understanding of German culture and industry. Being able to speak with some of the CEOs of well-established companies was an once-ina-lifetime experience. These conversations gave me insight into not only how to conduct myself as I enter the workforce but also how I as well might one day run a company. Another great quality of the excursions was its focus on showing the fellows the Ruhr area's history and culture. Because it was the summer season, there were lots of arts

and music festivals to attend. From the Klavierfestival to OpenAir, I was able to enjoy everything from a relaxing, enriching piano concert to drinking beers and hanging out with friends.

The second month was much more focused on the internship. I was assigned to innogy, the renewable energy subsidiary of one of Germany's largest energy suppliers. There, I worked with my wonderful colleagues on the System Analyses Team in the Grid and Infrastructure department.

My main project was creating tools to analyze data from the CWE Flow-Based Market Coupling method. I was given the chance to hone my Python skills and learn how to use a new data visualization software Tableau. Additionally, my coworkers were so patient with helping me get better at

#### Essen is a unique area

My experience in the Ruhr area was enhanced by its location. First, Essen and its surroundings is a unique area





with a rich history. As the heart of German industry, the Ruhr area shows off its industrial history with a balanced blend of modern architecture and natural landscape. The area celebrates itself with many museums and art structures dedicated to its past. Visiting places like Zeche Zollverein helped me better understand the crucial role the area played to Germany's history. Furthermore, the Ruhr area is a pretty central for travelling and visiting other places in Central Europe. During the weekends, I was able to visit not only big cities such as Amsterdam and Berlin but also smaller German towns in NRW. It definitely is a great opportunity to take advantage of how close so many different places are. Furthermore, having the semester ticket made it so easy to travel to all the cool places that NRW has to offer. It was really refreshing to be able to so easily go to Düsseldorf after work to eat dinner with some friends.

"The Ruhrgebiet for me is a unique blend of industrial history and progressive thinking. The people there are motivated, welcoming, and one of a kind"

In the end, my experience in the Ruhr area definitely met the high expectations I had. I was able to learn more about the renewable energy industry, apply the skills I've learned in school, and meet people from all different backgrounds. I want to thank the Initiativkreis Ruhr and Universität Duisburg-Essen for putting this together and allowing such a unique, wonderful experience to happen. I will cherish the memories and the people I met through this program forever.



## **Kristina** Liu

hen I first visited Evonik, I sent photos to my dad of the sprawling campus in Essen. As a formulation chemist, he was familiar with their work with microencapsulation and excited that I was doing an internship there. I was very impressed with the apprenticeship program of Evonik. My time there was split between the Resource Efficiency and Active Ingredients Department. People were quite used to have trainees around in lab. I learned many techniques under the skillful supervision of experienced teachers. I had a project in the Resource Efficiency Department to develop low power emulsions. Emulsions usually are difficult to make, needing a powerful rotating blade that create small droplets. I used regular glass stirrers and

tested different surfactants. I also performed material testing on top coat systems such as flexibility and heat as well as its ability to hold pigments. I had on this suit with a source of oxygen and learned how to apply an even coat like a robot. In the Active Ingredients Department, I ran formazan assays on living cells and HPLC analysis to characterize surfactants. I also learned how to embed skin models in paraffin, cut 5 micron thick pieces and put them on glass slides, stain and treat them with different products and view the effects under the microscope. The most memorable part of my experience in the Active Ingredients Department was pig skin penetration, where we tested the emulsions. I shaved off the hair, cut off the fact, and used the largest hammer

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I've ever seen to make the skin into round pieces that could be put over capillary action tubes that included water, salts, and preservatives to keep the skin fresh. I also had a picture of my skin taken under UV light, where gladly I learned I didn't have much bacteria. One of the guys working on our floor was retiring, so we had a very nice lunch to celebrate his 47 years in the company. The amazing thing about German companies is the dedication to their workers. I met people who had various academic backgrounds and skills, but kept the same position at the same company. The name of the company changed (Evonik used to be Degussa) but the people stayed.

#### Visiting the gasometer Oberhausen

My first day in the program I visited the gasometer in Oberhausen where there was a stunning photography exhibit as well as a view of the water and greenery of Germany (I would later see plenty of the Rhein). Over the weekends I travelled to the local cities such as Bonn, Köln, Düsseldorf, Munster and Aachen. The art in the 21st century Museum in Düsseldorf was mind bending, but luckily there was a beautiful pond (the picture featuring me) to calm myself. During a walking tour in Köln I heard the various stories of the ingenuity of the cities inhabitants. For example, to promote sales of bones to pilgrims the story of St. Ursula and the 11 virgins became 11, 000. It was mind boggling that there was just a piece of wall from Roman times, just there, in a parking lot! I also learned about the Köln banana, a graffiti symbol of good art, saw the world's narrowest

house, and saw an official moon landing monument. I also saw the Grand Departure of Tour de France from Düsseldorf where we decided, was it really an event in Germany if it wasn't raining? The company visits the fellowship organized provided insight into many topics such as the ecological challenges of mining or the benefits of cooperation whether a small startup or an established firm to face global competition. Energy and sustainability were recurring themes, and I left the Ruhr area with greater appreciation of the differences between sources of renewable energy and understanding for why nuclear energy is no longer highly in demand. I particularly enjoyed the CEO talk with HOCHTIEF. He was so personable, and his hands were as impressively large as his personality. I felt inspired by his assertion that he might not have been the smartest person in the room but he damn well worked the hardest. He joked that when he moved to the Ruhr area, he thought his life was over. It was amazing to see the results of fifty years of investment from many companies and the government during the transition of ending coal production. This investment into the future is the energy of the Ruhr area and its people. This was an investment in myself as well. The humility of the German's I've met (without fail they always apologize for their near perfect English) made me rethink the way we oversell ourselves in the US, and how our shortcomings shouldn't be glossed over but worked towards overcoming. Confidence can be gained from actively learning new skills and simply understanding things better rather than just from being the best at something.







### "Das Ruhrgebiet ist für mich die Zuversicht"



## **Anand** Prabhu

The Ruhr Fellowship was an incredibly unique, challenging and fun experience, especially for the summer after my sophomore year. The opportunity to stay and work in Germany at such a young age was truly a life-changing experience that I am grateful to have received. My first month in the Ruhr area was immersive, yet comfortable, as I was able to explore a less-travelled area of Germany and its industrial sector, while still accompanied by 16 other American college students like myself. The Ruhr Area is great in that it truly embodies the culture of Germany. The people there work very hard, which is why the industry is so strong, but still are very kind and focus on enjoying themselves outside of work by spending time with loved ones and friends and traveling when they can.

#### **Explore german education system**

The German classes, while informative, were fun and gave us the opportunity to explore the German education system through the Universitat Duisburg-Essen. During this time, we also visited world-changing, billion-dollar companies, and heard directly from their CEOs about German culture, economy, and technology, an extremely rare and eye-opening opportunity. Interspersed within these first four weeks, I took advantage of our position in the heart of Europe and



travelled to different countries over the weekends. My highlights included biking around the channel-filled streets of Amsterdam, climbing to the highest point of the Alps in Geneva, and exploring the exciting nightlife of Prague and Berlin. Of course, I visited almost all the big German cities, and tried the beer from each one (Munich's was my favorite).

#### Captivated by the company

The internship portion of the program was no less exciting. I interned at Vaillant Group, a global market and technology leader in the fields of heating, ventilation and air-conditioning technology, in the Research and Development team. Before my internship had even started, the Ruhr Fellows









visited Vaillant Group in our second week in Germany for a talk with the CEO, Carsten Voigtländer, and I was immediately captivated by the company and its mission. In keeping with the German ideals of technological and environment-friendly development, Vaillant Group is at the cutting edge of world-changing solutions in the field of heating.

#### Learned a lot from my mentors

I got to experience these ideals first-hand through my internship, where I aided in the model-based design of controls. This approach virtualizes the entire heating system and its controls, so that tests and adjustments to the technology can be carried out completely handsoff and online. Not only does

this save precious time and resources for the company in terms of development, but also helps to interface with the "Internet of Things" by allowing a heater or AC unit to adjust its functionality based on signals transmitted via internet. My specific roles within the team included designing these virtual control systems in the Matlab and Simulink environments, and writing tools to help process signals from tests on heating units. My team was very welcoming to me and helped me get up to speed on heating and controls so that I could make an impact in my work. I learned an incredible amount from my mentors at Vaillant Group, and I am confident that I can take many of these skills with me to future courses and work experiences.

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## Shilpa Saravanan

nen I got my internship assignment to RAG AG (sans any information on what I would be doing for the duration of my time there), all my friends joked that I was going to be a coal miner - and when I was told to report to the Trainingsbergwerk in Recklinghausen for my introduction to the company, I had the fleeting thought that maybe they were right after all. But they were wrong: though I did get to try out a few old mining machines (with supervision), the bulk of that day was spent meeting the very kind, helpful people who would make my internship with RAG a formative experience.

#### Forefront of green industry

Before I arrived in Essen, I knew the Ruhrgebiet was known for industry, and I found it interesting for that reason (even though a German friend told me that the area's industrial past "made it ugly," and I believed him at the time). What I definitely didn't realize is how much so many parts of the Ruhrgebiet are still changing at this very moment – not only (looking backward) with the closing of the coal mines and the restructuring of old mining areas, but also (looking forward) with the area's new, intense focus on sustainability. My time at RAG (which I'll talk much more about) taught



me an immense amount about the social and environmental considerations involved in the closing of the mines, and our visit to Vaillant showed me how the Ruhr is also at the forefront of "green" industry. And of course - the view from the top of the Zollverein (trees for miles and miles, in every direction) shows that Essen very much deserves its status as Grüne Hauptstadt Europas.

At RAG, my task was to compile an English-language press kit (intended for foreign journalists) from the information I gleaned by reading some of RAG's internal, German-language publications. Even after the program's German course, I wasn't terribly good at German when I got to RAG for my







internship, but I found my German improving dramatically as I read text after text full of German mining jargon to prepare background information for the press kit. It was an incredibly valuable experience: I learned about and wrote about everything from the absolutely central place of coal mining in the region's culture (commemorative statues of miners abounded, everywhere we went), to the unique power that workers in the German mining industry have, to the nitty-gritty details of the various environmental problems caused by coal mining, and the long-term steps that RAG is taking to fix these problems. I found the internship particularly interesting because of the unique place that RAG is in as a company; the last operating coal mine will shut down at the end of 2018, as government subsidies for the industry are ending, so RAG has shifted its focus from mining to "taking responsibility." It's a noble goal, I think.

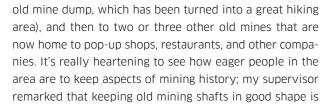
#### Structural change in progress

Additionally, during my internship, I had the opportunity to view structural change in progress in the Ruhr Area when my wonderful supervisor spent a day taking me around to various former mining sites in the region. It's a tour of the Ruhr Area I don't think many visitors get, but it's a great one: we started with a long walk around the old coking plant at Zollverein in Essen ("the most beautiful coal mine in the world"), then to the Tetrahedron in Bottrop (it's on top of an





"The Ruhr Area for me is beautiful"



expensive, but "every town wants its own shaft" because of the pride people take in the industry.

#### Zollverein is awe-inspiring

After seeing how beloved all these sites are, and how so many of them (particularly the mine dumps) have been





made beautiful or useful, while preserving their connection to coal mining, I began to see the Ruhr Area as beautiful in its own way, and not at all "ugly" like the aforementioned friend said it was. Of course, the city centers of Essen or Duisburg aren't very "pretty" compared to the centers of cities in the Rhineland, for instance, but Zollverein (for

instance) is awe-inspiring, and the hike up to the Tetrahedron (and the amazing view from it) was exactly what I needed on a cool, sunny day. To me, these structures are all the more fascinating because of their "ugly" industrial

## **Sumesh** Sharma

ello! I'm Sumesh, and at the time of writing this, I am a senior at UC Berkeley studying chemical engineering. Prior to this summer, I had only been out of the country to visit family in India and I had never been to Europe before. I didn't know what to expect coming to Germany and the Ruhr area in particular, and my experience did not disappoint in the slightest. Fast forward a few days after coming off the plane and I'm in a miner's suit that is way too large for me, clutching my pants to my stomach as we ride through one of Germany's oldest coal mines. Throughout the next month, I found myself completely immersed in the cultural history of the region as well as the history and politics of Germany itself. This was a carefully curated, well-designed experience that would have never been available to me had I visited as a tourist or even as a student studying abroad.

#### German classes helped a lot

June started out with excursions to different companies, cultural areas around the Ruhr, and German language classes. I spoke absolutely no German before coming here and the German classes helped quite a bit. One of the litmus tests to see how well our German had gotten was for me

to see if I could order a döner using only German and not pointing or using my fingers to indicate how many I wanted. By the end of the month, I had gotten the basics down and I could stumble my way through ordering coffee or asking for directions. The excursions themselves were fascinating insights into the history of the Ruhr. In particular, I enjoyed Landtag, where I learned a lot about the German parliamentary system (and how much more sense it makes compared to ours, quite honestly). Another highlight was our visit to the BVB Dortmund stadium. We got to go on the field and in the player's locker rooms, something that I didn't expect that I would do when I first landed in Germany. As far as companies go, I was very impressed with all





the companies we visited as they were all doing something relatively unique and innovative within their fields. In particular, I enjoyed the Vaillant and the RWE visits, as a lot of their products involved chemical engineering design principles, so it was cool to see all the theory I had learned in my major come into practice.

#### A diverse bunch of RuhrFellows

The main highlight to me, however, was all the fellows. Everyone clicked from day 1 and we immediately began planning trips to other parts of Germany/Europe during the weekends. We were a diverse bunch, with people coming

from all different backgrounds that had a unique perspective I was willing to listen to. Whether it was quick runs to the trusty 1-euro-falafel place around the corner, voyages to Goethebunker, or simply wandering down the hallway into each other's rooms, there was a great sense of camaraderie developed during these short two months.

The program also left a good portion of time to travel! All the fellows went to different places for a majority of the weekends. We had people go to Britain, Switzerland, France, etc. I used my time to go to Prague, Vienna, Barcelona, Amsterdam, Brussels, and then spent the rest of the

# "The Ruhr area is a rich cultural center"

weekends exploring the smaller towns in the North Rhine-Westphalia region. I was glad the program gave us time to do that because I learned a lot about the history of these European cities as well as trying out all the unique cuisine options. It seemed like every place had a unique food to offer and best you believe I took full advantage of this. I was also impressed by how easy and cheap it is to get around Europe and into other countries!

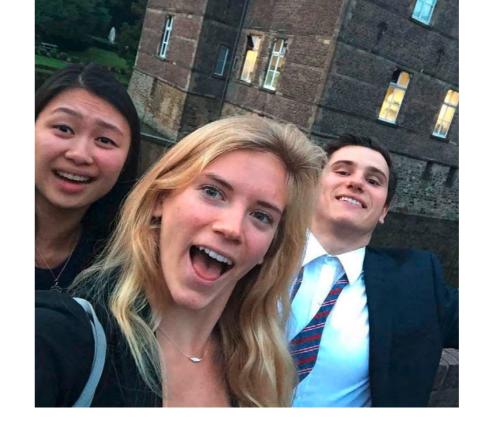
#### Innovative and energetic companies

To me, the Ruhr area was a rich cultural center, an area that is filled with innovative and energetic companies and genuine, grounded folks. My internship at Evonik reflected that, as I was immediately given meaningful work and a project that would occupy the rest of my time with the company. Evonik did a great job in making sure that I could both make contributions and learn from the company during my experience, and I went home with increased knowledge on certain chemical engineering concepts and coding languages that I never expected. It was nice to gain experience working in a corporate chemical engineering environment and I learned a lot from my managers and colleagues. Overall, it was an excellent summer. I wish to thank the Initiativkreis Ruhr, Evonik, and the program coordinators in making this possible!



## **Andrew** Soldini





"The Ruhrgebiet means to me a place where true German culture is being reinvented as a unique modern phenomenon"

ne Ruhr fellowship came down to being truly about the people. It meant different things to each fellow. Some were filling in time before starting careers, while others were much earlier in their quests of life. still unsure of the paths they want to meander down. For each fellow, however, this program was an opportunity to step out of the United States to discover things about both themselves and the European continent. My summer was one of unimagined personal growth. Being so far from home forced me to be so much more independent than ever before. That being said, the program was also there to give advice at a moment's notice. The buddy system

allowed us to have a friendly face to get situated in our new environments. It also let us get a bit closer to other students of our own age. We got more genuine cultural exposure in this way.

#### A forward thinking area

Although I spoke no German entering the program, and speak little still after it, the conversations were very enlightening. Speaking with someone with some language barrier is in and of itself a serious exercise in communication. The content of the conversation, however, is always fascination because it is with someone outside the small bubbles of

reality that we experience at our respective home universities. It is diversity of thought and experiences that leads to both parties learning quite a bit. Being in the United States, there is a tendency to not consider other places as being real and with their own troubles. Countries such as Germany are often seen in the international perspective as being very forward thinking and thus a categorically better place than the US. Learning and understanding the worries and guestions that people have about the directions of society helped me to see a fuller picture on many modern troubles. With all of our summer fun in Germany, we also did have wonderful internship experiences that can help us

with pursuing our future goals. In my internship at HOCH-TIEF, I got tremendous exposure to the world of large infrastructure projects. HOCHTIEF as both constructor and investor does multibillion dollar projects that are funded through Project Finance, as was also the name of the eponymous team that I interned with. I learned the fundamentals of what the really was, why it is used, and how much HOCHTIEF and its partners go through to functionally hash out the financing details. Everyone at the office was great. We'd always get lunch together where I got to know them personally as well as professionally. Although the situation was great, and I learned a ton, I did regret not being able

to contribute to much. The department itself was very specialized and for that reason infrequently even staffs junior people. Regardless, it was excellent exposure.

#### Backbone of industrial age

Other highlights of the program itself were the much joked about coal mine visits. The open-cast mine was a feat of development to behold. The underground mine was frighteningly efficient industrial process. Facilities like these are the backbone of the industrial age that we live in vet are hardly seen by the general population. It is a glimpse into the logistical systems that keep the lights on and how that is changing. I have, through these visits perhaps, rekindled some interest in furthering my engineering background to be more engaged with cool technological systems.

#### A place we called home

Overall the Ruhr Fellowship ended up being mostly about the people I spent so much time with. It was about experiencing things especially with my fellow fellows. Whether traveling to all the nearby countries, or just around the Ruhrgebiet, we had a blast together. Just in the first week we managed to find Gasometer Oberhausen, with its awesome art exhibition. We then got to really taste the rich culture through all of the local music festivals and such. The Ruhr area was a place that we called home as we travelled elsewhere as well. Whenever returning from a trip it would be a breath of fresh air to finally get off the train back in Essen. It felt like home every time. Perhaps someday I'll have to come back for a visit to all the things that were so near.





came into the summer not knowing what to expect. Having recently graduated, I was looking forward to a summer of I traveling adventures. However, I came out of the summer with many lifelong friends, and a newfound love of Germany.

#### Traveling and Excursions

The program offered us a wide range of opportunities to learn about the industries of the region, and to travel all around Europe. My favorite excursions were the trip to Vaillant Headquarters and the tour of RWE's brown coal mine. As a chemical engineer, I was in awe of the different technologies that they developed. Standing in front of a full-sized cooling tower, I felt like a child seeing Disney come to life.

## **Cynthia** Tong

While a student, very seldom do you have the opportunity to see furnaces, cooling towers, or distillation columns in person. Even in established fields such as mining and household heating, these companies managed to find ways to innovate. Learning about RWE's carbon dioxide recycling technologies and Vaillant's heat pumping technology, reminded me why I wanted to be an engineer in the first place. An additional benefit of being in the Ruhr region is its close proximity to so many places in Europe. Over the weekends, other fellows an I turned into tireless tourists and traveled wherever we could. During the two months, I visited Amsterdam, Vienna, Prague, Munster, Koln, Düsseldorf, München, Berlin, and Heidelberg. When I wasn't travelling, I explored the bike trails, checked out local festivals, and. of course, went to the Biergartens.

#### Internship at EMSCHERGENOSSENSCHAFT

I spent my internship working for EMSCHERGENOSSEN-SCHAFT, a public waterboard responsible for managing the Emscher river and its flood plains. The state of the Emscher river was a relic of the period of mining activities in the Ruhr area. Due to mining-induced subsidence sub catchment could not been drained by underground sewer systems. The river itself became a wastewater canal, where manufacturing companies could dump their liquid wastes. EMSCHERGENOSSENSCHAFT was formed for water management in the whole river basin and with the mission



to restore these rivers so that they could be re-inhabited by the community and its native creatures.

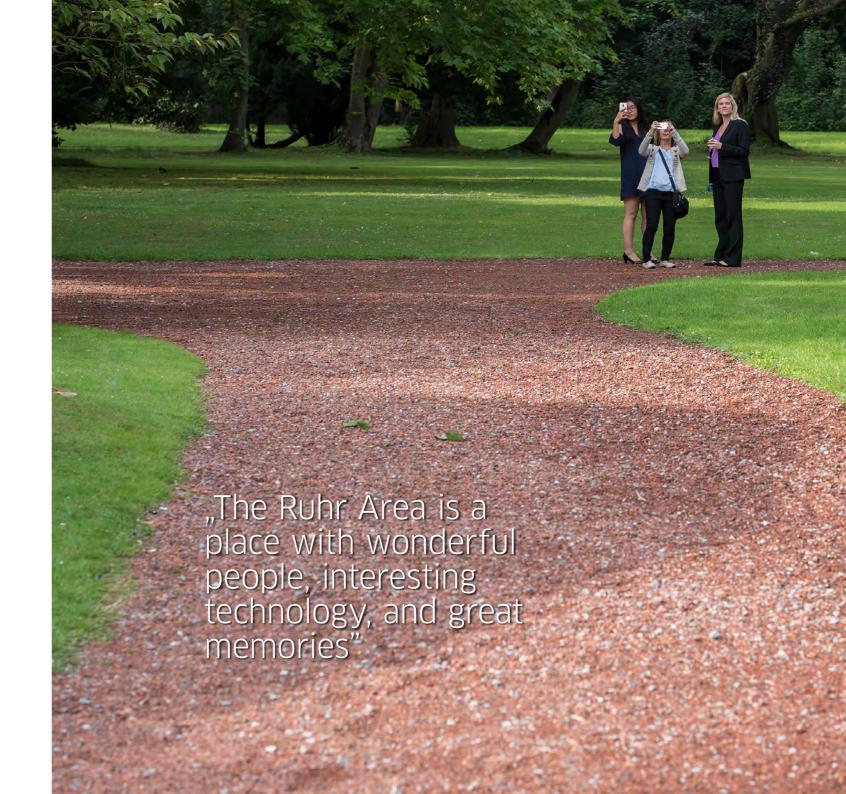
In the backdrop of heated climate change discussions, it was eye opening to learn what environmental stewardship was all about. As someone who considered herself only somewhat environmentally conscious, I was amazed by how creative and innovative environmental solutions could be. My projects included brainstorming strategies for their education program for pharmaceutical waste disposal ("Essen Macht's Klar") and researching the environmental/health impacts of antibiotics in water. For those who are unfamiliar with the subject, pharmaceuticals can be extremely diverse in structure, making it a challenge to remove in wastewater treatment systems. Even trace amounts of pharmaceuticals in the water can affect the ecosystem. This leads to headlines such as androgenous fish or multi-antibiotic resistant strains of bacteria. Depending on the community, it is recommended that unused pills are disposed either in household trash and incinerated, or dropped off at local collection points. The city of Essen has a deal with the disposal companies, which can take care of pharmaceutical wastes safely. The goal of "Essen Macht's Klar" is to educate Essen residents to dispose unwanted medications in the household trash instead of flushing them down the drain.

#### New Friends

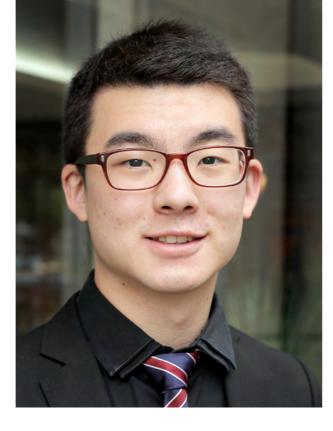
Nevertheless, what I will remember the most about my time in Germany is definitely the friends that I encountered along the way. The stereotype that Germans are reserved and distant was completely untrue as far as I experienced. The people I met were by far some of the most enthusiastic and welcoming people I have ever met. Whether it was my program-assigned buddy, or my coworkers, or even people around Germany, I was surrounded by so much kindness and generosity. Once I arrived in Essen, my program buddy Mona (who turned out to be my doppelgänger) picked me up from the Hauptbahnhof and walked me to the apartment. Knowing that it was Sunday and grocery stores would be closed, she brought me a basket of food for survival. Throughout the summer, Mona even introduced me to her favorite cafés, towns, and bike trails. My coworkers at EMSCHERGENOSSENSCHAFT made me feel at home by taking me to coffee, teaching me German, and inviting me to happy hour. One coworker offered to be my tour guide for a day trip in Munster; another invited me to a house gathering to make sushi.

#### Looking back...

I am so glad that I stumbled upon the application to the Ruhr fellowship. I would like to thank the Initiativkreis Ruhr, and UA Ruhr for making this opportunity possible. There are so many hidden gems in Germany that I did not have the chance to explore, so I know that I will be back to the Ruhr area in the near future. Thus, I suppose the only appropriate thing to say is, "Auf Wiedersehen!"



## **Quinn** Wu



ften my peers who have studied abroad rave about their experiences living and traveling throughout Europe, however I knew that I wanted to work abroad to get the full experience after spending the previous summer working in China. The Ruhr Fellowship seemed like the perfect opportunity for me to spend my summer learning German, working for a German company, and most of all immersing myself with German culture. This was really a once in a lifetime experience to be in Germany for the first time during my college years, where I got to explore the Ruhr Area - the industrial belt of Germany that I was not aware of beforehand.

#### Learn more about chatbots

As part of the program, I was paired to intern for innogy, the leading renewable energy firm originally under Germany's energy incumbent, where I was part of the B2C innovation team developing a fully functional energy supplier ten times cheaper than current models by automating customer service. Though a brief stay, I learned a great deal about the differences between Germany's energy provider market, the value of work-life balance, and focus on sustainability and digitalization compared to the US. Of course, I had a chance to hone my technical skills in data science as well as learn more about new technologies in

artificial intelligence and chatbots. Best of all, I was able to meet many new colleagues who were also passionate about revolutionizing the oft-overlooked energy industry to make the vision of a renewable energy economy a reality, and even had the chance to spend time outside work with them!

Besides the internship, the fellowship catered to my love for learning new languages through taking German courses along with the 16 other fellows - though we soon realized that our broken German just led to natives responding back in English. Going on company visits, most notably going deep underground into the coal mine and seeing the vast Garzweiler surface mine, really sparked my curiosity and allowed me to see the shift of industry from a coal and steel hub towards a priority for going green particularly through the assurance during our several CEO talks and the visit to the state parliament. I'm truly amazed by the people of the Ruhr Area - the enthusiasm and shared vision for cleaner sustainable and affordable future - and was surprised by how even the students there had dreams of working in the clean energy space.

#### Accessible public transportation system

Looking back, I'm glad I chose the Ruhr Fellowship as it gave me the experience I had desired in Germany. There were many things I loved about Germany - the public transportation system was so convenient and accessible as well as hated, mainly the struggle of getting used to not having complimentary water at restaurants. Like anyone who goes to Deutschland should, I was able to indulge in the protein-heavy German diet, sample the local beers in every city (America is truly lacking in this department!), and even catch a heated rival football match (not soccer. come on America!) between Bochum and Dortmund! Lalso

attempted to make the most of my weekends traveling all over Germany (Berlin, Hamburg, München, Nürnberg, Heidelberg, Köln, Düsseldorf, Stuttgart, just to name a few...) in addition to heading out to nearby Prague and Amsterdam with the other fellows. Germany is truly a beautiful and diverse country from the amazing landscapes to bustling cities to charming architecture to superb automobiles.

My summer in the Ruhr Area really brought me back to my high school days when my passion for climate change and the environment started, and the experience has been a motivation for me to pursue my interests in clean energy



and envision a future of a fully renewable powered society. Germany is already quite an impressive country, but its down-to-earth and creative people, particularly from the Ruhr Area, are even better with their dedication to the Energiewende. I hope to in the future to find collaboration opportunities with Germany to bring this energy vision back to the US and the rest of the world. It's been a truly memorable and inspirational experience to be a Ruhr Fellow, and I'll definitely be back in Germany and the Ruhr Area in no time!



"The Ruhr Area is the industrial belt of Germany"







## Kevin Yoon

ntil the Ruhr Fellowship, I never really considered studying abroad. New places, new culture, new languages - all sounds exciting, but being all by myself in a foreign country with language and culture so different from mine seems quite daunting. But again, when else would I be able to be a student in a foreign country other than when I'm in college? When else would I be able to take advantage of my identity as a "student" to learn, make friends, make mistakes, and experience fundamental differences first-hand?

With such questions in mind, I stumbled across the Ruhr Fellowship. Having a chance to talk about this program with past students from my school as well as my advisor, I felt confident that this was a once-in-a-lifetime opportunity before

my junior year and convinced myself that the timing must be now. And even though there were highs and lows, looking back at my stay in Germany for two months only brings back fond memories and incredible learning experiences.

#### See many different industries

The languages classes during the first month took me a while to get adjusted to, but the professor was very patient and kind about our mistakes, correcting our grammar and pronunciation for hours as we struggled to take our first baby steps. In addition to these classes, the CEO talks and company visits also contributed heavily to our first month schedule, and I had a chance to meet so many different leaders in so many different industries, ranging from architecture to



"The Ruhr Area is a place of lasting friendships, incredible learning opportunities, wonderful cuisines, and unforgettable experiences" renewable energy and in-home appliances. We traveled every week to factories, offices, power plants, and even coal mines, and despite early morning bus rides or rigorous schedules, I had the opportunity to see what others might never be able to imagine. My favorite memory from one of these trips is going 1200 meters underground to the last coal mine in Germany to see the engineering and processes to collect coal – when will I ever be able to see that again?

#### Traveling on the weekends

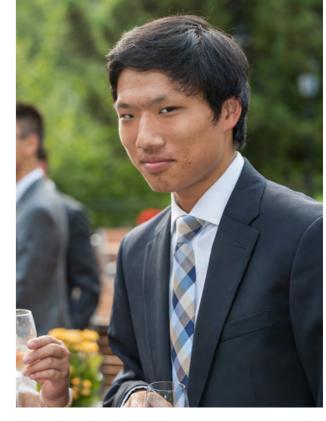
Of course, staying in Europe meant traveling on the weekends to experience something new. Although I didn't travel as much as some of the fellows, I had a chance to visit Hamburg, Berlin, and Sayn to see how different parts of Germany developed their own customs and cultures. Trying different types of food and drinks added to the fun of exploring new cities. Interacting with different travelers along the way opened my eyes to different locations to see and activities to experience as I toured some of the historic landmarks of Germany. I also had a chance to take a day trip to Amsterdam, and I would definitely recommend you doing so if you ever get a chance to travel.

If the first month of the program focused on breadth, the internship in the second month focused on depth. I had the chance to work for innogy, an energy company that focuses on innovation to transform the energy market in Germany and drives the country's transition to sustainable energy production, and with an extremely supportive and encouraging mentor, I contributed to the newest project that the innogy Digital Hub was working on: Share & Charge.

Share & Charge seeks to provide a platform for electric vehicle owners and charging station operators using Ethereum blockchain technology. As a software engineering intern, I focused on backend development with smart contracts and assisted the project's transition to cloud infrastructure. With a talented team of engineers from both innogy and Thoughtworks, I learned so much about the new technologies that cannot be taught anywhere else.

#### Getting a chance to become friends

But the core of this program is not the language classes, company visits, opportunities to meet and speak to executives, or the internship opportunity. It isn't so much about the new environment and new culture at the end. After spending eight weeks in a foreign country, the other fellows (and program directors) become the highlight of the program. The conversations I made with other fellows during bus rides and weekend travels remain as my most cherished memories – getting a chance to become friends with individuals from different backgrounds, colleges, and even majors is quite exciting.



No, my memory of Germany isn't full of only the brightest moments or successes. Yes, I have missed train and bus rides, woke up late to class or company visits, got lost in different cities, and had regrettable nights. Figuring out how to cook different meals so there won't be pasta on my table every night or realizing that I am a terrible cook with too much potential all contribute to my long two months in Germany. But indeed, this was a once-in-a-lifetime opportunity for me and I'm so glad I took it. It wasn't easy, but it was well worth it, and I can recommend this to anyone who wants to break out of one's comfort zone, grow both personally and professionally, and definitely, have a story they can brag to their friends about all year long. Oh, and your cooking skills will improve, too.

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## Frank Zhou



hat a truly amazing summer experience the Ruhr Fellowship was! Two months of cultural, academic and professional immersion went by in a flash. It didn't feel like there was enough time to truly experience the region, interact with the locals, and spend time with the other Ruhr Fellows. At the end of it all, however, I grew as a person more than I could have guessed I would in such a short span of time. If only the summer lasted longer!

There were 17 Ruhr Fellows altogether, and we were all placed in the newest student dorm at the University of Duisburg-Essen campus. It was a wonderful experience to

spend so much time with people from all sorts of walks of life. In the month of June, we went on a variety of exciting excursions to various points of interest in the Ruhr area. One of the most memorial experiences was visiting the Bergwerk Prosper-Haniel, the last operational coal mine in the Ruhrgebiet, where we went more than 1km down into the earth and were given a guided tour of the actual tunnels that miners use every day. In addition, we attended a variety of CEO talks hosted by companies such as Vaillant, HOCHTIEF and NATIONAL-BANK, where we were able to learn from business leaders in the region. Other activities included tours of local universities, football stadiums and power stations. After going on so many trips with the other

"The Ruhr Area is a unique area of Germany"

Ruhr Fellows, we all became very close friends and would often spend many evenings in the dorms drinking or cooking food together.

#### Various speaking exercises

Our cultural immersion program did not just consist of visits to local attractions, but also consisted of a language course to help us converse in a foreign land. There were two different class levels, and my teacher in the more advanced level was really wonderful! Our classroom time was well utilized with various speaking exercises and fun group activities to improve our confidence in using German in daily life. As someone who has learnt German for multiple











years, I found it helpful to continue practicing the language through a formal class setting during the summer. Furthermore, I was lucky to be paired with a German roommate in my dorm room named Sebastian, and I tried to use German as much as possible when talking with him, so as to make the most of being in Germany with real German speakers!

#### Really enriching internship

My internship in the month of July was a really enriching and life-changing experience. I worked as a business analyst intern for Brenntag, the world's leading chemical distribution company. My project was to investigate the

company's sales of flame retardants, perform an analysis of the European market and competitive landscape, and create a report with suggestions to improve future growth. My supervisors, who were from several European marketing departments, were all very invested in my work and were always very helpful and supportive when I had questions. I felt like I was given a great sense of responsibility with my project, which I really enjoyed. The company culture was also really friendly and open. In particular, I had a desk at the "Flex-Office", where a lot of temporary workers would come in and out, and so I became close with many of my colleagues in just the span of one month. I learnt a

great deal during this month at Brenntag, particularly as it was my first time doing work in a corporate setting, and I am so grateful for everyone at the office for welcoming me with open arms!

#### An amazing experience

Finally, being in Germany for two months facilitated a large amount of travelling! One particularly memorable trip was with Jeah and Sumesh to Vienna and Prague. We had a four-day weekend and so we took a couple of Flixbusses and had a wonderful few days exploring those cities! I also managed to attend a couple Christopher Street Day

celebrations during my time in Germany. A large group of us Ruhr Fellows went down to Cologne in early July. I also went to Berlin at the end of July to visit a few other American friends who were travelling Europe at the time.

In conclusion, the Ruhr Fellowship was an amazing experience for me. I learnt a tremendous amount about such a unique area of Germany, gained valuable experience working for a global company, and also made a bunch of wonderful friends – both American and German! Many thanks to the Initiativkreis Ruhr, my colleagues at Brenntag, and everyone else who made my summer such an enjoyable one!

# Phase 2 Praktika und Partnerunternehmen

Wir danken ganz herzlich allen Unternehmen, die sich für das Programm engagiert und Praktikumsplätze zur Verfügung gestellt haben.

Vier Wochen lang haben sie den Studierenden die Unternehmenslandschaft im Ruhrgebiet nähergebracht, ihnen zahlreiche spannende Einblicke und Gespräche ermöglicht und damit zu einer Verbesserung des Images der Region über deren Grenzen hinaus beigetragen.

Des Weiteren danken wir allen anderen Beteiligten, die das Programm mit viel Herzblut unterstützt haben. Dies gilt im Besonderen auch für die Kolleginnen und Kollegen der UA Ruhr, die für die Realisierung des akademischen Teils verantwortlich waren.





#### Brenntag

Brenntag, der Weltmarktführer in der Chemiedistribution, ist mit seinem umfangreichen Produkt- und Serviceportfolio in allen bedeutenden Märkten der Welt vertreten. Vom Hauptsitz in Mülheim an der Ruhr aus betreibt Brenntag ein weltweites Netzwerk mit mehr als 530 Standorten in 74 Ländern. 2015 erzielte das Unternehmen mit mehr als 14.000 Mitarbeitern weltweit einen Umsatz von 10,3 Mrd. Euro (11,5 Mrd. US-Dollar).

Brenntag ist das Bindeglied zwischen Chemieproduzenten und der weiterverarbeitenden Industrie. Das Unternehmen unterstützt seine Kunden und Lieferanten mit maßgeschneiderten Distributionslösungen für Industrie- und Spezialchemikalien. Mit über 10.000 verschiedenen Produkten und einer Lieferantenbasis von Weltrang bietet Brenntag seinen etwa 180.000 Kunden Lösungen aus einer Hand. Dazu gehören spezifische Anwendungstechniken, ein umfassender technischer Service und Mehrwertleistungen wie Just-in-time-Lieferung, Mischungen & Formulierungen, Neuverpackung, Bestandsverwaltung und Abwicklung der Gebinderückgabe. Langjährige Erfahrung und die lokale Stärke in den einzelnen Ländern zeichnen den Weltmarktführer in der Chemiedistribution aus.

#### Die Contilia Gruppe Für das Wichtige. Im Leben.

Im mittleren Ruhrgebiet sorgen wir uns um die Menschen und ihre Gesundheit. Auch bei Krankheit sowie bei Hilfsund Pflegebedürftigkeit begleiten und unterstützen wir die Menschen.

Zur Contilia Gruppe und ihren Einrichtungen gehören über 5200 Frauen und Männer. Als Mitarbeiterinnen und Mitarbeiter sind sie für andere Menschen da - in sechs Krankenhäusern in Essen, Mülheim und Hattingen, in Therapie- und Reha-Einrichtungen in Essen, in zwölf Senioreneinrichtungen zwischen Mülheim und Schwelm und auch bei den Menschen zu Hause.





#### Duisburger Hafen duisport – führende Logistikdrehscheibe in Zentraleuropa

Die Duisburger Hafen AG (duisport) ist die Eigentums- und Managementgesellschaft des Duisburger Hafens, des weltweit größten Binnenhafens. Mit einem Gesamtumschlag von über 133 Mio. t und 3,7 Mio. TEU (2016) hat sich der Duisburger Hafen zur führenden Logistikdrehscheibe für den Güterumschlag in Zentraleuropa entwickelt. Als trimodale Drehscheibe kombiniert duisport optimal seine vorteilhafte geografische Lage, gute Standortbedingungen und umfassendes logistisches Know-how.

Mit seinem Netzwerk von Logistikdienstleistungen bietet der Hafen den am Standort agierenden Unternehmen beste Voraussetzungen für den Güterumschlag. Acht multimodale Containerterminals, mehr als 400 wöchentliche Zugverbindungen zu über 80 direkten Zielen in Europa und Asien sowie umfangreiche Warehouse- und Lagerkapazitäten werden vor Ort mit markt- und kundenorientierten Dienstleistungen verknüpft. Mit diesem Full-Service-Ansatz deckt die duisport-Gruppe ein breites Leistungsspektrum ab. Das Angebot beinhaltet, neben dem Warenumschlag (u. a. Handelsware in Containern, Importkohle, Eisen/Stahl, Mineralöl/Chemie). Ansiedlungsmanagement, die Entwicklung von integrierten Hafen- und Logistikkonzepten, intermodale Transportdienstleistungen sowie spezialisierte Industriegüterverpackungen. duisport entwickelt zusammen mit Partnern transkontinentale Zugverbindungen bspw. entlang der neuen Handelsroute Neue Seidenstraße zwischen Duisburg und China. So verkehren heute bereits rund 20 Züge

wöchentlich zwischen dem Duisburger Hafen und verschiedenen Zielen wie Chengdu, Wuhan oder Chongqing. Die Beratungsexpertise der Duisburger Hafen AG wird auch international geschätzt, aktuell z.B. unterstützt duisport gemeinsam mit dem führenden türkischen Logistikunternehmen Arkas Holding bei der gemeinsamen Entwicklung von multimodalen Logistikflächen sowie den Aufbau intermodaler Dienstleistungen in der Türkei. Im Bereich Verpackungslogistik werden weltweit logistische Dienstleistungen für den Maschinen- und Anlagenbau erbracht – u. a. auch mit eigenen Standorten in Belgien, den Niederlanden, Frankreich, China oder Indien.

Damit ist die duisport-Gruppe die Verbindungsachse zwischen Produzenten und Kunden, vernetzt internationale Märkte und ist Treiber für regionale sowie weltweite Warenströme. Das Unternehmen versteht sich als Partner der Logistikwirtschaft und leistet entscheidende Beiträge zur Optimierung von Transportketten. Dafür werden auf die unterschiedlichsten Kundenwünsche zugeschnittene Konzepte und Lösungen entwickelt und realisiert. Von diesem Full-Service-Ansatz profitieren insbesondere die rund 300 logistikorientierten Unternehmen, die im Duisburger Hafen ansässig sind und eine Wertschöpfung von rund 3 Mrd. Euro pro Jahr generieren. Insgesamt hängen vom Duisburger Hafen über 45.300 Arbeitsplätze ab -Tendenz steigend.

#### EMSCHERGENOSSENSCHAFT und LIPPEVERBAND

Seit vielen Jahrzehnten sind EMSCHERGENOSSENSCHAFT und LIPPEVERBAND im größten Ballungsgebiet Europas aktiv. Ihr gesetzlicher Auftrag ist es, ohne wirtschaftliches Eigeninteresse für die Daseinsvorsorge aller Bürger und zum Nutzen unserer Mitglieder zu arbeiten. Beide Unternehmen arbeiten für das Wiedererstehen lebendiger, artenreicher Flusslandschaften und geben Impulse für Stadtentwicklung und Strukturwandel.

Die EMSCHERGENOSSENSCHAFT wurde im Dezember 1899 als erster deutscher Wasserwirtschaftsverband gegründet. Zusammen mit dem 1926 gegründeten LIPPEVERBAND arbeiten beide Verbände seit mehr als 85 Jahren unter dem Dach einer einheitlichen Organisationsstruktur. Zusammen sind sie der größte Abwasserentsorger und Betreiber von Kläranlagen in Deutschland.

EMSCHERGENOSSENSCHAFT und LIPPEVERBAND übernehmen im größten Ballungsgebiet Europas zwischen Dortmund und Duisburg und der nördlich angrenzenden Lipperegion vielfältige Aufgaben: Abwasserreinigung, Pflege und Unterhaltung von Gewässern, naturnahe Umgestaltung offener Abwasserkanäle, Schutz vor Hochwasser, Regelung des Wasserabflusses und Bewirtschaftung von Grund- und Regenwasser. Die EMSCHERGENOSSENSCHAFT betreibt hier vier Groß-Kläranlagen sowie 128 Pumpwerke und betreut rund 340 Kilometer Gewässerläufe, davon über 310 Kilometer als geschlossene Abwasserkanäle.

Der LIPPEVERBAND betreibt rund um die Lippe 50 Kläranlagen, 148 Pumpwerke und betreut knapp 400 Kilometer Wasserläufe sowie 127 Kilometer geschlossene Abwasserkanäle.







innogy

#### **Evonik Industries AG**

Evonik ist eines der weltweit führenden Unternehmen der Spezialchemie. Wir produzieren weder Autoreifen noch Matratzen, keine Tabletten und keine Tiernahrung. Und doch steckt in diesen Endprodukten Evonik – so wie in 4.000 weiteren auch. Oft sind es kleine Mengen, die wir beisteuern, aber genau die machen den Unterschied. Denn mit Evonik werden Reifen zu Spritsparern, Matratzen elastischer, Tabletten wirksamer und Tierernährung gesünder. Das ist Spezialchemie. Und da gehören wir weltweit zu den Besten.

Evonik steht für attraktive Geschäfte und Innovationskraft. Wir arbeiten in einer ergebnisorientierten Unternehmenskultur, ausgerichtet auf profitables Wachstum und die Steigerung des Unternehmenswertes. In über 100 Ländern profitieren wir von Kundennähe und führenden Marktpositionen. Rund 36.000 Mitarbeiter verbindet dabei ein Anspruch: Kein Produkt ist so perfekt, dass man es nicht noch besser machen könnte.

Im Geschäftsjahr 2016 erwirtschaftete das Unternehmen bei einem Umsatz von 12,7 Mrd. Euro einen Gewinn (bereinigtes EBITDA) von 2,165 Mrd. Euro.

#### **Exploring opportunities. Growing together.**

Als Arbeitgeber bietet Evonik eine große Vielfalt an erstklassigen Perspektiven – sowohl für Naturwissenschaftler und Ingenieure als auch für Wirtschaftswissenschaftler und Informatiker. Wir setzen auf Entwicklungsmöglichkeiten, Teamgeist und Flexibilität. Steigen Sie ein bei Evonik. Freuen Sie sich auf herausfordernde Projekte, in denen Sie von Anfang an mitarbeiten können und entdecken Sie eine Welt voller Möglichkeiten. Wir freuen uns auf Sie! Mehr auf careers.evonik.com - #HumanChemistry

#### **HOCHTIEF Aktiengesellschaft**

engesellschaft

HOCHTIEF gehört zu den bedeutendsten Hoch- und Infrastruktur-Baukonzernen der Welt. Der Schwerpunkt der Aktivitäten liegt auf komplexen Projekten in den Bereichen Verkehrs-, Energie-, soziale und urbane Infrastruktur sowie im Minengeschäft. Hier bringt das Unternehmen seine in mehr als 140 Jahren gewonnenen Kompetenzen im Entwickeln, Finanzieren, Bauen und Betreiben ein. Mit zirka 51.000 Mitarbeitern und Umsatzerlösen von rund 20 Mrd. Euro im Geschäftsjahr 2016 ist der Konzern mit Sitz in Essen auf allen wichtigen Märkten der Welt präsent: Die kompetenten Mitarbeiter schaffen Werte für Kunden, Aktionäre und HOCHTIEF gleichermaßen. Mit innovativen, einzigartigen Lösungen und seiner Projekt- und Ingenieurkompetenz differenziert sich HOCHTIEF vom Wettbewerb. So erhöht der Konzern die Kundenzufriedenheit, sichert nachhaltiges Wachstum und steigert die Profitabilität des Unternehmens. Für seinen langfristigen Erfolg fördert HOCHTIEF das Zusammenspiel von Ökonomie. Ökologie

und Sozialem. HOCHTIEF ist wegen seines Engagements um

Nachhaltigkeit seit 2006 in den Dow Jones Sustainability

Indizes vertreten.

Die innogy SE ist ein etabliertes europäisches Energieunternehmen. Mit seinen drei Geschäftsfeldern Netz & Infrastruktur, Vertrieb und Erneuerbare Energien adressiert es die Anforderungen einer modernen dekarbonisierten, dezentralen und digitalen Energiewelt. Im Zentrum der Aktivitäten von innogy steht, bestehenden und potenziellen Kunden innovative und nachhaltige Produkte und Dienstleistungen anzubieten, mit denen sie Energie effizienter nutzen und ihre Lebensqualität steigern können. Die wichtigsten Märkte sind Deutschland, Großbritannien, die Niederlande und Belgien sowie einige Länder in Zentralostund Südosteuropa, insbesondere Tschechien, Ungarn und Polen. Bei der Stromerzeugung aus erneuerbaren Energien ist das Unternehmen auch außerhalb dieser Regionen aktiv, z.B. in Spanien und Italien. innogy ist eine Tochtergesellschaft der RWE AG und ist am 1. April 2016 operativ an den Start gegangen. Der Markenname innogy ist eine Symbiose aus den Begriffen Innovation, Energy und Technology.









RAG

#### ista International

ista ist eines der weltweit führenden Unternehmen bei der Verbesserung der Energieeffizienz im Gebäudebereich. Mit unseren Produkten und Services helfen wir, Energie, CO<sub>2</sub> und Kosten nachhaltig einzusparen. ista hat sich dafür auf das Submetering spezialisiert, also auf die individuelle Erfassung, Abrechnung und transparente Visualisierung von Verbrauchsdaten für Mehrfamilienhäuser und gewerbliche Immobilien. Als Grundlage nutzen wir ein Portfolio modernster Hardwarekomponenten zum Energiedatenmanagement. Dazu gehören funkbasierte Heizkostenverteiler, Wasserzähler, Wärmezähler sowie entsprechende Montagesysteme. Das Unternehmen beschäftigt in 24 Ländern weltweit über 5.400 Menschen und unterstützt rund zwölf Mio. Nutzeinheiten (Wohnungen und Gewerbeimmobilien) bei der Einsparung wichtiger Ressourcen. 2016 erwirtschaftete die ista Gruppe einen Umsatz von 850,4 Mio. Euro. Mehr Informationen unter www.ista.de und www.inside.ista.de.

KPMG

KPMG ist ein Firmennetzwerk mit mehr als 189.000 Mitarbeitern in 152 Ländern.

Auch in Deutschland gehört KPMG zu den führenden Wirtschaftsprüfungs- und Beratungsunternehmen und ist mit rund 10.200 Mitarbeitern an 25 Standorten präsent. Unsere Leistungen sind in die Geschäftsbereiche Audit, Tax, Consulting und Deal Advisory gegliedert. Im Mittelpunkt von Audit steht die Prüfung von Konzern- und Jahresabschlüssen. Tax steht für die steuerberatende Tätigkeit von KPMG. Die Bereiche Consulting und Deal Advisory bündeln unser hohes fachliches Know-how zu betriebswirtschaftlichen, regulatorischen und transaktionsorientierten Themen.

Für wesentliche Branchen unserer Wirtschaft haben wir eine geschäftsbereichsübergreifende Spezialisierung vorgenommen. Hier laufen die Erfahrungen unserer Experten weltweit zusammen und tragen zusätzlich zur Beratungsqualität bei.

#### NATIONAL-BANK AG

Die NATIONAL-BANK gehört zu den führenden privaten und konzernunabhängigen Regionalbanken in Deutschland. Mit rund 650 Mitarbeitern dienen wir anspruchsvollen Privatund Firmenkunden sowie mittelständischen institutionellen Investoren an 17 Standorten in Nordrhein-Westfalen, unserem Geschäftsgebiet. Verlässlicher Service und kompetente Beratung prägen unser konservatives kaufmännisches Selbstverständnis. Unser Geschäftsmodell steht für Solidität und Stabilität. Rund 5.200 Eigentümer sind Zeichen unserer Unabhängigkeit, der wir uns stets aufs Neue verpflichtet fühlen. Ein starkes kulturelles und gesellschaftliches Engagement ist uns eigen. Dabei konzentrieren wir uns auf die Förderung der Bereiche Kunst und Musik, Bildung und Soziales.

Die RAG betreibt den sozialverträglichen Auslauf des deutschen Steinkohlenbergbaus. Dies ist kein Selbstläufer: Kein Bergmann fällt ins Bergfreie, die Mannschaft muss bis zum letzten Tag auch an neuen Arbeitsplätzen motiviert und die Arbeitssicherheit auf bestem Niveau gehalten werden. Gleichzeitig gilt es, alle Lieferverpflichtungen einzuhalten. Mit der RAG Montan Immobilien geben wir darüber hinaus dem Strukturwandel in den Bergbauregionen durch die Nachnutzung bergbaulicher Infrastruktur neue Impulse zur ganzheitlichen Quartiersentwicklung. Wir denken und handeln über den Tag hinaus, nachhaltig und mit Blick auf kommende Generationen – wirtschaftlich, ökologisch und sozial.

Der Steinkohlenbergbau hat das Ruhrgebiet mehr als 150 Jahre lang geprägt. Wenn bis Ende 2018 die letzten noch aktiven Bergwerke die Kohlenförderung einstellen, endet ein Kapitel Industriegeschichte – nicht jedoch die Arbeit der RAG. Auf das Unternehmen kommen dauerhaft wichtige Aufgaben zu. Diese sogenannten Ewigkeitsaufgaben tragen dazu bei, den Wasserhaushalt in der Region unter und über Tage zu regulieren. Zu den Ewigkeitsaufgaben zählen die Grubenwasserhaltung, der Betrieb von Polderanlagen und das Grundwassermanagement. Oberstes Gebot sind dabei für die RAG der Trinkwasser- und der Umweltschutz. Gleichzeitig entwickelt das Unternehmen ehemalige Bergbauflächen weiter, so dass sie zukünftig Raum für Wohnund Gewerbegebiete oder für Photovoltaik und Windkraftanlagen bieten.





#### Universitätsallianz Ruhr

#### **Vaillant Group**

In der Universitätsallianz Ruhr (UA Ruhr) bündeln wir - die Ruhr-Universität Bochum, die Technische Universität Dortmund und die Universität Duisburg-Essen – unsere Kompetenzen und Ressourcen, um unsere Leistungs- und Wettbewerbsfähigkeit weiter auszubauen. Unter dem Motto "gemeinsam besser" bieten wir unseren Forscherinnen und Forschern vielfältige Möglichkeiten zur Kooperation und Vernetzung, während die Studierenden von dem großen Angebot an Bachelor- und Masterstudiengängen mit zahlreichen Spezialisierungsmöglichkeiten profitieren. Insgesamt sind bereits über hundert Kooperationen in Forschung, Lehre und Verwaltung entstanden, woraus sich eine Kultur der Zusammenarbeit mit vielfältigen persönlichen und strukturellen Verbindungen entwickelt hat.

Die internationale Zusammenarbeit der UA Ruhr fördern unsere Verbindungsbüros in New York, Moskau und Sao Paulo. Über diese können interessierte Wissenschaftler und Wissenschaftlerinnen neue Forschungskooperationen anstoßen und beim Auf- und Ausbau internationaler Kontakte auf Unterstützung zählen.

Die Vaillant Group ist ein international tätiges Unternehmen mit Hauptsitz in Remscheid, Deutschland, das in den Bereichen Heiz-, Lüftungs- und Klimatechnik tätig ist. Als einer der weltweiten Markt- und Technologieführer entwickelt und produziert die Vaillant Group maßgeschneiderte Produkte, Systeme und erbringt Dienstleistungen für Wohnkomfort.

Das Produktportfolio reicht von effizienten Heizgeräten auf Basis herkömmlicher Energieträger bis hin zu Systemlösungen zur Nutzung regenerativer Energien. Im Geschäftsjahr 2016 erzielte das Unternehmen, das sich seit seiner Gründung 1874 in Familienbesitz befindet, mit mehr als 12.000 Mitarbeitern einen Umsatz von rund 2,4 Mrd Euro.

80 Partner 81

## **Initiativkreis** Ruhr

In der Gemeinschaft lässt sich mehr bewegen. Dieser Gedanke ist die Triebfeder des Initiativkreises Ruhr seit mittlerweile mehr als einem Vierteljahrhundert. Mehr als 70 Mitgliedsunternehmen und -institutionen mit insgesamt etwa 2,25 Millionen Beschäftigten und einem globalen Umsatz von rund 630 Milliarden Euro bilden eines der stärksten regionalen Wirtschaftsbündnisse Deutschlands. Der Initiativkreis Ruhr ist ein Motor des Wandels. Seine Mitglieder verbindet das Ziel, die Entwicklung des Ruhrgebiets voranzutreiben und seine Zukunfts- und Wettbewerbsfähigkeit nachhaltig zu stärken. Wesentliche Handlungsfelder sind Wirtschaft, Bildung und Kultur. Aus diesem Antrieb heraus entstanden Leitprojekte mit Strahlkraft. Beispiele sind InnovationCity Ruhr, die TalentMetropole Ruhr und das Klavier-Festival Ruhr. www.i-r.de

#### Die Partnerunternehmen des Initiativkreises Ruhr

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## **TalentMetropole Ruhr –** 53 Städte, 53.000 Möglichkeiten



Das Ruhrgebiet hat ein enormes Potenzial an jungen Menschen mit verborgenen Talenten. Sie zu finden und zu fördern ist die Aufgabe der TalentMetropole Ruhr. Unter dem Dach der Stiftung TalentMetropole Ruhr begleiten aufeinander aufbauende Bildungsprojekte engagierte junge Menschen dabei, ihre Begabungen unabhängig von ihrer sozialen Herkunft bestmöglich zu entwickeln. Sie nimmt diejenigen in den Blick, die noch keinen optimalen Zugang zu Bildung haben.

Neben ihren eigenen Projekten unterstützt die TalentMetropole Ruhr weitere innovative Angebote der Talentförderung. Dazu arbeitet sie mit mehr als 300 Partnern zusammen – Unternehmen, Verbänden, Kammern, Hochschulen, Schulen, Vereinen, Initiativen und vielen mehr. Sie zeigt Bildungschancen auf, macht Vorbilder sichtbar und fördert den Austausch.

Die Stiftung TalentMetropole Ruhr ist eine gemeinnützige Tochtergesellschaft des Initiativkreises Ruhr.

www.talentmetropoleruhr.de



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## **Impressum**

#### Herausgeber

Initiativkreis Ruhr GmbH

#### Geschäftsführer

Dirk Opalka

#### Redaktion

Jasmin Buck, Initiativkreis Ruhr GmbH

#### v. i. S. d. P.

Christian Icking, Initiativkreis Ruhr GmbH

#### © Fotos

Initiativkreis Ruhr GmbH RAG Ruhr-Universität Bochum TU Dortmund Universität Duisburg-Essen Vaillant

#### Gestaltung / Realisation

Sandra Bindschus, grafikkontor GmbH

Wir danken allen Studierenden für die Bereitschaft, uns die Bilder für dieses Booklet zur Verfügung zu stellen.

86 Impressum



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