Diploma Supplement

OSLO METROPOLITAN UNIVERSITY
STORBYUNIVERSITETET

This Diploma Supplement model was developed by the European Commission, Council of Europe and UNESCO/CEPES. The purpose of the supplement is to provide sufficient independent data to improve the international 'transparency' and fair academic and professional recognition of qualification (diplomas, degrees, certificates etc.). It is designed to provide a description of the nature, level, context, content and status of the studies that were pursued and successfully completed by the individual named on the original qualification to which this supplement is appended. It should be free from any value judgements, equivalence statements or suggestions about recognition. Information in all eight sections should be provided.

Where information is not provided, an explanation should give the reason why.

1   INFORMATION IDENTIFYING THE HOLDER OF THE QUALIFICATION

1.1   Family name(s):   Ramzan
1.2   Given name(s):   Sana
1.3   Date of birth *(day/month/year)*:   15-04-1986
1.4   Student identification number or code: 340025

2   INFORMATION IDENTIFYING THE QUALIFICATION

2.1   Name of qualification and (if applicable) title conferred (in original language):
Master's Degree in Applied Computer and Information Technology
The title master is protected by law in Norway.

2.2   Main field(s) of study for the qualification:
Cloud-based services and operations

2.3   Name and status of awarding institution (in original language):
OsloMet - storbyuniversitetet, a public university. The quality assurance system was evaluated and approved by the Norwegian Agency for Quality Assurance in Education in 2015.

2.4   Name and status of institution administering studies:
See section 2.3

2.5   Language(s) of instruction/examination:
English

3   INFORMATION ON THE LEVEL OF THE QUALIFICATION

3.1   Level of qualification:
Second Cycle/Level 7, Norwegian Qualifications Framework for Lifelong Learning

3.2   Official length of the programme:
2 years in full-time mode (120 ECTS credits)

3.3   Access requirements:
3-year bachelor's degree relevant to the chosen specialisation in the master's program. Some specialisations require that specific courses are a part of the undergraduate degree. Selection is based on grades (minimum C) and fulfilled language requirement.

4   INFORMATION ON THE CONTENTS AND RESULTS GAINED

4.1   Mode of study:

Full-time

4.2   Programme requirements:

On successful completion of their Master's degree, the candidate should have the following qualifications defined in knowledge, skills and general competence:

Knowledge
Upon successful completion of the program, the candidate:
- has thorough knowledge of the professions within applied computer and information technology and their role in businesses, organizations and society
- has a thorough knowledge of the processes and methodologies applied by professional practitioners within fields like information technology, scientific computing and electrical engineering or a combination of these traditional fields, both in public and private sector
- has an advanced understanding of how technological advances in society are alloys of multiple disciplines, such as Mathematics, Computer Science, Electrical engineering and more
- has a fundamental understanding of a secondary field within applied computer and information technology and its role in organizations and society
- has thorough experience in interdisciplinary work and how it contributes to solving complex problems
- can apply knowledge to new areas within their academic field
- can analyze academic problems within their area of research based on its methods, tradition and role in society

Skills
Upon successful completion of the program, the candidate:
- can contribute to innovation processes in applied computer and information technology by harnessing knowledge and skills from a research discipline, such as computer science, electrical engineering or mathematics, and directing them towards an interdisciplinary problem
- can facilitate, nourish and cultivate interdisciplinary perspectives in projects
- can design and implement technical solutions to challenges that represent modern and real-life scenarios
- can translate abstract theoretical models or technical descriptions into working solutions and systems, relative to their area of focus
- can analyze existing theories, methods and interpretations in their field and work independently on practical and theoretical problems
- can use relevant methods for research, scholarly and development work within their field in an independent manner
- can carry out independent research or development project within their field under supervision and in accordance with applicable norms for research ethics
- can identify and communicate common facets and challenges within their field to professionals from other fields
- can deploy, use and manage systems and technical tools that in complexity and scale represent enterprise scenarios
- can independently update their knowledge as technology progresses to new areas within society

General Competence
Upon successful completion of the program, the candidate:
- can appreciate why evaluating a technological challenge beyond the perspective of a single discipline is needed in the pursuit of a safe, inclusive and responsible technologically advanced society
- can analyze relevant academic, professional and research ethical problems in applied computer and information technology
- can apply his/her knowledge and skills in new areas in order to carry out advanced assignments in the realm of technology
- can communicate extensive independent work and masters language and terminology of their own academic field or an interdisciplinary field
- can communicate about academic and professional issues, analyses and conclusions in their field, both with specialists and the general public
- can contribute to new thinking and innovation processes

4.3   Programme details:

Name: Sana Ramzan

Course		Semester	Credits	Grade	Grade distribution A B C D E
ACIT4410	Agile Service Delivery and Developer Operations	2019 autumn	10	D	
ACIT4090	Globalisation of Technology	2020 spring	10	B	
ACIT4100	Research methods and Ethics	2020 spring	10	E	
ACIT4200	Interdisciplinary Innovation: using diversity to solve complex problems	2020 spring	10	Pass	
ACIT4420	Problem-solving with scripting	2020 spring	10	C	
ACIT4040	Applied Artificial Intelligence Project	2020 autumn	10	C	
ACIT4080	Intelligent User Interfaces	2020 autumn	10	C	
ACIT4910	User Diversity and ICT Barriers	2020 autumn	10	E	
ACIT4430	Infrastructure Services and Operations	2021 autumn	10	E	
ACIT5900	Master's Thesis *A career in ICT, a study comparing aspirations of men and women*	2022 autumn	30	D	

Total: 120.0

Credit system and grading

The academic year normally runs from mid-August to mid-June and lasts for 10 months. Courses are measured in "studiepoeng", considered equivalent to the European Credit Transfer System standard (ECTS credits). The full-time workload for one academic year is 1500 - 1800 hours of study / 60 "studiepoeng".

The Norwegian grading system consists of two grading scales: one scale with the grades pass or fail and one graded scale from A to E for pass and F for fail. The graded scale has the following qualitative descriptions:

A	Excellent	An excellent performance, clearly outstanding. The candidate demonstrates excellent judgement and a very high degree of independent thinking.
B	Very good	A very good performance. The candidate demonstrates sound judgement and a high degree of independent thinking.
C	Good	A good performance in most areas. The candidate demonstrates a reasonable degree of judgement and independent thinking in the most important areas.
D	Satisfactory	A satisfactory performance, but with significant shortcomings. The candidate demonstrates a limited degree of judgement and independent thinking.
E	Sufficient	A performance that meets the minimum criteria, but no more. The candidate demonstrates a very limited degree of judgement and independent thinking.
F	Fail	A performance that does not meet the minimum academic criteria. The candidate demonstrates an absence of both judgement and independent thinking.

The assessment is criterion referenced.

Grade distribution

The distribution of grades is shown by the percentage for courses using the graded scale A – F. Fail (F) is not included in the distribution. All results from the last five years are included in the calculation. The distribution is also shown for courses that have been active for less than five years. There has to be at least 10 approved results during the period.

4.4   Grading scheme and, if available, grade distribution guidance:
See section 4.3

4.5   Overall classification of the qualification (in original language):
Not applicable

5   INFORMATION ON THE FUNCTION OF THE QUALIFICATION

5.1   Access to further study:
The master's degree is at an academic level that is sufficient for application to relevant third cycle studies.

5.2   Professional status:
Not applicable

6   ADDITIONAL INFORMATION

6.1   Additional information:
Not applicable

6.2   Further information sources:
OsloMet - Oslo Metropolitan University: http://www.oslomet.no
NOKUT: the Norwegian Agency for Quality Assurance in Education: http://www.nokut.no/en/

7   CERTIFICATION OF THE SUPPLEMENT

7.1   Date: 30 September 2022
       Date of original qualification: 27 September 2022

7.2   Signature: The document is electronically signed by Sikt - Norwegian
                                             Agency for Shared Services in Education and Research. The
                                             document is only valid in its original electronic form with the
7.3   Capacity: accompanying electronic signature. Time for signing
                                             document 2022-09-30 11:51
7.4   Official stamp:

Higher education in Norway: Legislature

The Ministry of Education and Research has the overall responsibility for higher education in Norway. Higher education is offered by four types of higher education institutions: university *(universitet)*, specialized university institution *(vitenskapelig høyskole),* accredited university college *(akkreditert høyskole),* and university college with accredited study programmes *(høyskole med akkrediterte studier).* The differences between the types of higher education institutions are related to their self-accrediting authority.

All public and private higher education in Norway is subject to the Act Relating to Universities and University Colleges (Lov 2005-04-01 nr 15). An institution's right to award specific degrees and the prescribed lengths of study are codified in Regulation concerning degrees and titles (FOR 2005-12-16 nr 1574). The awarding of master's degrees is regulated by the Regulations on requirements for awarding a master's degree (FOR 2005-12-01 nr 1392).

Since 2002 Norway has adhered to the objectives of the Bologna Process in the European Higher Education Area. Most of the elements have been implemented through the reform of the Norwegian higher education system carried out in 2003. Central to the reform has been a transition from the former degree system to the bachelor's, master's and doctoral degree structure, with a few exceptions.

Norwegian higher education qualifications make up the levels from 6 to 8 of the Norwegian Qualifications Framework for Lifelong Learning (NQF) from 2011, which is the national overarching qualifications framework[1]. It describes the levels of qualifications as defined by the total learning outcomes in terms of the knowledge, skills and general competence that graduates at various levels should have achieved[2].

NQF was referenced to the European Qualifications Framework (EQF) in 2014.

Quality assurance and accreditation of institutions and programmes

The Norwegian Agency for Quality Assurance in Education (NOKUT) is an autonomous governmental agency which provides external supervision and control of the quality of Norwegian higher education, as well as of all tertiary vocational education[3]. NOKUT accredits new study programmes, controls the existing ones, and provides a cyclic evaluation of the institutions' quality assurance systems for educational provision.

An accredited higher education institution is granted the right to offer educational provision, without having to apply to NOKUT for specific programme accreditation, in accordance with the authority that its institutional category implies:
a) Universities may without external accreditation establish study programmes at all levels.
b) Accredited university colleges have to apply for the accreditation of programmes at master and doctoral levels.
c) In those fields where specialized university institutions and accredited university colleges have the right to award doctorates or corresponding degrees, they may themselves decide which study programmes and disciplines the institution shall provide.

University colleges without institutional accreditation must apply to NOKUT for accreditation of study programmes at all levels.

Lists of all accredited institutions, as well as of all accredited study programmes at the university colleges without institutional accreditation are available on www.nokut.no

Admission requirements
The Higher Education Entrance Qualification is the successful completion of Norwegian upper secondary education with some specified courses. The Certificate of Upper Secondary Education and Training *(Vitnemål for videregående opplæring)* is based on 13 years of schooling.

Admission may also be gained by means of other qualifications recognized as being on a par with the Higher Education Entrance Qualification, such as recognition of prior learning and work experience*.*

Some fields of study have additional entrance requirements.

Academic credit system
All Norwegian higher education institutions use a system of credits *(studiepoeng)* for measuring study activities considered equivalent to the European Credit Transfer and Accumulation System (ECTS). 60 ECTS credits *(studiepoeng)* are allocated to the workload of a full year of academic study, equivalent to 1500-1800 hours of study. 30 ECTS credits are normally allocated to one semester's full-time study. The academic year normally lasts for 10 months and runs from August to June.

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[1] National generic learning outcomes descriptions' levels for the bachelor's, master's and doctoral degrees were defined by the Instructions on the Norwegian Qualifications Framework for Higher Education in 2009.

[2] Learning outcomes for a specific NQF level show the minimum of what each learner should know, understand and be able to do after completing a learning process.

[3] Tertiary vocational education (TVE), level 5 in the NQF (EQF), is provided by *fagskoler,* which are considered as tertiary vocational education institutions. TVE is based on upper secondary education and training or equivalent competence. Courses have duration of from six months to two years. All provisions must be accredited by NOKUT.

Degrees and qualifications

NQF (EQF) Level 6: Bachelor (1st cycle)
Bachelor's degree is awarded after three years of full-time study (180 ECTS). Some bachelor's degrees, in the field of music and performing arts, consist of four-year bachelor's programmes (240 ECTS).
Teacher education for primary and lower secondary school, years 1-7 and years 5-10 has been a four-year professional programme (240 ECTS) prior to its reform on 1 January 2017, when it became a five-year integrated master's degree.
University college graduate *(høyskolekandidat)* is a two-year degree (120 ECTS), a short cycle degree within the first cycle. Holders of this degree may in some cases continue their studies in a bachelor programme and thus obtain a bachelor's degree.

NQF (EQF) Level 7: Master (2nd cycle)
Master's degree is normally obtained after two years of study (120 ECTS), following the completion of a bachelor's degree. A master's degree programme includes independent work (normally a thesis) of between 30 and 60 ECTS.
Experience-based master's degree has a scope of 90 or 120 ECTS (including independent work of at least 20 ECTS).
Integrated master's degree is a five-year study programme (300 ECTS) which results in a master's degree, with no intermediate bachelor's degree. An exception is the Master of Architecture programme at the Oslo School of Architecture and Design, which has a scope of 330 ECTS.
In the fields of medicine, psychology and theology, ***professionally oriented degrees/qualifications*** of six years' duration (360 ECTS) are awarded; in the field of veterinary science - after 5 ½-6 years. They have retained the title/degree c*andidata/candidatus* from the former degree system.

NQF (EQF) Level 8: Doctoral degree (3rd cycle)
Philosophiae doctor *(ph.d.)* is awarded after three years of study, following the completion of a master's degree or a five to six-year professionally oriented degree/qualification.
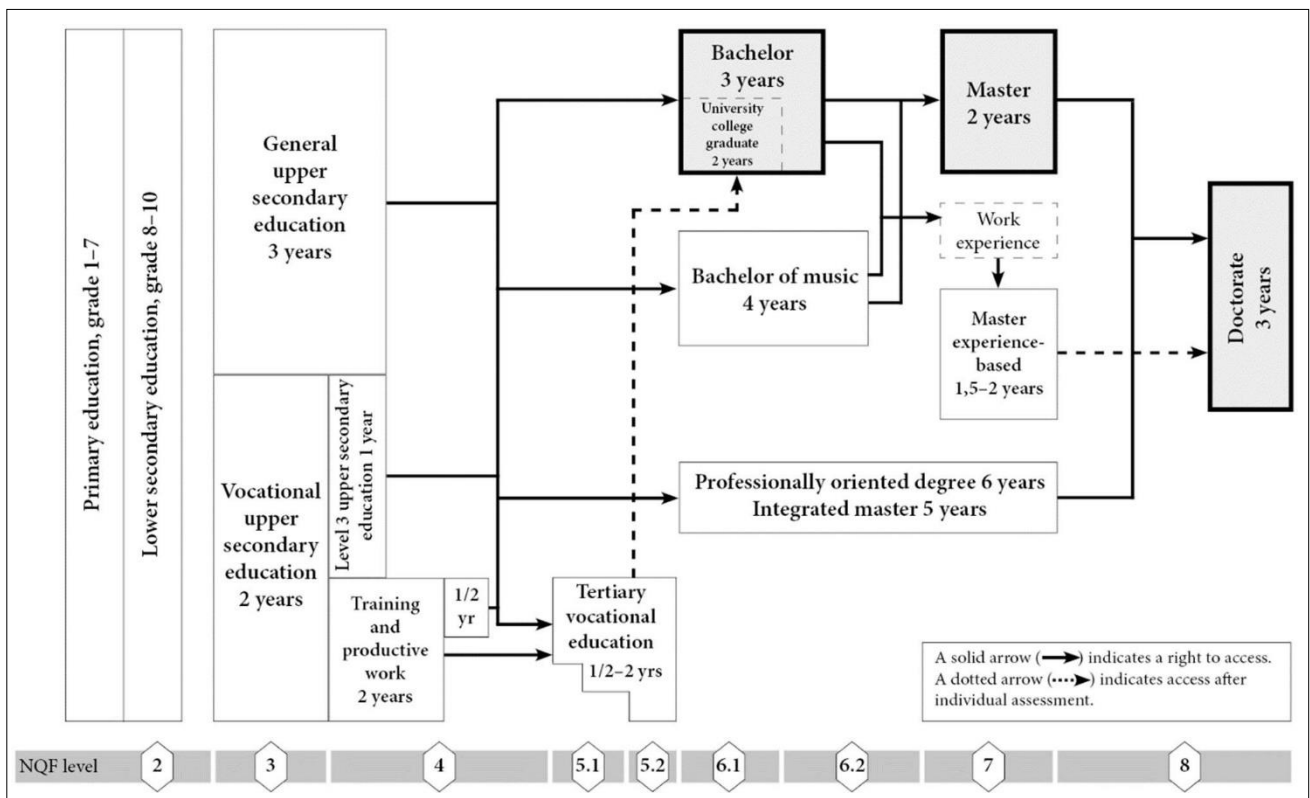***Philosophiae doctor in artistic research***
(ph.d. i kunstnerisk utviklingsarbeid) is awarded after three years of study in the field of creative and performing arts. In 2018, the degree replaced former *Diploma, artistic development programme,* which will be phased out by 2025.
Doctor philosophiae *(dr. philos.)* is conferred on graduates who have qualified for a doctoral degree on their own, without formal research training.

Descriptions of the educational qualifications are given in the Norwegian Qualifications Framework for Lifelong Learning at www.nokut.no/nkr

The Norwegian Education System