



**AGREEMENT ON THE DOUBLE DEGREE PROGRAMME
“ELECTRONIC ENGINEERING” – “LM 29 INGEGNERIA ELETTRONICA” (UNIUD)
AND “L 066 488 – INFORMATION AND COMMUNICATIONS ENGINEERING” (UNI-KLU) –
MASTER LEVEL**

between

University of Udine (UNIUD), represented by its Rector Prof. Alberto Felice De Toni, with legal domicile at University of Udine, Via Palladio n. 8, 33100 Udine (Italia), fiscal code 80014550307,

and

Universität Klagenfurt (UNI-KLU), represented by its Vice-Rector for Education Ass.-Prof. Dr. Doris Hattenberger, with legal domicile at Universität Klagenfurt, Universitätsstraße 65-67, 9020 Klagenfurt am Wörthersee (Austria);

PREAMBLE

This Double Degree Agreement stems from the desire of its signatories, the two institutions mentioned above, to set up and develop a system of academic exchange in the spirit of European cooperation. This European awareness, present in both academic institutions, forms the basis for them to cooperate in their dual sphere of teaching and research within the framework of existing and future programmes promoted by the European Commission.

Hence, Universität Klagenfurt (UNI-KLU) and University of Udine (UNIUD) have decided to institute an exchange of students that will culminate in the awarding of a Double Degree Diploma of both institutions under the conditions specified hereunder.

The Italian Ministerial Decree n. 270 of 22 October 2004 on “Modifications to the regulations about norms concerning the didactic autonomy of the Universities, approved by means of the decree of the Minister of University and Scientific and Technological Research 3 November 1999, n. 509” provides in art. 3, paragraph 10, that on the base of appropriate agreements, the Italian universities can award degrees jointly with other Italian or foreign universities.

For Austrian universities the legal basis for awarding degrees jointly with foreign universities is established in the Federal Act on the Organisation of Universities and their Studies (Universities Act 2002 – UG) Section 51 Para. 2 Clause 26 and Section 54d.

Both partners agree to respect the laws and regulations in force in the two countries.

Furthermore, the Parties undertake to comply with the 2016/679 EU regulation (GDPR) concerning the protection of individuals with regard to the processing of personal data. The parties undertake to process data exclusively for the purposes identified in the Agreement.

1. Definitions

Within the framework of this Double Degree Agreement

- **“Home Institution”** refers to the institution at which a student is formally enrolled as a degree candidate;
- **“Host Institution”** refers to the institution that has agreed to receive students from the Home Institution for a period of study;
- **“UNIUD Study Programme”** corresponds to the master’s degree programme **“Electronic Engineering” – “LM 29 Ingegneria Elettronica”**, of University of Udine, Polytechnic Department of Engineering and Architecture (DPIA).

- **“UNI-KLU Study Programme”** corresponds to the master’s degree programme **“L 066 488 – Information and Communications Engineering (ICE)”** of Universität Klagenfurt, Faculty of Technical Sciences.
- **“Double Degree Diploma”** corresponds to the master’s degree certificate, the notice of award (“Verleihungsbescheid” or “Certificato di Laurea Magistrale”), and the diploma supplement according to art. IX.3 of the Lisbon Recognition Convention of 11 April 1997 issued by the DD students’ Home Institution in combination with the notice of award (“Verleihungsbescheid” or “Certificato di Laurea Magistrale”), and the diploma supplement issued by the DD students’ Host Institution.

2. Objectives

UNIUD and UNI-KLU have agreed to pursue a collaboration in university training with the final aim to confer the master’s degree **“L 066 488 – Information and Communications Engineering” (UNI-KLU)** and **“Electronical Engineering” – “LM 29 Ingegneria elettronica” (UNIUD)**. Upon the successful fulfilment of the requirements and conditions set forth in this document and its appendices, this agreement provides students of UNIUD study programme and students of UNI-KLU study programme with the opportunity of receiving both the academic degree of the Home Institution and the legal effects of the corresponding academic degree of the Host Institution. In particular, upon successful fulfilment of the conditions set forth in this agreement, students of UNI-KLU shall be awarded the degree **“Diplom-Ingenieurin”** or **“Diplom-Ingenieur”**, and the legal effects of the degree **“Laurea Magistrale”** of UNIUD. Students of UNIUD shall, upon successful fulfilment of the conditions set forth in this agreement, be awarded the degree **“Laurea Magistrale”** and the legal effects of the degree **“Diplom-Ingenieurin”** or **“Diplom-Ingenieur”** of UNI-KLU.

3. Fundamental Principles

Both UNI-KLU and UNIUD shall

- a) respect in full the principles of non-discrimination and ensure equal access and opportunities to mobile participants from all backgrounds,
- b) publish and regularly update the course catalogue on the website of the institution well in advance of the mobility periods, so as to be transparent to all parties and allow mobile students to make well-informed choices about the courses they will follow, and
- c) provide assistance, when required, in securing visas and obtaining insurance for incoming and outgoing students as well as to guide incoming students in finding accommodation.

4. Candidates for the Double Degree (DD) Programme

- a) Students registered as master’s degree candidates at respective UNIUD or UNI-KLU study programmes shall have access to the DD programme. Further details on entry requirements are pointed out in Appendix A.
- b) Interested master’s degree candidates shall be screened for eligibility for admission as DD students by their Home Institution. The Home Institution shall respect the admission requirements and enrolment constraints of the Host Institution.
- c) DD students are to be nominated by their Home Institution. This nomination shall replace the evidence of university entrance qualification and the legalisation. Only students with very good standing at their Home Institution may be nominated for this programme. Details of nomination are pointed out in Appendix A.
- d) DD students shall be subject to the standard rules, regulations and enrolment constraints of the Host Institution. They shall register at the Host Institution for those parts of the study programme, which are to be carried out under the responsibility of the Host Institution and shall stay registered at both the Home and the Host Institution until graduation. In terms of registration procedure, DD students shall be granted all privileges for incoming students enrolled at the Host Institution in the framework of bilateral “mobility programmes”.
- e) The Host Institution will charge no fees to incoming students for tuition, registration, examinations, or access to laboratory and library facilities. On the basis of reciprocity, the

Host Institution shall waive tuition fees for DD students for three (3) semesters. If applicable, DD students will continue to pay tuition fees to their Home Institution during this study period.

- f) Fees at the Host Institution may arise for special programmes, which are not part of the master's degree "L 066 488 – Information and Communications Engineering" and "LM 29 – Electronic Engineering". Pursuant to § 91 of the Universities Act (Universitätsgesetz, UG) and § 38 of the Union of Students Act 2014 (HochschülerInnen- und Hochschülerschaftsgesetz 2014, HSG 2014), membership to the Austrian National Union of Students (ÖH) is compulsory and ÖH membership fees must be paid by all students, including those whose tuition fees are waived.
- g) For the first year of the agreement a maximum of five (5) students will be exchanged in both directions. This number will be reviewed according to the interest shown in the DD programme. Further details are pointed out in Appendix A.

5. Courses, Exams, and Theses

- a) Exams for individual courses shall follow the rules of the institution where the respective course was audited and is examined. Details about courses to be audited and examined during mobility periods are pointed out in Appendices B and C.
- b) DD master theses have to be registered at the DD students' Home Institution and shall be supervised jointly by both the Home and Host Institution. For that reason, each DD student shall choose one main supervisor of one institution, and shall be assigned a second supervisor of the other institution.
- c) The master's examination shall be organised under the responsibility of and in accordance with the University Statutes and the respective guidelines of the DD students' Home Institution, which are pointed out in Appendix B.

6. Conditions for Obtaining the Double Degree Diploma

- a) The DD master's degree certificate shall only be awarded after the DD students have acquired a **minimum of 30 and a maximum of 60 ECTS credit points** under the responsibility of the Host Institution, and have successfully completed both DD master thesis and DD master's examination.
- b) After the completion of the DD master's examination, the Home Institution shall issue the master's degree certificate, the notice of award ("Verleihungsbescheid" or "Certificato di Laurea Magistrale"), and a diploma supplement according to art. IX.3 of the Lisbon Recognition Convention of 11 April 1997. After having received confirmation of the successful completion of the master's examination from the Home Institution, the Host Institution shall issue the notice of award ("Verleihungsbescheid" or "Certificato di Laurea Magistrale") and the diploma supplement. The diploma supplements of both institutions should include an indication that the completed study programme is a Double Degree Programme and that the master candidate obtains the right to hold one master degree.

7. Reimbursements

Each institution shall make genuine efforts to find resources so as to cover totally, or at least partially, the expenses of its DD outgoing students (e.g.: Erasmus+ grants, etc.).

8. Programme Coordination and Student Counselling

- a) Each institution will nominate a programme coordinator to ensure that the DD programme proceeds according to a reasonable schematic plan and that the terms of this agreement are carried out. Programme coordinators will ensure that a substitute or replacement for them is named.
- b) Each programme coordinator will ensure that the partner institution has all necessary information available for the promotion of the programme. They shall meet physically or in a video conference at least once a year in order to review the effectiveness of the teaching programmes, and propose further actions.

9. Resolution of Conflicts

The parties agree to solve in a friendly manner any dispute arising out of or in connection with the present agreement, including the validity, interpretation, implementation, and effect of it. In the event that the disagreement cannot be resolved, the issue(s) will be submitted for arbitration; each party will appoint a member of the arbitration panel, and one member will be chosen by mutual consent.

10. Duration, Amendment, Review, and Termination of Agreement

The extension term shall commence concurrently with the expiration of the initial term, upon which this Double Degree Agreement will be binding upon the two parties for a period of three (3) years. In the absence of substantial changes, this Double Degree Agreement may be renewed at the same conditions and for the same period by a written agreement between the two parties.

In case of changes in the course offer due to changes of underlying curricula of either institution, Appendices B and C of the Double Degree Agreement have to be modified accordingly.

The agreement may be terminated at the request of either institution, provided such request is made in writing at least twelve months before renewal is to become effective. Any termination of the agreement must take into account the rights of students already participating in or accepted for any exchange to complete the parts of the study programme, which will be carried out under the responsibility of the Host Institution.

An evaluation of this agreement shall be initiated by both institutions at least twelve months prior to its expiration to ascertain, whether the programme should be continued and, if so, how it might be improved. The agreement shall be subject to revision or modification after proper evaluation by mutual written agreement.

11. Support of the Double Degree Programme

Universität Klagenfurt and University of Udine shall take joint action to involve governments and the European Commission to secure financial aid for this programme. In order to promote joint actions in education and research, both University of Udine and Universität Klagenfurt shall encourage:

- the exchange of students,
- the exchange of university staff and researchers (in accordance with the regulations and procedures in force at both institutions),
- the organisation of joint study sessions, workshops, and seminars.

12. Waiver of Financial Obligations

The signing of this agreement does not entail any financial obligation for either party.

For Universität Klagenfurt

Vice-Rector for Education



Ass.-Prof. Dr. Doris Hattenberger

Klagenfurt, the 7.8.2019

For University of Udine

Rector



Prof. Alberto Felice De Toni

Udine, the 24.06.2019

Appendix A

to the Agreement on the Double Degree Programme “**Electronic Engineering**” – “**LM 29 – Ingegneria Elettronica**” (UNIUD) and “**L 066 488 – Information and Communications Engineering**” (UNI-KLU) – **Master Level**

Prerequisites

Nomination of Candidates

The Home Institution will nominate only students that have already obtained their bachelor's degree (or an equivalent degree) and have been admitted to the master's degree programme at the Home Institution.

Students interested in the DD Programme shall be screened for eligibility for admission by the Home Institution. The Home Institution shall respect the admission requirements and enrolment constraints of the Host Institution. The selection of nominees will be based on their academic results, i.e., nominated students shall be of very good standing at their Home Institution. Further, good command of the English language and/or the language(s) of the host country (German or Italian) are important side conditions.

In order to be admitted to the DD Programme, candidates from UNIUD must hold a three-year degree in the classes (ex DM 270/04) L-08 (Information Engineering), or the corresponding first-level degree regulated by DM 509/99 (or equivalent).

Candidates from UNI-KLU must hold an undergraduate academic degree (BSc.) in “Information Technology (German: Informationstechnik)” or “Information and Communications Engineering” (or equivalent).

1. Quota

Every year a maximum of five (5) students per institution will be admitted to the Double Degree Programme. The Host Institution will waive tuition fees for these five (5) students for a maximum of three (3) semesters.

The quota of DD students per academic year will be subject to observation and review. In case the above number proves inadequate, it might be changed by written agreement signed by the respective rector (or vice-rector in charge) of both institutions.

Students exceeding the stipulated quota will not partake in the Double Degree Programme but will have the possibility to be normally enrolled at each institution as regular degree-seeking international students.

2. Procedural Requirements

The student nomination for the DD Programme shall take place in two phases:

- a) At least four (4) months prior to the beginning of the mobility period, the Home Institution shall inform the Host Institution about the number of students to be nominated.
- b) After nomination, copies of the nominees' documents shall be sent to the Host Institution at the latest one (1) month before the start of the mobility period.

3. Preparatory Steps

Each nominated student has to be formally registered at the Host Institution.

Prior to the start of the mobility period, DD students are required to choose courses at the Host Institution and, if applicable, complete a Learning Agreement. The process of selecting courses shall be carried out under the supervision of the programme coordinators and with the approval of the programme directors for the respective master's degree programmes of both the Home and the Host Institution.

Appendix B

to the Agreement on the Double Degree Programme “**Electrical Engineering**” – “**LM 29 – Ingegneria Elettronica**” (UNIUD) and “**L 066 488 – Information and Communications Engineering**” (UNI-KLU) – Master Level

Courses, Exams, Master Theses and Master’s Examinations

1. ECTS Credit Points and Exam Grading

The DD Programme joining the master’s degree programme “**Electrical Engineering**” – “**LM 29 – Ingegneria Elettronica**” (UNIUD) and the master’s degree programme “**L 066 488 – Information and Communications Engineering**” (UNI-KLU) comprises 120 ECTS credit points.

The semesters of the master’s degree programme spent at either Home or Host Institution shall be fully recognised. Exams of courses taken at the Host Institution shall be considered as equivalent to exams taken at the Home Institution.

For each exam, the grading achieved at the Host Institution shall be converted by the Home Institution according to the ECTS grading scale as defined by the European Commission.

The students nominated for the DD Programme shall acquire at least 30 ECTS credit points at the Host Institution. At most 60 ECTS credit points acquired at the Host Institution can be recognised for the degree programme at the Home institution. Subjects and course designations are specified in Section 2.

2. Course Offer at the Host Institution

The languages of instruction will be Italian, German and English.

The courses eligible for the DD master’s degree programme may change with time according to the policy of either institution. In any case, each institution will make sure that the course catalogue is published well in advance and will guarantee an adequate course offer to facilitate the students’ selection. For each academic year, the DD programme coordinators will provide a list of available courses for DD students.

Students are required to clarify the details of the courses to be pursued at the Host Institution before the start of the semester with the programme coordinator of the Home Institution. Students are strongly recommended to apply for recognition of the courses at the Host Institution to the programme director for the master’s degree programme in advance. Courses and exams taken at the Host Institution will be recognised in accordance with the respective guidelines and procedures at the Home Institution.

2.1 Students from University of Udine

During their stay at UNI-KLU, UNIUD students shall select two specialisation areas from the master’s degree programme “**L 066 488 – Information and Communications Engineering**” from the following list:

Networks and Communications (NC): The courses shall be selected from the official catalogues (see lists filled in the official study management system of UNI-KLU (German abbreviation: “ZEUS”)) related to the Subjects “NC-Fundamentals” and “NC-Advanced”, which belong to the following areas:

- “Mobile and Wireless Systems” (MWS),
- “Pervasive Computing” (PC),
- “Embedded Communications and Signal Processing” (ECSG),
- “Media Engineering” (ME)
- “Smart Grids” (SG)

Autonomous Systems and Robotics (ASR): The courses shall be selected from the official catalogues (see lists filled in the official study management system of UNI-KLU (German abbreviation: "ZEUS")) related to the Subjects "ASR-Fundamentals" and "ASR-Advanced", which belong to the following areas:

- "Intelligent Transportation Systems" (ITS),
- "Sensors and Actuator Technologies" (SAT)
- "Control of Networked Systems (CNS)",
- "Media Engineering" (ME)
- "Smart Grids" (SG)

Courses in total of at least 24 ECTS credits from the two selected specialisation areas must be pursued.

The remaining courses required to reach the minimum requirement of 30 ECTS credits are to be selected from the master's degree programme "L 066 488 – Information and Communications Engineering" of Universität Klagenfurt.

2.2 Students from Universität Klagenfurt

During their stay at UNIUD, UNI-KLU students shall select two specialisation areas from the master's degree programme "LM 29 – Ingegneria Elettronica" from the following list:

- "Microelectronics"
- "Telecommunications"
- "Industrial automation and robotics"
- "Computer sciences and networking"

Courses in total of at least 24 ECTS credits from the four selected specialisation areas must be pursued.

The remaining courses required to reach the minimum requirement of 30 ECTS credits are to be selected from the master's degree programme "LM 29 – Ingegneria Elettronica" of the University of Udine.

Courses completed at the University of Udine can be recognised for courses of one or more of the following subjects of the Master programme "L 066 488 – Information and Communications Engineering" (UNI-KLU):

- ASR Advanced or NC-Advanced
- ICE-Supplements
- TE-Complements

3. Registration of Master Theses and Master's Examinations

At the end of the master's degree programme, each DD student shall produce a master thesis (equivalent to 30 ECTS credit points at UNI-KLU and 15 ECTS credit points at UNIUD) written in English.

The master thesis will be registered at and supervised by the Home Institution. The student will receive methodological guidance on the elaboration of the master thesis from both Home and Host Institution. DD students shall choose one main supervisor from the institution where the thesis work is carried out and shall be assigned a second supervisor from the other institution. Both supervisors should be members of the examination board for the master's examination. Supervisors may join the examination board by teleconferencing.

The Home Institution shall thus be responsible for

- a. the registration of the master thesis (this also applies in the event that the main supervisor is from the Host Institution),

- b. the submission of the master thesis (this also applies in the event that the main supervisor is from the Host Institution),
- c. the registration for the master's examination and verification of the prerequisites (this also applies in the event that the master's examination is scheduled to take place locally at the Host Institution), and for
- d. conducting the master's examination.

The master's examination is to be conducted in accordance with the respective statutory requirements and guidelines of the Home Institution.

The final grade will be based on the DD student's career and the master's examination. After the master's examination, the Home Institution shall issue a protocol summarising the examination procedure, the master's degree certificate, the notice of award ("Verleihungsbescheid" or "Certificato di Laurea Magistrale"), and a diploma supplement according to art. IX.3 of the Lisbon Recognition Convention of 11 April 1997. After having received confirmation of the successful completion of the master's examination from the Home Institution, the Host Institution shall issue the notice of award ("Verleihungsbescheid" or "Certificato di Laurea Magistrale") and the diploma supplement.

Appendix C

to the Agreement on the Double Degree Programme “**Electrical Engineering**” – “**LM 29 – Ingegneria Elettronica**” (UNIUD) and “**L 066 488 – Information and Communications Engineering**” (UNI-KLU) – **Master Level**

The courses in Table 1 and Table 2 are example courses. Their appearance in the list does not mean that they are offered in each semester. Some of them are offered in the spring semester, other ones in the winter semester. The actual list of offered courses can be found in the web pages of the two universities.

Courses

Universität Klagenfurt: Specialisation Areas

Table 1: Examples of courses offered by Universität Klagenfurt, Master degree “Information and Communications Engineering”, Faculty of Technical Sciences

<i>Course</i>	<i>Specialization areas</i>	<i>ECTS</i>	<i>Semester</i>
Transportation Telematics Advances: cooperative systems, automation, and	ASR	4	Fall
Nonlinear Dynamics -- Modeling, Simulation and Neuro-Computing	ASR	4	Fall
Robotics Fundamentals	ASR	4	
Data Mining and Neurocomputing	ASR	4	Fall
Smart Cities - Technology, Management & Governance	ASR	4	Fall
CAE of Mechatronic Systems I	ASR	4	Fall
Measurement Signal Processing	ASR	4	Fall
Vision Based State Estimation and Sensor Fusion	ASR	4	Fall
Nonlinear Systems: Analysis and Control	ASR	4	Fall
Control of Autonomous Systems	ASR	4	Spring
Sensors and Actuators	ASR	4	Spring
Robust Design and Reliability	ASR	4	Spring
Machine Learning in Intelligent Transportation	ASR	4	Spring
Transportation Telematics I	ASR	4	Spring

Power Line Communications	NC	4	Fall
Signal Processing for Communications	NC	4	Fall
Pervasive Computing	NC	4	Fall
Mobile Communications	NC	4	Fall
Seminar on Self-Organizing Systems	NC	4	Fall
Wireless Networks	NC	4	Spring
Simulation of Networked Systems	NC	4	Spring
Smart Grids	NC	4	Spring

University of Udine: Specialisation Areas
Table 2: Examples of courses offered by the University of Udine, Master degree in Electrical Engineering

Course	Specialization area	ECTS	Semester
ELECTRIC DRIVES FOR MODERN/DEMANDING APPLICATIONS	Industrial automation and	6	Spring
MODELING AND CONTROL OF ELECTRIC MACHINES AND DRIVES	Industrial automation and	6	Spring
INDUSTRIAL ELECTRONICS	Industrial automation and	6	Spring
POWER ELECTRONICS	Industrial automation and	6	Spring
COMPUTERS DESIGN AND OPERATING SYSTEMS	Computer sciences and networking	6	Spring
ELECTRONIC SYSTEMS DESIGN	Computer sciences and networking	6	Spring
DATA ANALYTICS	Computer sciences and networking	6	Fall
ELECTRONIC CIRCUITS FOR HIGH FREQUENCIES	Microelectronics	6	Fall
PARALLEL ARCHITECTURES	Microelectronics	6	Spring

DEVICES AND CIRCUITS WITH ENERGY EFFICIENCY FOR IOT APPLICATIONS	Microelectronics	6	Fall
ANTENNAS	Telecommunications	6	Spring
MICROWAVE	Telecommunications	6	Spring
TELECOMMUNICATION SYSTEMS	Telecommunications	6	Spring
WIRELESS COMMUNICATIONS	Telecommunications	6	Spring
ELECTRONIC DEVICES AND COMPONENTS	All areas	6	Fall
ELECTRONIC INSTRUMENTATION AND SENSORS	All areas	6	Fall
ELECTRICAL AND ELECTRONIC MEASUREMENTS	All areas	6	Fall
ADVANCED DIGITAL CONTROL SYSTEM FOR ELECTRICAL ENERGY CONVERSION	All areas	6	Spring
ITC LABORATORY	Interdisciplinary	6	Spring