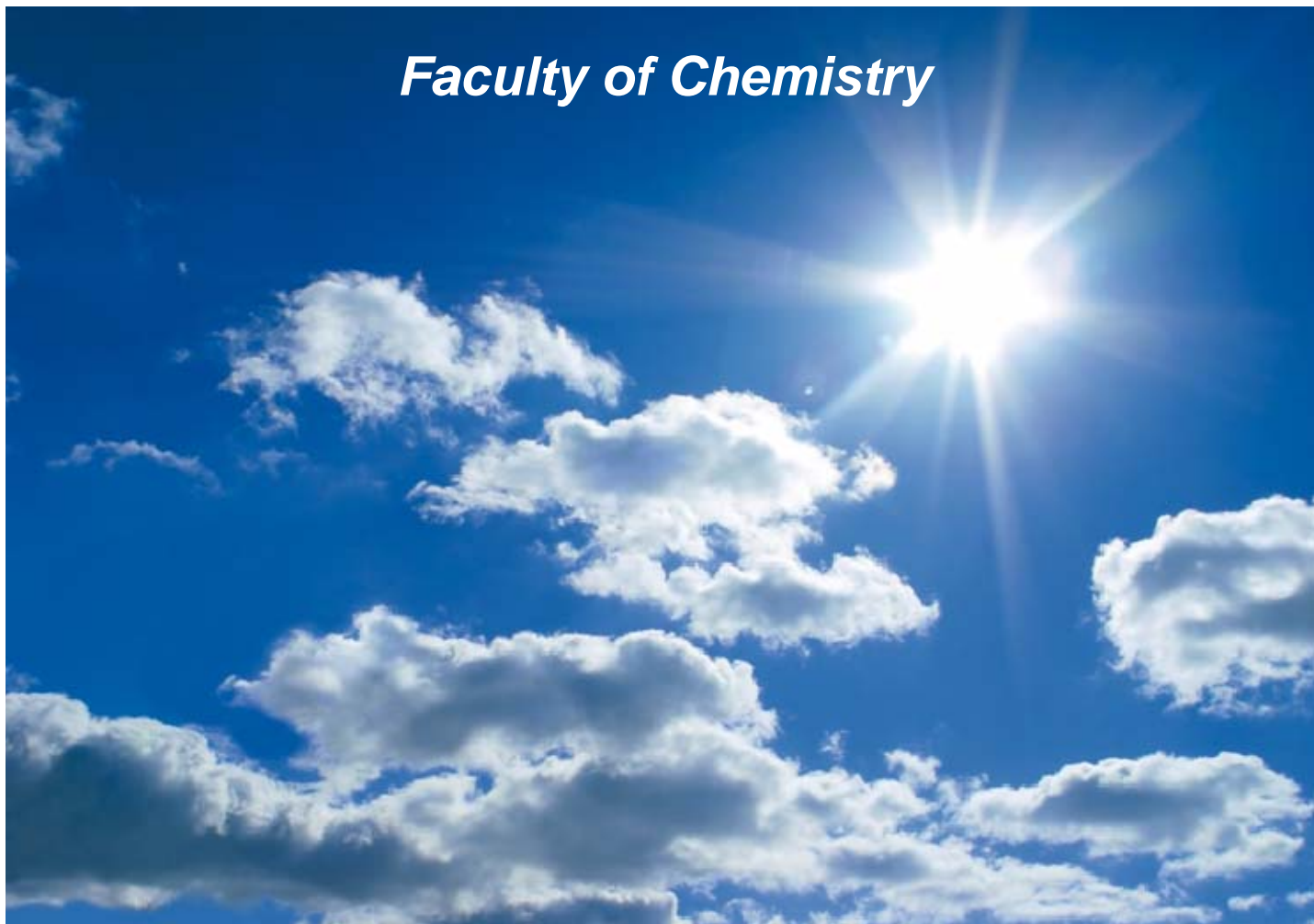


Faculty of Chemistry



UNIVERSITÄT
DUISBURG
ESSEN

Open-Minded

Guidance for International Students

Winter Semester 2018/19



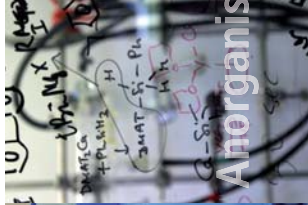
Organische Chemie



Physikalische Chemie



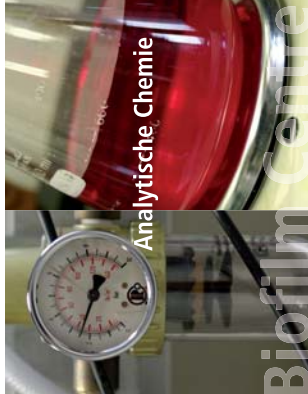
Theoretische Chemie



Anorganische Chemie



Technische Chemie



Analytische Chemie



Didaktik der Chemie



Hochschullehrerinnen und Hochschullehrer in der Fakultät für Chemie



Torsten C. Schmidt
ANALYTISCHE CHEMIE



Oliver J. Schmitz
ANALYTISCHE CHEMIE



Ursula Teßfender
ANALYTISCHE CHEMIE



Maik Behrend
ANORGANISCHE CHEMIE



Matthias Dippel
ANORGANISCHE CHEMIE



Stephan Schürz
ANORGANISCHE CHEMIE



Rainer Mecklenstock
BIOFILM CENTRE



Alexander Probst
BIOFILM CENTRE



Bettina Siefers
BIOFILM CENTRE



Matthias Boppol
DIDAKTIK DER CHEMIE



Stefan Burmann
DIDAKTIK DER CHEMIE



Karin Stachelsheldt
DIDAKTIK DER CHEMIE



Elke Sumfleth
DIDAKTIK DER CHEMIE



Maik Walpuski
DIDAKTIK DER CHEMIE



Michael Giese
ORGANISCHE CHEMIE



Gerhard Haberbauer
ORGANISCHE CHEMIE



Jochen Nimmeyer
ORGANISCHE CHEMIE



Carsten Schmeick
ORGANISCHE CHEMIE



Thomas Schräder
ORGANISCHE CHEMIE



Jens Voskuhl
ORGANISCHE CHEMIE



Andria Garschel
PHYSIKALISCHE CHEMIE



Jochen Gutmann
PHYSIKALISCHE CHEMIE



Edgar Harschbark
PHYSIKALISCHE CHEMIE



Christian Mayer
PHYSIKALISCHE CHEMIE



Sebastian Schlöcker
PHYSIKALISCHE CHEMIE



Stephan Bartelowski
TECHNISCHE CHEMIE



Bilal Gökce
TECHNISCHE CHEMIE



Matthias Ulbricht
TECHNISCHE CHEMIE



Georg Jansen
THEORETISCHE CHEMIE



Holger Sommerich
THEORETISCHE CHEMIE



Edhard Spörh
THEORETISCHE CHEMIE

Welcome at the Faculty of Chemistry

Dear reader!

The Faculty of Chemistry is happy to welcome you! You are one of international students and you belong to many different people who enrich teaching, research and the university life. You will get to know the University of Duisburg - Essen as diverse and cosmopolitan university that offers its students many opportunities and counseling facilities for leisure, culture and sport.

If you are new in Germany, you must do many formalities, and it is a lot of new and unusual to you: a foreign language, new surroundings, another culture ...

To support you, we prepared this guidance.

We wish you a pleasant and successful stay at our faculty.

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Welcome to the University of Duisburg-Essen

The University of Duisburg-Essen is located in the heart of the most active university landscape in Europe, called “Germany’s Academic Triangle”. Our neighbours include the University of Düsseldorf (25,000 students), thirty kilometres to the south, and the Ruhr University Bochum (32,000 students) and Technical University of Dortmund (over 25,000 students) ten and thirty kilometres to the east, respectively. Roughly 40,000 students are currently registered in Duisburg-Essen, served by a team of more than 4,500 academic and non-academic staff. Duisburg-Essen is simultaneously the largest university in the area and the newest, having been founded in 2003 by the merger of the universities in Duisburg and Essen, which had originally been two independent universities.



This merger creates a unique opportunity for us. First, there is the broad spectrum of disciplines in research and teaching now available in our eleven faculties. This spans

the well-established faculties of humanities (sometimes called the ‘mind sciences’), social sciences and business faculties, to the prestigious engineering sciences, natural science faculties and the Medical School. Then, there is our unique feature of having two campuses, one campus in the city of Duisburg and the other campus in the city of Essen. The social sciences, natural sciences and engineering sciences are concentrated in our Duisburg campus, whereas humanities, life sciences, faculty of mathematics and medicine are concentrated in our Essen campus. The faculty of business is located on both campuses.

What are we known for? Across both campuses we have four research strongholds: 1) Nanoscience, 2) Biomedical science, 3) the future of urban systems, and finally, 4) Transformation of contemporary societies. In each of these areas - and in the many cross-over points among them - our faculties are becoming known as emerging leaders. For example, the medical faculty has assumed a central position in cardiovascu-

lar disease research and treatment, oncology and transplant medicine. The close cooperation between medicine and biology, physics, chemistry and engineering in biotechnology, especially in the development of human biomaterials, such as bone replacements or artificial tissue, has been a wide-ranging cross-disciplinary success.

To learn more about the other research projects and strongholds at the University of Duisburg-Essen take a look at [**http://www.uni-due.de/en/research.php**](http://www.uni-due.de/en/research.php).

Additional information on the University's academic profile is located at [**https://www.uni-due.de/en/university.php**](https://www.uni-due.de/en/university.php)

The Ruhr Area—the University's Surroundings

When you step foot in the Ruhr area you are walking on soil that is rich with coal, stories, characters, and history – miners and nuns, soccer and beer, working-class intellect and down-to-earth humour. The area is woven together by the Ruhr River, which threads its way through Duisburg (population of about 500,000 people) and Essen (roughly 580,000) toward Bochum and Dortmund. With 5.3 million people in total, the Ruhr area is the third largest conurbation in all of Europe – only London and Paris are larger.

Nowadays the flair of the area is strongly influenced by the amount of students and scholars – it is the most active academic spot in Europe, called “Germany's Academic Traingle”, as the Ruhr area is the most densely populated landscape of institutions of higher learning in Europe, with over 170,000 students living and working together.



But the area has long been known for its innovative spirit and interesting mix of people. For over two hundred years the Ruhr Area was the heart of German coal and steel manufacturing. The workers who once powered the area flowed in from all over Europe, looking for jobs, and with such a mixture of cultures, they learned that work-



ing well together meant needing to depend and rely on one another. As a result, people from the region are known for being open and tolerant, character traits proudly expressed in their interesting dialect, direct way of talking, and special type of humour.

In the mid-1900s the story of the Ruhr area took a twist. The coal and steel industry began to decline and people in the Ruhr area were faced with the question of what to do

with all the old factories and steel mills dotting the landscape. Instead of tearing the structures down they decided to do something different: they gave them a new purpose. Now, you can go rock climbing on the side of an old factory, watch a concert in an old board room, listen to a symphony or go to an art exhibit in a coal mine.

In fact, the region boasts cultural activities unmatched in any other area of Europe: more than 200 museums, as well as theatres, popular and classical musical events, opera, world-class ballet, art exhibitions, a rich café and pub nightlife, movie theatres, memorials to the culture of industry, bike tours, lakes, nature parks, and, of course, its sports teams, including internationally competitive football clubs.

Due to its cultural attractions, unique outlook, and the variety of the urban culture the EU's choosing the Ruhr Area (featuring the city of Essen) as a "European Capital of Culture" for 2010. In anticipation of this international occasion, exciting projects and an extensive programme of activities are planned.

The Ruhr area is not only known for its culture, but also its connection to industry, with 10 of Germany's largest businesses headquartered in the city of Essen. At the University of Duisburg-Essen our research centres are often closely connected to subsidiary developments and technology parks in various branches of commerce. To learn more about businesses in the area, you can visit: <http://www.i-r.de/>

Prior to Travel

Before you plan your way to Germany it is necessary that you prepare all documents for your trip and your stay in Germany.

a) Visa and residence permit

Before travelling to Germany, it is very often necessary to apply for a visa in your own country. When you have received your letter of admission, you can apply for a **student visa** at the German embassy in your home country for entry to Germany. There, you can also ask about any other conditions required for the granting of a visa. As a rule, you will receive a visa for three months.

After your arrival in Duisburg or Essen, you must register with the local „Ausländerbehörde“ (foreigner registration office). Here, your visa for the purpose of studying is usually extended to one year. After this, you will receive a further extension of your visa if you can provide proof that you are still enrolled as a student and that you have enough money to finance your studies.

Important: Please do **not** travel on a tourist visa. This expires after three months and cannot be extended or altered!

b) Health insurance

In order to study in Germany, you must have **health insurance**. The insurance must cover medical treatment of acute illnesses and accidents in Germany. If you are from an EU country in which you are already insured, this insurance will cover you during your stay in Germany and then again on your return home. You must however present an E111 form or your European Health Insurance Card (EHIC) to a German compulsory health insurance provider in order to be exempted. The E111 form is available from health insurance providers / government offices and post offices in your own country.

If you do not come from an EU country, you must insure yourself with a German health insurance provider. If you are not older than thirty and have not yet completed your 14th semester, you can insure yourself as a student at favourable rates.

c) Living Accommodations



Unlike in other countries, university admission in Germany does not automatically come with an offer of accommodation. You are therefore responsible for organizing your accommodation on your own. It is wise to begin looking for a place to stay in Germany as early as possible while still at home.

There are various ways of doing this:

1. A room in a student residence of the Studentenwerk

The Student Services Office (*Studierendenwerk*) offers furnished flats reserved for academic faculty in the vicinity of the University. The Student Services Office (*Studierendenwerk*) offers a total number of 2,450 places in 15 halls of residence located in Essen, Duisburg and Mülheim. The rooms differ in furnishing and room structure (from single apartments with a kitchen and bathroom, to shared apartment for two to six people, from family homes to single rooms with a washbasin, shared shower and kitchen). The rental prices vary accordingly.

You can apply for a room in a hall of residence even if you have not yet received a letter of acceptance/admission from the University of Duisburg-Essen. The earlier you apply to the Studierendenwerk (student support services), the higher up you will be on the waiting list.

You will find an application form from the Studentenwerk Essen-Duisburg on the internet under:

<https://www.stw-edu.de/en/accommodation/online-application/>

For further information on the different halls of residence, please visit:

<https://www.stw-edu.de/en/accommodation/>

The high level of demand means that the waiting lists are long. You will therefore need to make sure that you either apply very early on, or look for an alternative.

Contacts

Accommodation department
Reckhammerweg 1
45141 Essen
E-Mail: wohnen@stw.essen-duisburg.de

More information you can find under following link:

<https://www.stw-edu.de/en/accommodation/contact/>

2. A room on the private housing market

You can naturally decide to find your own furnished apartment/room or a place in a "Wohngemeinschaft (WG)" (shared accommodation) on the private housing market.

You can post your "Wanted" ad on the noticeboards around the campus or in the University of Duisburg-Essen's web forum. You will find some practical tips and other information on the subject under "International Office (AAA)" in the section on "Living and Housing - Leben und Wohnen in Duisburg-Essen".

Renting private flats is facilitated by consulting ads in local advertisers (e.g., *Stadtanzeiger*) that are delivered free of charge to every household in the city. The Wednesday and (especially) the Saturday editions of the regional daily newspapers *WAZ* (*Westdeutsche Allgemeine Zeitung*) and *NRZ* (*Neue Ruhr Zeitung/Neue Rhein Zeitung*) are full of ads for flats and rooms for rent.

In Duisburg and in Essen housing companies offer flats in different parts of the cities.

If you are looking for a temporary room or flat, you can rent a privately owned room or flat from the present tenant via a sublease

<http://www.zwischenmiete.de/>

Very often in such rental agreements, a one-time deposit equivalent to two months' rent is required; this deposit will be refunded when the flat is vacated in good condition.

d) Check list of things to do before your departure

The following documents will be necessary for residents' registration and enrollment at the University of Duisburg-Essen. This documentation must be presented in German or English translation, along with either the original or a properly notarized copy for enrollment. You must also have available:

- birth certificate
- valid passport
- 4 photographs (at least two of which must be facial passport photos in the format of 35 x 45 mm)
- proof of a university degree (BSc/MSc degree, Ph.D., M.D., etc.)
- letter of reference
- proof of health insurance

After Arriving in Germany

1) Travel to Duisburg and Essen

While not all roads lead to Duisburg and Essen, both cities are readily accessible from airports in the area. Rail and bus transportation can easily be planned via the Internet. Both cities are served by the rail networks IC/EC and ICE. The German Railway (*Deutsche Bahn*) provides comprehensive travel information at **www.bahn.de**. The excellent public transportation in the Ruhr Area is provided by the *Ruhrbahn*. Current schedule information can readily be accessed at **<https://www.ruhrbahn.de/essen.html>**

a) The Düsseldorf Airport (DUS)

The airport in Düsseldorf has its own train station from which you can travel directly to the Essen or Duisburg main train stations (*Hbf*).

After arrival at the airport, a shuttle service, the 'SkyTrain', takes you directly to the train station.

You can then make use of the local trains (*VRR*) such as the regional express/*Regionalbahn* (*RE/RB*) and the so-called *S-Bahn* (*S1*) to Duisburg with a ticket in the price class B, travel time of about ten minutes, and to Essen a ticket in the

price class C, with a travel time of about twenty-five minutes via a regional express train.

Tickets are available from the ticket machines in the train station. Here your coins will come in handy, since the machines do not always take bank notes. If you are traveling with several persons, you can use the day-ticket all day for the price class you select for up to five persons. If you have an EC-/Maestro Card that also functions as a cash card, you can use this card to buy tickets at a ticket machine provided that you have previously loaded it at an ATM. Very important: the tickets must be validated (stamped) before entering the trains; usually this can be done at the orange stamping machines in the train station just before proceeding to the platform and not in the trains. Failure to validate a ticket before entering a train can result in a stiff fine, not the recommended way to start your stay in Germany.

b) The Cologne (*Köln-Bonn*) Airport (CGN)

The airport in Cologne-Bonn also has direct access to trains (*Deutsche Bahn, DB*). An overview of train schedules is available in the Internet.

The main train stations in Duisburg and Essen are best reached with an Intercity-Express (ICE) from the main train station in Cologne. The trip takes about an hour.

c) The *Frankfurt am Main* Airport (FRA)

The airport in Frankfurt is well integrated into the rail network, so that Duisburg and Essen are reachable by an ICE train in less than two hours. A ticket booking and seat reservation are recommended: <https://www.bahn.com/en/view/index.shtml>. In addition, some airlines offer reduced rail tickets in a Rail&Fly package.

2) From the Main Train Stations to the Campuses

The Essen Campus is reached from the main train station in Essen by the tram lines numbers 105 and 103; get off at the stop '*Rheinischer Platz*' or '*Berliner Platz*'; or take the underground (U-Bahn), U11 and U17, and get off at '*Universität*' or '*Berliner Platz*'.

Destinations to other institutes belonging to the University can be found on the general map in the attachment to the brochures,

or at https://www.uni-due.de/en/university_addresses.shtml.

You can plan your arrival at the university with public transportation at the following Web site: <https://www.ruhrbahn.de/essen.html>. Within one city one price level will be charged, which is fare zone A.

We very much hope that you arrive safe and sound (and not too much out of breath) at the University of Duisburg-Essen!

3) Enrollment

The actual enrolment or matriculation at the university occurs after your arrival at your place of study. You must arrive in Germany in good time for the beginning of term; you can no longer enroll after the enrolment deadline has passed.

You can be enrolled after meeting the enrolment requirements (see <https://www.uni-due.de/international/enrolment.php>)

The necessary documents are:

- the application for enrolment and a passport photograph
- confirmation of health insurance cover for one semester
- passport and visa
- original certificates that prove your entitlement to university studies

After enrolment, you will receive confirmation of matriculation and a student ID card. With this card you can pay for the food in the mensa and cafeteria and also you can use this in the library. This often gets you reduced prices - for the cinema, sport, newspaper subscriptions and such like.

You are an applicant from a country which does not belong to the European Union

You will be enrolled by the International Office (Akademisches Auslandsamt) building V15, ground floor, Room Nos. D9 - D27, during the regular enrolment period. Later enrolment is possible for the winter semester until October 31st latest, but perhaps no change to other degree courses.

Campus Essen	
Office hours for foreign students ("incoming students")	Monday 13.00 - 15.00 h Tue - Fri 09.00 - 12.00 h
Office hours for exchange students ("incoming students")	Monday 13.00 - 15.00 h Wednesday 09.00 - 12.00 h

You are a national of a member state of the European Union or a German national with a foreign university entrance qualification

You will be enrolled by the Enrolment Office (Einschreibungswesen) building T03, ground floor, during the regular enrolment period. Later enrolment is possible for the winter semester until October 31st latest, but perhaps no change to other degree courses.

Office hours	Campus Essen
November - Mai	Mo - Thu 9.00 - 15.00 h Fri 09.00 - 12.00 h
June - October	Monday 13.00 - 15.00 h Tue - Fri 09.00 - 12.00 h

You will receive your student card (in the form of a chip card) after enrolment. In order to be able to send you your student card after it is ready, the International Office needs from you a self-addressed envelope with a € 0.55 stamp. Alternatively, you can collect your card one to two days after your enrolment from the International Office during the usual office hours.

If you change accommodation, please remember to change your address on your own (at the self-service terminal using your chip card)!

4) Compulsory registration

a) Foreigners' Registration Office (for non-EU and non-EEA citizens)

As soon as you have received your student card and have printed out your proof of enrolment at the self-service terminal, you must apply for a **residence permit** at the Foreigner Registration Office that is responsible for you (this depends on your citizenship and where you are living) and register your place of residence. After your entry into Germany you must register your new place of residence within seven business days. In Essen this means that you must appear during office hours in the Foreigners' Registration Office within this time frame, but in Duisburg or Mülheim it is sufficient during this period to make an appointment to register. The responsible authority for your registration is the aliens authorities for the area in which you reside.

NB: An EEA national is a citizen of Iceland, Liechtenstein, or Norway.

In order to obtain your residence permit, several documents are required:

- Two passport photographs,
- Proof of enrolment or course registration,
- Proof that you have enough money to study and live in Germany,
- Proof that you have enough living space (at least 12m²), and
- for the initial granting of your permit 50€, for every subsequent extension 30€.

Should you have questions on the bureaucratic procedure, the International Office will be glad to help you.

Should you be a student on an exchange programme, those appointees in charge of the programme are a further source of information.

Foreigners' Registration Office Essen

Office hours: Mon: 08:00–13:00 h & 14:00–15:00 h Tue: 08:00–13:00 h & 14:00–15:00 h Thu: 08:00–13:00 h & 14:00–18:00 h Fri: 08:00–12:30 h Closed on Wednesday	Telefon: +49 201 88 33333 Fax: +49 201 88 32709 E-Mail: studenten@ordnungsamt.essen.de
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b) Office of residents' registration for EU citizens

Registration Requirement

If you are an EU citizen, i.e. you hold a passport issued by a EU Member State, you are not required to register with the Foreigners' Registration Office, but rather just like German citizens with the local Office of Residents' Registration (Einwohnermeldeamt) or Citizens' Office (Bürgeramt), also Local Authority (Bezirksamt) within one week at your new place of residence; an exception is the city of Mülheim, where you should register centrally with the Foreigners' Registration Office. For Essen, make sure which local authority is responsible for your place of residence.

Contact

Bürgeramt Essen (E) Bürgeramt Innenstadt, Gildehof Hollestr. 3, 45127 Essen Phone: +49 201 88 33222 Fax: +49 201 88 33223	Office hours: Monday-Tuesday 8:00 - 15:00 Wednesday: 7:00 - 13:00 Thursday 8:00 - 18:00 Friday 8:00 - 13:00
buergeramt@einwohneramt.essen.de	

5) Opening a Banking Account

While you live and study in Germany, a bank cheque account called a 'Girokonto' (Giro means 'circuit': money circles through your account, never seeming to stop for long) is indispensable. It is recommended that you open such an account as soon after your arrival as possible. This will prevent additional fees when withdrawing money and will simplify paying bills and meeting daily expenses. Monthly payments such as income (pay checks, child support payments from the state) and bills (rent,

telephone, other utilities) are normally handled through this bank account. This account allows you to apply for an EC-/Maestro Card that allows you to withdraw money at many cash points (ATMs) all over Europe and elsewhere. The card is also useful for payment in many businesses, such as supermarkets, filling stations, stores, etc. You can also load the card's chip and use it as a cash card to pay for vending machines or parking lots.

The Sparkasse, Postbank and the Deutsche Bank are virtually everywhere in every city and easy to access, with the Sparkasse being virtually ubiquitous. Each bank offers different conditions that depend on a customer's monthly income and the amount of transactions in the account. Here, as in many other matters in business, shopping around before deciding on a bank is a good idea. Ask your colleagues at the University for their advice.

To open an account you should have the following documents prepared and at hand:

- Passport
- Registration form
- Residence title (from the Foreigners' Registration Office)

Studying at the University of Duisburg-Essen

Organising your studies

In Germany, the university year comprises a winter semester and a summer semester. The winter semester lasts from October until the end of March, the summer semester from April to the end of September. The actual lecture periods end in the winter semester in February, in the summer semester in July. The remaining time, called the lecture-free period or the semester break, is intended for the writing of seminar papers, presentations, for preparing for examinations, for taking examinations and for doing periods of practical training.

The cost of studying

Studying at the University of Duisburg-Essen is subject to fees. These is a social contribution fee. The fee cannot be paid by money transfer but will be debited from the students blocked account opened at a German Bank after registration in Essen. It is not possible to pay by installments.

Students who come to the University of Duisburg-Essen as part of certain exchange programmes may be exempt from the fees. Please enquire whether this applies to you at the International Office.

At the University of Duisburg-Essen the **semester contribution** is at present 304,62 €. It is made up of the student body contribution, the social contribution and the charge for the **semester ticket**.

Your student card (in the form of a chip card with the date of validity printed on it) is also – but only in combination with your identity card/ passport – your (semester) ticket for the Rhine Ruhr Transport Association (VRR). This means that you have free travel by bus and train in the entire region for the whole semester (also in the semester break). By using public transport, you will gain a lot by spending a little.

Nevertheless, studying in Germany is relatively expensive since the **cost of living** is fairly high.

At present, students must reckon with monthly expenses of 700 € to 800 €:

An example of your **monthly expenses** could look like this:

Rent:	ca. 275.00€
Health insurance:	ca. 66.00€
Food:	ca. 300.00€

Obviously, you have to add on expenses for books, photocopies, telephoning, clothes and entertainment (theatre, concerts, cinema, museums, pubs, etc.). Please remember that during the first weeks of your stay in Germany, there can be rather large expenses, e.g. the fees for your residence permit, the deposit when renting accommodation (normally the equivalent of two months' rent), the cost of dictionaries and other books. These can rapidly exceed 600 €.

Language and writing classes (German)

You can find information on these at the International Office, the notice boards in the German department or on the internet:

- Offers of the Schreibwerkstatt which helps with German in wording and texting:
www.uni-due.de/schreibwerkstatt/
- Offers of the Institute of Optional Studies (IOS):
<http://www.unidue.de/ios/index.shtml>

University Library (UB)

There is a university library on each campus (**<http://www.ub.uni-duisburg-essen.de>**), which depending upon the subject is housed in various buildings.

The life science library in Essen is located in building V15, on the first floor. The main library is located in the red building R11, ground floor.

Opening hours and locations can be found on the homepage

<https://www.uni-due.de/ub/en/eadroeff.shtml>

You will receive an integrated Library ID with your University ID. Before using it the first time, you must have it activated in a specialized library (MINT Library). Note that in order to use the libraries on both campuses, the access rights of your library ID must be activated on both campuses.

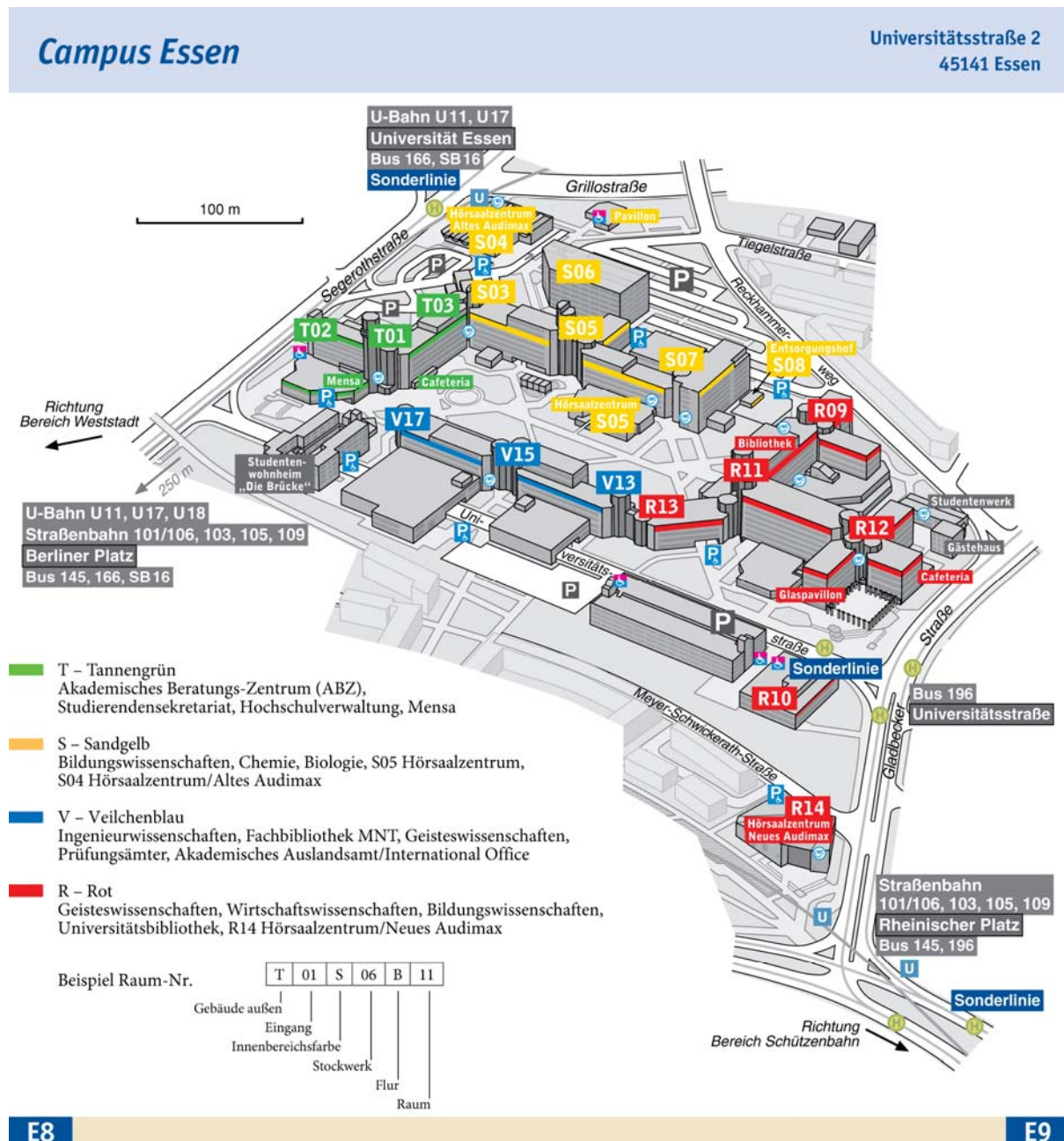
Mensa and cafeteria

The Mensa is the university canteen and is administered by the Studentenwerk. Every day three meal choices with different side dishes, and including a vegetarian dish, are on offer. The meals are a bargain priced between 4 and 5 euros. In addition, in the main cafeteria a daily salad bar and, in alternating weeks, a vegetable or pasta bar that costs 0.70 euros per 100 grams are available. Quark and yoghurt dishes round out the choices. The weekly menu is displayed at various centrally located positions on the campuses and online at:

<https://www.stw-edu.de/en/catering/locations/canteens/mensen//show/mensa-campus-essen/>.

In **Essen**, we have a Mensa and a restaurant on campus (near T01) and one at the Clinic (Virchowstraße 174). Each Mensa has a **cafeteria** which is meant for short breaks and small snacks. It offers hot and cold beverages as well as snacks and sweets. You can also buy phone cards, matches and other small everyday articles here.

Orientation on Campus Essen



The Buildings on Campus Essen are colour coded. Most Water Science lectures will take place in the yellow building, where the Natural Sciences are located (mainly building S05). The room numbers on Campus Essen follow a consistent format with three combinations of a letter and a two-digit number each:

Example: *S05 R03 B91*

S05 is the code for the Building (yellow, no. 05)

R03 is the code for the building level (level 03)

B91 is the room number (floor B, room number 91)

Cultural Activities

There is a multiplicity of cultural activities on both campuses available for you:

- Essen Student Orchestra
- University Choir (Essen) [**https://www.uni-due.de/unichor/**](https://www.uni-due.de/unichor/)
- University Orchestra (Essen) [**http://uniorchester-duisburg-essen.de/**](http://uniorchester-duisburg-essen.de/)
- Student Orchestra (Essen)
- Kammerchor Salto Chorale
- Big Band(its) [**http://www.bigbandits.org**](http://www.bigbandits.org)
- Englisches Theater DUET (Duisburg University English Thespians)
- glassbooth (Theatre Group)
- Radio DUE (Essen)
- Film Club

Moreover, there are numerous lecture series available to the public. Up-to-date information can be found at [**http://www.uni-due.de/de/veranstaltungen/**](http://www.uni-due.de/de/veranstaltungen/).

Outside the University – The City of Essen

“Change through culture - culture through change”—the theme that palpably characterizes the entire region and the city of Essen has also convinced Brussels. Essen, along with the Ruhr District, has been nominated by the European Commission as the ‘European Capital of Culture 2010’.

The Aalto Opera House has a name that extends far beyond the region - not only for its music, but also for the architecture of the building. The new philharmonia in historic Saalbau has quickly played its way into the consciousness of music lovers. The “Aalto Ballett Theater” is the best in the region, and the “Essener Sprechtheater” has twice been distinguished as the North Rhine-Westphalian Theatre of the Year.

A collection of international renown can be found in Essen’s Folkwang Museum. “Villa Hügel”, the former residence of the industrial Krupp family is a regular venue for world-class exhibitions of cultural history. And even apart from these special and exceptional exhibitions, the visit is worthwhile, for the beautiful park alone.

And finally, people who visit Essen for the first time are nearly always surprised: half of the area of the city is green! Favourite places for the Essen residents to relax are

the banks of the River Ruhr and Lake Baldeney or the “Gruga”, one of Germany’s largest and most beautiful city gardens.

For evening entertainment, there is plenty to choose from: the various Essen theatres, the GOP-Variété or the cabaret - e.g. in ‘Stratmann’s Europahaus’. But a tour of the restaurant scene and the various pubs and clubs in Rüttenscheid, Borbeck, Werden, Kettwig, Steele or in the city centre is also well worthwhile. The legendary ‘Lichtburg’ movie palace and the ‘CinemaxX’ at ‘Berliner Platz’ still Germany’s biggest multiplex cinema not only show all the latest films, but with a variety of bars and bistros also offer their guests the ideal opportunity to conclude an enjoyable evening in style.

If you would like to learn more about the city or find out about tips, dates and addresses please contact:

Touristikzentrale Essen

c/o Essen Marketing GmbH

Am Hauptbahnhof 2

45127 Essen

Phone: +49 201 / 19433

Fax: +49 201 / 8872 044

touristikzentrale@essen.de

Traveling to the university by bus and train

You can reach both campuses easily from the main stations in each city. Your student card (chip card with proof of validity) is valid, in combination with your identity card/passport, as a ticket. So within the whole of the Regional Transport Association Rhine Ruhr (VRR), you don’t have to worry about tickets.

Three bus routes, 923, 924 and 933 and a tram route, 901, serve the **Duisburg campus**.

The **Essen campus** can be most easily reached by using the underground tramways U11, U17 and U18.

The direct connection (Special line)

Quick and comfortably from campus to campus: Students and staff of the University of Duisburg-Essen, can commute with a special bus line for free within 20 minutes between the two sites. The buses are without barriers and offer seats for 40 people. A registration is not necessary. Please, understand that you should show your student's identity card or identity card while boarding. Departure times can you find under:

<https://www.uni-due.de/verwaltung/busservice.php>

Social Networks and Mobility

Communications: Phone & Internet

You will be able to apply for a conventional telephone (what the telephone people call a 'landline') for your flat. The private company *Deutsche Telekom* is now responsible for the telephone lines formerly belonging to a state monopoly. (The transition from public to private has not always been accomplished without a problem arising here and there.) In addition, there are also other private companies (Arcor, Versatel, etc.) to choose from. If you wish to use the Internet at home and you find the standard modem too slow, you can apply for an ISDN system or a so-called DSL connection, both of which speed things up. But beware: there are large differences in costs for hardware and monthly costs in the various choices offered by the telephone companies; getting things started is not without problems. The Internet facilities at the University, on the other hand, are free of cost and trouble and for its personnel accessible from outside.

You have many possibilities to buy the cell phones. There are also different companies (e.g. Vodafone, o2, Base) to choose from.

You will receive your internet access with user identification when you enroll at the University. Your access is administered by the University Computing.

Doctors' Offices, Hospitals and Emergencies

You can reach emergency services and the fire department by dialling 112 on any telephone or cell phone; an emergency doctor and an ambulance are also reachable at 19222. The local hospitals do not have regular surgery hours for the public. The

first port of call in case of illness is usually the GP/family doctor. Only in the case of a serious emergency should you proceed directly to the hospital.

Any medical treatment requires you to produce your insurance card or the European insurance card (EHIC). Privately insured patients are treated and then billed. Non-privately insured patients pay 10 euros quarter-yearly at their doctor's office before treatment is administered; if needed, your family doctor will readily write you a referral to a specialist (of the same price range) so that you need pay only one quarterly fee. Preventive medical examinations, other types of screenings, and active immunisations are not covered by this fee.

Electricity

if you rent a room or a flat on the private housing market you should register for the electricity. Consumers can be supplied not only by your regional supplier of electricity, but many offers of alternative electricity suppliers to select the appropriate tariff. The leading electricity supplier in the region of Essen is RWE Energy, its mark, the sales and grid company of the RWE Group.

More about electricity supplier you can find under **www.strom-magazin.de**

Broadcasting fee (Rundfunkgebühren, GEZ)

The main form of financing of public service broadcasting is the fee. It covers a large portion of the costs incurred in respect of the public service broadcasters in the production, design and distribution of radio and television programs. Is therefore in principle be paid by each radio listeners, even if he does not take advantage of the programs of the public broadcasters want.

More Information you can find under: **<http://www.rundfunkbeitrag.de/>**

Counselling

If you have any questions about your studies, there are several places you can turn to. You can find an overview of the general (non-subject specific) counselling services of the University on the internet:

http://www.uni-due.de/imperia/md/content/abz/bv_studiengaenge.pdf

Each service has a particular emphasis:

International Office (IO)

The International Office is the **first port of call** for foreign applicants and students in all matters concerning application, admission and enrolment. During your studies, you can come here for up-to-date information and assistance concerning questions of residence and labor law and problems in financing your studies. We will direct you to the appropriate office which specializes in your concerns.

The International Office offers foreign students at each semester start **orientation days** which take two days. You learn everything important about both campuses, both cities, and general information on living and studying in Germany. If you opt for the free **buddy programme** after the orientation days we introduce you to the departmental student organisations and help you in organising your studies and your timetable.

Academic Counselling Centre (ABZ)

If you have problems in planning your work and time, if you have problems in making decisions, if you suffer from examination anxiety, if you can't cope with or if you have general problems concerning your studies, the best thing to do is to seek help from the **general study counselling** on the Duisburg and Essen campuses.

They offer both small groups in which you can, for example, practise planning your time and also individual sessions in which the counsellor will help you to resolve your difficulties, see „Studienberatung“ on page: **<https://www.uni-due.de/abz/>**

Essen Campus

Address: Universitätsstr. 2

T02 S00 L12

Personal counselling without appointment Mon, Wed 14 – 16 h, Tue, Thu 10 – 12 h

In addition to its range of information and counselling on all matters of general counselling and of studying, the centre also offers help in **choosing a profession** and **finding a job**.

Social counselling service (Studierendenwerk)

The social counselling service of the Studierendenwerk is your contact in all questions concerning accommodation, insurance, studying as a parent, the law as it affects foreigners or the awarding of financial support. You can also find help here if you have general social questions, problems in your hall of residence and personal difficulties. All counselling is of course confidential and free of charge.

Essen Campus

<https://www.stw-edu.de/beratung/>

Centre for Information and Media Services (ZIM)

The Media Centre (MZ) is a media library in which you can find films, records, CDs and old newspapers on microfilm, teleteaching, etc. There you can have digital and conventional media materials made, watch films, and copy newspapers from microfilm. You only have to present your university library card.

https://www.uni-due.de/zim/en_index-zim.php

The University Computing Centre (ZIM) offers help and support with computer problems, presents seminars and sells used computers at a reasonable price.

<http://www.uni-due.de/zim/>

You will receive a user identification with a password when you enrol. After activating your account you have access free to the internet and your own email address(es), e.g. `firstname.secondname@stud.uni-due.de`.

User office/“e-point“ in Essen

Building R09, Library GW/GSW, Ground floor

opening hours: Mon to Fri 9.00 to 19.00

The International Tutors Service Center

The TSC tutors help international students with questions on studying, social matters and life in the Ruhr region and at the University. They see themselves as a communication platform for international and German students, for example at the international “Stammtisch” meetings. The TSC helps students to get their bearings with the “O-Tag” orientation days or InfoTreff meetings, organises joint activities and cultural outings such as trips to famous German cities.

Addresses and links

International Office (IO)

Akademisches Auslandsamt (AAA)

https://www.uni-due.de/international/index_en.shtml

Office hours: Mon 13 - 15 h

Tue-Fri 09 - 12 h

Studentenwerk Essen-Duisburg

AöR

Reckhammerweg 1

45141 Essen

Phone: +49 201 820 10-0

Email: gf@stw.essen-duisburg.de

IO Essen

Building V15 S00, rooms 9 bis 14

Phone: +49 201 183-4128

Fax: +49 201 183-2257

Email: essen-io@uni-due.de

SRO - Students' Registrar's Office

Studierendensekretariat

Office hours: same as AAA (International Office)

SRO, Essen campus

Building T03, level R00

Universitätsstr. 2

45141 Essen

Email: studierendensekretariat-essen@uni-due.de

Glossary

In the following, you'll find explanations of German terms that you'll frequently hear at the university:

Academic quarter of an hour (*Akademisches Viertel*)

This means that classes always **begin** a quarter of an hour **later** than announced. For example, if a seminar is due to begin at 12.00 according to the list displayed on the notice board, it really begins at 12.15 (**c.t.** = cum tempore, 15 minutes later).

Should a class be scheduled to begin at the stated time, you'll find **s.t.** = sine tempore written after the starting time. (Classes **c.t.** also **end** a quarter of an hour **before** the scheduled time.)

AStA - General Student Council (*Allgemeiner Studierendenausschuss*)

All enrolled students at the university form the student body. This is represented by the Student Council. It is made up of students elected by the student body. It plays a role in university, social and cultural matters. It can provide you with advice and help you in your early days at the university.

BAföG - Law on Educational Funding (*Bundesausbildungsförderungsgesetz*)

This law regulates the financial support provided by the state to students in the form of partial loans or governmental grants. These are primarily awarded to German students. In certain cases, foreign students are also eligible for these. You can obtain information from the Studentenwerk.

Certification (*Beglaubigung*)

This is a confirmation that a copy of a document corresponds to the original. It is issued by an institution to which the state has granted the right to use an official stamp. (There is normally a charge for this service.)

Course catalogue (*Vorlesungsverzeichnis VVZ*)

This is a list of all the classes offered in each semester at the University. In addition, it contains the names and addresses of all the University staff and all the institutions of the University (library, examination offices, counselling services). The internet pages of each department also contain relevant extracts from the the general course catalogue or from the course catalogue with commentary.

Course certificate (*Schein/Leistungsnachweis*)

As a result of the change-over to the BA/MA system, evaluation is now carried out in form of a credit point system. The type of examination needed to acquire a certificate in your subject can be found in the examination regulations for this subject.

Examination Board (*Prüfungsausschuss*)

The Examination Board of each department is responsible for the correct conduct of examinations and those further exam-related tasks prescribed by the relevant regulations within each department.

Examination Office (*Prüfungsamt*)

The Academic Examination Office of the University is responsible for all legal questions concerning examinations, for example registering for examinations, the recognition of previous studies, providing lists of the marks earned and examination certificates.

Examination Regulations/Statutes (*Prüfungsordnung*)

These form the legal basis according to which examinations are conducted. Every course of studies has its own regulations. These determine what conditions have to be met before registering for an examination, how the examination committee is composed, how the examination is to be conducted, how many topics are to be examined and in what depth and how the marking is to be done. The examination regulations also lay down when a registration for an examination can be withdrawn or when the examination can be interrupted or repeated. You can obtain the examination regulations for your subject from the examination office or from the General Student Counselling Service or look at it on the internet:

https://www.uni-due.de/verwaltung/satzungen_ordnungen/pruefungsordnungen.php

Invigilated written examination (*Klausur*)

This is a written examination which usually lasts several hours and is supervised by a member of staff. If it is passed, it is a proof of academic achievement within the meaning of the departmental regulations.

Re-enrolment/Re-registration (*Rückmeldung*)

Once you are enrolled in a degree course and are continuing your studies in the following semester you have to renew the enrolment by your own at the self-service terminal within the deadlines (by paying the semester fee). The re-registration deadlines will be put up at the International Office and are listed in the current course catalogue. In addition, you can find all deadlines on

<https://www.uni-due.de/studierendensekretariat/semestertermine.php>.

The student registry will remind you of the re-registration deadlines via email.

SWS - Number of class hours per week (*Semesterwochenstunden*)

A one-hour lecture which is held once a week for one semester is equivalent to one SWS. A seminar which takes place, for example, once a week from 14.00 to 16.00 h is equivalent to two SWS. The calculation is based on full hours although a one-hour class lasts, in fact, only 45 minutes.

Master Study Course Water Science

All information regarding the different lectures can be found in the module handbook. It describes the contents, the lecturers, who else is going to listen to this lecture and what kind of exams you will have to write. The Module handbook as well as a lot of other very important information can be found at your study program website:

https://www.uni-due.de/water-science/organisatorisches_en.php

The Timetable you can find under:

http://www.uni-due.de/water-science/lehre_en.php

Other useful link is: **<https://www.lsf.uni-due.de/>**

This platform allows you to check if your schedule is correct ;)

Just click on "Veranstaltungen", "Vorlesungsverzeichnis", "Chemie" and then you will find a folder "Master of Science (Water Science)". Here all subjects for you are listed.

The Examination rules for the Master Study Program you can find under:

https://www.uni-due.de/imperia/md/content/zentralverwaltung/bereinigte_sammlung/8_72_6_okt11.pdf

The Curriculum of the Master Water Science has two parts of the Modules: requirement, which are obligatory and optional modules. Additional to the list of optional courses from the Master Water Science students may choose any offered module from the M.Sc. Chemistry that is not already part of the Water Science curriculum. Out of the Master's Program Management and Technology of Water and Wastewater (MTW3) students may choose any offered module that is not already part of the Water Science curriculum (Admission to modules needs to be arranged with the individual lecturers and may be limited to a certain number of students). In the case of doubt the examination committee decides on the acceptance. The same applies for the courses from the Master's Program Environmental Toxicology (EnviTox).

Some modules contain two parts: lecture and practical course. You can get Credits only if you pass both parts of this module.

Furthermore, under "Chemie" all working groups post all lectures they offer in this platform. If you find something, you would like to visit in addition to your curriculum. Please contact Jolanta Polkowska and ask her if this is possible.

Practical Analytical Chemistry

The Practical Analytical Chemistry is carried out as a research project for five weeks full time without concurrent lectures or other obligations to six weeks in the term time (module handbook: 225 h presence). This does NOT include writing the research report (module handbook: 75 h).

Currently responsible lecturer for the practical:

Prof. Dr. Torsten Schmidt, torsten.schmidt@uni-due.de

At the beginning of each summer term, a list with potential topics for the Practical Analytical Chemistry is distributed to all Master students of 2nd term in Chemistry or Water Science and an information session will be held (separately announced).

After distribution of the list, all students are invited to review the topics and to directly contact the indicated supervisors. Please be aware that this list is a collection of topics available in spring. There might be substantial changes and in particular further opportunities throughout the year!

Students may also choose to do the Practical Analytical Chemistry in a research group at UDE or externally that is not listed. In this case, however, they need to contact the responsible lecturer before commencing their work in order to make sure that academic supervision is guaranteed and that the project is clearly related to analytical chemistry. If this procedure is not followed, the practical cannot be accepted.

Examinations

In your study you will be putting different types of tests. Lectures are concluded usually with written examination. The main rules on exams can be found on the following pages.

Written examination ("Klausur")

For the written exams are offered three dates:

Courses	Winter Term (October - February)	Summer Term (April - July)
1 st Exam Date	February	July / August
2 nd Exam Date	April	September / October
3 rd Exam Date	September / October	April

Most exams in the courses of studies Chemistry and Water Science take place in the different time, sometimes also from 18 - 20 o'clock, so that you can visit in spite of the exam all lectures and practical course and there are no appointment overlapping or accumulations on one days.

In the master courses of studies a compulsory registration exists to the exam and it is released to you whether you perceive the first or second exam appointment from the exam grid.

At the end of the first semester, the following exams are planned:

Master Courses of Study Water Science	
Required Courses	
Chemometrics and Statistics	21.02.2019
Environmental Microbiology	04.02.2019
Water Chemistry	14.02.2019
Optional Courses	
Environmental Chemistry: Pollutants	06.02.2019
Environmental Chemistry: Soil/Waste	oral examination

More Information can you find under:

http://www.uni-due.de/chemie/studium_pruefungen.shtml

or <http://www.uni-due.de/water-science/organisatorisches.php>

Registration for exams (Master Water Science)

To be able to write an exam, you must be register. The registration occurs on-line under: <https://campus.uni-due.de/cm/pages/cm>

Should you have problems with the on-line registration, turn please within the on-line registration period to the hotline of the ZIM: Phone: 0201-183- 4444 or via E-mail (with the Screenshot) at: hotline@uni-due.de

<http://www.uni-due.de/zim/soforthilfe/>

For problems with the online registration, please contact Ms. Lesic (Examination Office).

You must register by yourselves for the exams during the registration period (Deadline)!

The registration for the exams occurs very early in the semester (in the winter Term 2017/18 from the **05th up to the 16th of November 2018**).

You can register for the first exam date in February or the second exam date in April.

Check in your own interest if your registration was successful! Please check if you obtain the registration confirmation via e-mail.

Cancelling an exam is possible online until one week before the exam! After that, this is not possible! Check in your own interest whether the notice of deregister was successful!

If you are due to a condition not in the position to take part on the examination, it is essential that you submit a medical certificate in the original (stating your name, ID number, and the name of the missed exam) no later than three working days after the exam date.

- you can submit the certificate directly in the examination office
- or you can send the certificate by post (date of postmark is decisive for the delivery term)

University of Duisburg-Essen
Prüfungswesen
Ms. Martina Lesic
Universitätsstr. 2
45141 Essen

It is not possible to submit a copy of the certificate (by email or fax).

In this case, the exam is not evaluate. You must register yourselves for the next possible date. This is also valid for the students who have not passed the exam.

For the repetition, exams are two registration periods. These are announce on time.

Repetition of the written exams

If they have not passed an exam, you can repeat this twice.

Should you not have passed the exam after two repetitions, you receive still one more possibility in the form of a verbal supplement test. Should this test not be also successful, finally, the test is not passed and you cannot continue your study further. If you finish the verbal test successfully, receive as a mark 50 degrees Points what corresponds in the classical marking system of 4.0.

Should you not have passed the exam at the first exam date, you can use the free attempt rule, which means your results will be not book in your account.

Should you have passed the exam at the first exam date, you can wrote the exam ones again at the second exam date and the best result will be booked in your account.



Grade Points



In the Master course of study Chemistry and Water Science in place of the traditional school grading system called Grade Points. The scale ranges from 0 - 100, where an exam is passed as 50 grade points (classic grading system would be 4.0). To table a statement from the traditional system to the grade points can be found on the next page.

Grade Points	Classic Grading System		Grade Points	Classic Grading System	
100-96	1,0	excellent	70-66	3,0	satisfactory
95-91	1,3	very good	65-61	3,3	satisfactory
90-86	1,7	good	60-56	3,7	sufficient
85-81	2,0	good	55-50	4,0	sufficient
80-76	2,3	good	49-0	5,0	fail
75-71	2,7	satisfactory			

Contacts in the Faculty of Chemistry

Contact persons at the faculty of Chemistry, which are happy to help you during your studies at the University of Duisburg-Essen.

Study Dean	Study Coordinator
	
Prof. Dr. Jochen Gutmann Room S05 R00 L86 Phone: 0201 / 183 / 2566 jochen.gutmann@uni-due.de	Dr. Jolanta Polkowska Room S05 V02 E43 Phone: 0201 / 183-6215 jolanta.polkowska@uni-due.de

Examination Board (B.Sc. / M.Sc. Chemistry)	
Chairman	Representative Chairman
	
Prof. Dr. Gebhard Haberhauer Room S07 S05 C39 Phone: +49 201 / 183-3151 gebhard.haberhauer@uni-due.de	Prof. Dr. Stephan Schulz Room S07 S03 C30 Phone: 0201 / 183-4635 stephan.schulz@uni-due.de

Examination Board (B.Sc. / M.Sc. Water Science)

Chairman 	Specialised (subject) counselling 
Prof. Dr. Oliver J. Schmitz Raum S05 T01 B35 Tel.: +49 201 / 183-3950 oliver.schmitz@uni-due.de	PD. Dr. Ursula Telgheder Room S05 V02 E11 Phone: +49 201 / 183-6768 ursula.telgheder@uni-due.de
Departmental Student Organization	
	 Room S03 V00 F36 Phone: +49 201 / 183-3592 help.fs-water-science@uni-due.de http://www.uni-due.de/fs-water-science/

Clerk of Examination Office

Chemistry		Water Science
Heike Ide	Gabriele Keller	Martina Lesic
Raum V15 R00 G42	Raum V15 R00 G41	Raum V15 R00 G17
Tel.: +49 201/183-3568	Tel.: +49 201/183-3566	Tel.: +49 201/183-7687
heike.ide@uni-due.de	gabriele.keller@uni-due.de	martina.lesic@uni-due.de
opening times		
Monday 13.00 - 15.00 h		
Tuesday, Wednesday, Thursday 09.00 - 12.00 h		
Friday 09.00 - 11.00 h		
http://www.uni-due.de/verwaltung/pruefungswesen/startseite.shtml		

Master Water Science					
1. Semester					
Time	Monday	Tuesday	Wednesday	Thursday	Friday
08-09			L Water Chemistry Schmidt S05 T00 B59	L Waste Water Treatment Hobby, Panglisch LB 134 Duisburg	
9-10	L Environmental Micro-biology Meckenstock, Probst S03 V00 E59			optional	
10-11		L Chemometrics and Statistics Jochmann S06 S00 B32	L Environmental Chemistry Soil/ Waste Sulkowski S05 T02 B02	E Waste Water Treatment Hobby, Panglisch LB 134 Duisburg	
11-12	S Environmental Micro-biology Meckenstock, Probst S03 V00 E59		optional	optional	
12-13	S/E Water Chemistry Schmidt S03 V00 E59	S Chemometrics and Statistics Jochmann S06 S00 B32	E Chemometrics and Statistics Jochmann S05 T03 B94		
13-14		L Environmental Chemistry Pollutants Schmitz S05 T02 B02	E Environmental Chemistry Soil/ Waste Sulkowski T03 R02 D81	optional	
14-15		optional			
15-16		S Environmental Chemistry Pollutants Schmitz S05 T02 B02		L Nanoparticle and Colloids Barcikowski S06 S00 B32	Thursday 10 – 12 h
L (Lecture), S (Seminar), E (Exercise)					optional

Curriculum Master Water Science

a) Required Modules

Term	Module	Total Number of Credits for Modules	Course					Cr. per Course	Requirements	Exam	
			Require-ments	Course	HPW						
					L	S	P				
2	ApplAnaC	5	none	Applied Analytical Chemistry	2	1		5	none	Written Exam	
2	ApplMiBi	6	none	Geomicrobiology	2			3	none	Written Exam for Module	
				Hygiene	2			3	none		
1	Chemo	5	none	Chemometrics and Statistics	2	1		5	none	Written Exam	
1	EnviMiBi	12	none	Environmental Micro-biology	2	1		5	none	Written Exam for Module	
2				Practical Course Environmental Micro-biology		1	8	7			
3	AnaC-P	10	none	Practical Course Analytical Chemistry		1	14	10	none		
3	Res Pract	10	AnaC-P, P EnviMiBi	Research Practical Course		1	14	10	none	Written Report	
1	WatChem	5	none	Water Chemistry	2	1		5	none	Written exam/ Presentation	
4	Master Thesis	30	80 Cr. from the Master degree Programm Master Thesis					0	30		Master Thesis

b) Optional Modules

Sem.	Module	Total Number of Credits for Modules	Course						Cr. per Course	Requirements	Exam
			Requirements	Course	HPW						
					L	S	P				
2	Advanced Mass Spectrometry (Adv MS)	3	none	Advanced Mass Spectrometry	1	1			3	none	Written or oral Exam
1 or 3	Environmental Chemistry: Pollutants (EnviPoll)	5	none	Environmental Chemistry: Pollutants	2	1			5	none	Written or oral Exam
1 or 3	Environmental Chemistry: Soil/Waste (EnviSoil)	5	none	Environmental Chemistry: Soil/Waste	2	1			5	none	Written or oral Exam
1, 2 or 3	Excursions	1-5	none	Excursions	1-5				1-5	none	Written report (no grades)
2	Management (Manage)	6	none	Quality Management	1	1			3	none	Written Exam for Module
3				Project Management	2				3	none	
1 or 3	Membrane Technologies (MemTech)	3	none	Membrane Technologies	1	1			3	none	Written Exam
2	Metrology in Chemistry (Metrol)	2	none	Metrology in Chemistry	1				2	none	Written or oral Exam
2	Oxidative Processes in Water Technology (OxProcess)	5	none	Oxidative Processes	2	1			5	none	Written or oral Exam and Presentation
2	Stable Isotope Analysis (SIA)	9	none	Stable Isotope Analysis	2	1			5	none	Written exam/ Presentation
				Practical Course			3	4	none	Written reports	

2 3	Technical Engineering Water (TechEngWater)	9	none L Technical Engineering Water	Technical Engineering Water Practical Course	2	1		5 4	none none	Written or oral Exam Written exam
1 or 3	Wastewater Treatment (WWT)	5	none	Wastewater Treatment	2	1		5	none	Written exam
1 or 3	Nanoparticle and Colloids (Nano)	5	none	Nanoparticle and Colloids	2	1		5	none	Written or oral exam
1, 2 or 3	Nano-Biophotonik (NABIP)	5	none	Nano-Biophotonik-Lecture Nano-Biophotonics - block internship and methods course	2		1	5	none	Written exam
2	Advanced Gas Chromatography (Adv GC)	2	none	Advanced Gas Chromatography	1			3	none	Written or oral exam
*		Additional to the list of optional courses students may choose any offered module from the M.Sc. Chemistry that is not already part of the Water Science curriculum. In the case of doubt the examination committee decides on the acceptance.								
Optional Courses MTW3		Out of the Master's Programme Management and Technology of Water and Wastewater (MTW3) students may choose any offered module that is not already part of the Water Science curriculum (Admission to modules needs to be arranged with the individual lecturers and may be limited to a certain number of students.)								
Optional Courses EnviTox		Out of the Master's Programme Environmental Toxicology (EnviTox) students may choose any offered module that is not already part of the Water Science curriculum (Admission to modules needs to be arranged with the individual lecturers and may be limited to a certain number of students.)								

First Term	HPW	Cr	Exam
Chemometrics and Statistics	3	5	1
Environmental Microbiology	3	5	1
Water Chemistry	3	5	1
Optional Courses		15	2-3
Environmental Chemistry: Soil/Waste	3	5	1
Environmental Chemistry: Poll			
Membrane Technologies	2	3	1
Waste Water Treatment	3	5	1
Nanoparticle and Colloids	3	5	1
Excursions	1-5	1-5	
Sum		30	5-6
Second Term	HPW	Cr	Exam
Applied AnaC	3	5	1
Env-MiBi-P	9	7	
Applied Microbiology	4	6	1
Optional Courses		12	2-3
Advanced Mass Spectrometry	2	3	1
Quality Management	2	3	
Metrology in Chemistry	1	2	1
Oxidative Processes	3	5	1
Stable Isotope Analysis	6	9	1
Technical Engineering Water	3	5	1
Nano-Biophotonik	3	5	1
Advanced Gas Chromatography	1	2	1
Microbial Biotechnology	2	3	1
Microbial Physiology and Biotechnology	8	7	
Excursions	1-5	1-5	
Sum		30	4-5

Third Term	HPW	Cr	Exam
AnaC-P	15	10	
Research-P	15	10	
Optional Courses		5	1
Environmental Chemistry: Pollutants	3	5	1
Environmental Chemistry: Soil/Waste	3	5	1
Project Management	2	3	1
Membrane Technologies	2	3	1
Technical Engineering Water-Practical Course	3	4	
Waste Water Treatment	3	5	1
Nanoparticle and Colloids	3	5	1
Ecology and Bioinformatics	8	7	
Excursions	1-5	1-5	
Sum		30	2
Fourth Term	HPW	Cr	Exam
Master-Arbeit	0	30	1
Sum		30	1
Total Sum		120	11-12

Dates and Deadlines Winter Semester 2018/19

Beginning of semester (administrative)	1.10.2018
End of semester (administrative)	31.03.2019
Beginning of lectures/classes	08.10.2018
End of lectures/classes	01.02.2019
Christmas Holidays 21.12.2018 - 04.01.2019	

Dates and Deadlines Summer Semester 2019

Beginning of semester (administrative)	1.04.2019
End of semester (administrative)	30.09.2019
Beginning of lectures/classes	01.04.2019
End of lectures/classes	12.07.2019
Pentecost/Whitsun: 11.06.2019	
The dates and deadlines include both the first and last days of the given periods.	

Impressum

University of Duisburg-Essen

Faculty of Chemistry

Editorial: Dr. Jolanta Polkowska

Phone: +49 201/183-6215

E-Mail: chemie@uni-due.de; water-science@uni-due.de

Update: 26.09.2018

The general information on the University has been provided by the International Office of the University of Duisburg-Essen (<http://www.uni-due.de/en/>).

