

Course Descriptions Bachelor 2023-2024

Course Title	Management Information Systems							
Course Code	BENC2007							
ECTS Credits	5,0							
Assessment	Whole/Half Grades							
Period	Period	Start	End	Mon	Tue	Wed	Thu	Fri
	2	30-10-2023	15-12-2023		X		X	L
Level	no level							
Coordinator	Rick Kaenen, Anant Joshi For more information:r.kaenen@maastrichtuniversity.nl; a.joshi@maastrichtuniversity.nl							
Language of instruction	English							
Goals	<p>After completing this course, students should be able to:</p> <ul style="list-style-type: none">* Explain what the major current and emerging technologies are that are revolutionising business information systems, and their significances* Identify potential pitfalls and trade-offs in the application of emerging IT technologies to business information systems and business intelligence* Critically evaluate uses of cutting-edge IT infrastructures in existing businesses* Assess the current state of design of a business IT infrastructure and recommend strategies for improving it to help businesses achieve their objectives* Fully explain the rationale for solutions suggested to improve business operations through the use of emerging technologies							
Description	<p>The emphasis of this course will be on introducing students to cutting-edge IT infrastructures and enterprise architectures that are leveraged globally by businesses of all sizes. Components of these infrastructures that will be studied include: High Performance Computing (HPC), cloud computing (e.g. Amazon Web Services and Microsoft Azure), edge computing, big data management, data streams, data lakes, data warehouses, blockchain and distributed computing, multiparty computation, Internet of Things (IoT), Industry 4.0, and sensors. We will also examine how the design choices in these infrastructures affect business intelligence, i.e., strategies for applying these technologies to achieve commercial objectives.</p> <p>The course will also cover considerations important for IT managers and Chief Information Officers (CIOs) such as cross-company data collaboration, process management, strategic decision making, data governance and the FAIR (findable, accessible, interoperable and reusable) principles.</p>							
Literature	<ul style="list-style-type: none">* Essentials of MIS, 14th Edition, Pearson global, Kenneth C Laudon, Jane Laudon, 2020, ISBN-13: 9781292342733, e-Book* Ahead in the Cloud: Best Practices for Navigating the Future of Enterprise IT, Author: Stephen Orban, Publisher: CreateSpace Independent Publishing Platform, Publication Date: March 27, 2018, Number of Pages: 334 pages, Language: English, Binding: Paperback, ISBN-10: 1981924310, ISBN-13: 9781981924318* Data governance : how to design, deploy and sustain an effective data governance program, 2nd edition, 2019, John Ladley, ISBN: 9780128158326* Whitepapers, scientific articles, other reading materials and handouts							
Prerequisites								
Keywords								
Teaching methods	PBL / Lecture							
Assessment methods	Written Exam / Assignment							
Evaluation in previous academic year	For the complete evaluation of this course please click http://iwio-sbe.maastrichtuniversity.nl/rapporten.asp?referrer=codeUM							
This course belongs to the following programme / specialisation	Bachelor Business Engineering				Year 2 Elective Course(s)			
	SBE Exchange Bachelor				Bachelor Exchange Courses			
	SBE Exchange Master				Bachelor Exchange Courses			