DEREE COLLEGE SYLLABUS FOR: MG 2063 PRINCIPLES OF OPERATIONS MANAGEMENT

(Updated Spring 2021)

UK LEVEL: 4
UK CREDITS: 15
US CREDITS: 3/0/3

PREREQUISITES:	None
CATALOG DESCRIPTION:	An introduction to the field of operations management. Foundation material in understanding the management of both profit and non-profit organization's operations. Familiarization with designing and managing operations.
RATIONALE:	Operations management is an important component of any business, independent of producing a product and/or a service. It is a field that continuously evolves and grows. This course is an introductory study of the basic concepts of operations management, covering both strategic and operational issues. Students will learn to design, operate, and improve operational systems using various operational management tools.
LEARNING OUTCOMES:	As a result of taking this course, the student should be able to: 1. Identify the key principles, the fundamental theories and the key decisions of operations management. 2. Examine the extent to which the different operational principles and theories affect the performance of different business systems. 3. Demonstrate understanding of the dynamism of operations management and the current operational trends and ethical issues related to it.
METHOD OF TEACHING AND LEARNING:	In congruence with the teaching and learning strategy of the college, the following tools are used: ➢ Lectures, problem-solving exercises, model applications, small case studies, the carrying out of a research project and in-class presentation. ➢ Office hours held by the instructor to provide further assistance to students. ➢ Use of the Blackboard platform to further support communication, by posting lecture notes, assignment instruction, timely announcements, and online submission of assignments.
ASSESSMENT:	**Summative**: First Assessment: Written project (individual; 1000-1200 words) — **40%** Final Assessment: Written Examination (Essay-type questions) — **60%**

	Formative: Group Coursework - one in-class diagnostic examination and case study analyses — **0%** The formative coursework aims to prepare students for the major written project and the final examination. The first assessment tests Learning Outcome 1 The second assessment tests Learning Outcomes 2 and 3 Students are required to resit failed assessments in this module.
INDICATIVE READING:	**REQUIRED MATERIAL:** Heizer, J., Render, B. & Munson, C. *Principles of Operations Management*, Pearson, latest edition **RECOMMENDED MATERIAL:** **BOOKS:** Bozarth, C. and Handfield, B. (2019*). Introduction to Operations and Supply Chain Management*, 5th edition, Pearson. Bordoloi, S, Fitzsimmons, J.A. and Fitzsimmons, M.J. (2018). "*Service Management: Operations, Strategy*, *and Information Technology*", 9th ed., McGraw Hill. Liker, J. (2004), Toyota Way, McGraw-Hill. Slack, N., and Brandon-Jones, A. (2019). *Operations Management*, 9th ed., Pearson **ARTICLES:** Arellano, M.C., Rebolledo, C. & Tao, Z. (2019). "Improving operational plant performance in international manufacturing networks: the effects of integrative capabilities and plant roles", *Production Planning & Control*, Vol. 30 No 2-3, pp. 112-130. Donohue, K., Ozer, O. and Zheng, Y. (2020), "Behavioral Operations: Past, Present, and Future". *Manufacturing & Service Operations Management,* Vol 22 No 1, pp. 191-202. Glock, C.H., Grosse, E.H., Jaber, M.Y. & Smunt, T.L. (2019). "Applications of learning curves in production and operations management: A systematic literature review*". Computers & Industrial Engineering*, Vol. 131, pp. 422-441 Gunasekaran, A., Dubey, R., Wamba, S.F., Papadopoulos, T., Hazen, B.T., & Ngai, E.W.T. (2018). "Bridging humanitarian operations management and organisational theory". *International Journal of Production Research*, Vol. 56 No 21, pp. 6735-6740. Hitt, M.A., Xu, K. & Carnes, C.M. (2016). "Resource based theory in operations management research". *Journal of Operations Management*, Vol. 41, pp. 77-94

	Manikas, A., Boyd, L., Guan, J. & Hoskins, K. (2019) “A review of operations management literature: a data-driven approach”, *International Journal of Production Research*. Roden, S., Nucciarelli, A., Li, F. & Graham, G. (2017). “Big data and the transformation of operations models: a framework and a new research agenda”. *Production Planning & Control*, Vol. 28 No 11-12, pp. 929-944. Seyedghorban, Z., Samson, D. and Tahernejad, H. (2020), "Digitalization opportunities for the procurement function: pathways to maturity", *International Journal of Operations & Production Management*, Vol. 40 No. 11, pp. 1685-1693. Sarmiento, R., Whelan, G. & Sprenger, J. (2018). “Rethinking research methods in operations and supply chain management”. *Production Planning & Control*, Vol. 29 No. 16, pp. 1303-1305. Wang, X. & Zhang, Y. (2019). “Engineering network operations for international manufacturing: strategic orientations, influencing factors and improvement paths”. *Production Planning & Control*, Vol. 30 No. 2-3, pp. 239-258. Zangiacomi, A., Oesterle, J., Fornasiero, R., Sacco, M. & Azevedo, A. (2017). “The implementation of digital technologies for operations management: a case study for manufacturing apps”. *Production Planning & Control*, Vol. 28 No 16, pp. 1318-1331.
INDICATIVE MATERIAL: *(E.g. audiovisual, digital material, etc.)*	**REQUIRED MATERIAL: N/A** **RECOMMENDED MATERIAL: N/A**
COMMUNICATION REQUIREMENTS:	Use of appropriate academic conventions as applicable in oral and written communications.
SOFTWARE REQUIREMENTS:	MS Office
WWW RESOURCES:	www.ReutersBusinessInsight.com/login.asp www.apqc.org www.juse.org.jp www.kaizen-institute.com www.nist.gov www.toyota.co.jp www.iomnet.org www.poms.org www.opsman.org www.sussex.ac.uk/users/dt31/TOMI/ www.bpmi.org www.waria.com www.outsourcing.com www.bptrends.com www.inventorymanagement.com www.erpfans.com

	www.sapfans.com www.pmi.org www.comp.glam.ac.uk/pages/staff/dwfarth/projman.htm#automated www.quality-foundation.co.uk www.asq.org www.quality.nist.gov www.balancedscorecard.org www.kmmagazine.com
INDICATIVE CONTENT:	1. Operations and Productivity 2. Operations Strategy in a Global Environment 3. Forecasting 4. Design of Goods and Services 5. Managing Quality 6. Process Strategy 7. Location Strategies 8. Layout Strategies 9. Human Resources, Job Design, and Work Measurement 10. Inventory Management 11. Aggregate Planning 12. Short-Term Scheduling 13. Lean Operations 14. Maintenance and Reliability 15. Ethical and Social impact of Operations