UNIVERSITÀ DI PAVIA

Anno Accademico 2017/2018

DESIGN OF BUSINESS PROCESSES

Anno immatricolazione	2016/2017
Anno offerta	2017/2018
Normativa	DM270
SSD	ING-INF/05 (SISTEMI DI ELABORAZIONE DELLE INFORMAZIONI)
Dipartimento	DIPARTIMENTO DI INGEGNERIA INDUSTRIALE E DELL'INFORMAZIONE
Corso di studio	COMPUTER ENGINEERING
Curriculum	Services Engineering
Anno di corso	2°
Periodo didattico	Primo Semestre (02/10/2017 - 19/01/2018)
Crediti	6
Ore	56 ore di attività frontale
Lingua insegnamento	A Business Processes (BP) is a sequence of activities through which an organization delivers a service to external or internal consumers. Internal consumers include the departments if the organization itself, e.g. Human Resource services supplied by HR department of an organization. External consumers include the customers of an organization e.g. the patients of a healthcare service. The performance of BPs largely determines the operational performance of an organization. Inefficient BPs put an organization out of the market and ineffective BPs drives customers away. The course aims at designing effective and efficient BPs which can be also sustainable.
Tipo esame	SCRITTO E ORALE CONGIUNTI
Docente	MOTTA GIANMARIO PIERO ANTONIO (titolare) - 6 CFU
Prerequisiti	The course focuses on requirements analysis and on Business Process Modeling. Hence, it relies on modeling/analysis techniques as UML, BPMN. A basic knowledge of organization theory is recommended
Obiettivi formativi	This module provides concepts and techniques for modelling, assessing and designing Business Processes (BP). At the end of the course,

	students will have a good command of the techniques for BP analysis.
Programma e contenuti	PART 1 – Modelling Business Process (BP) techniques for describing BPs at different abstraction levels and from different perspectives. • BP Definition: the CRASO paradigm, BP structure • BP Modeling: narrative, hierarchical, and flow models; BPMN and UML-EP PART 2 – Mapping and assessing Business Processes (BP) in enterprises: techniques for modeling the BPs of the whole enterprise. • Overview of the BPs in enterprises: primary, support, and managerial BPs • General Reference Models for BPs: Value Chain, Anthony, GEF grid • Industry reference models for BPs: SCOR (Supply Chain Operations Reference model) and others PART 3 –Business Process Design: a framework for sustainable BPs: • Galbraith's organization design model • Foundations on design variables,: Corporate strategy and business model , BP activities, Organization structure (macro-structure, micro-structure, Business Process Ownership), Skills and competences, Control and reward , IT support • Approaches to BP design: Department oriented, Process oriented, Stakeholder oriented PART 4 –Design of BP projects: a reference framework • Project design techniques and models: Project Breakdown Structures (OBS, PBS, ABS, WBS), work packages and milestones, Gantt • Project control: risk management and impact management
Metodi didattici	Most topics will be taught through a complete learning cycle that will be based on the sequence • Lecture on foundations (stimulus) which is aimed at explaining "What it is" • Case study / Exercise (reinforcement) which is aimed at showing "How it is made" • Project work made by student teams which intends to let students learn "How to make it"
Testi di riferimento	• BPMN v2.0 Examples document • Supply Chain Operations Reference-model (SCOR) • G. Motta A primer on BP • PMI - Project Management Body of Knowledge (PMBOK) • Journal Articles • Case studies
Modalità verifica apprendimento	Evaluation will be based on • 1/3 the project work – the mark is given to the student team • 1/3 the individual presentation of the team project • 1/3 the individual oral or written exam on foundations
Altre informazioni	
Obiettivi Agenda 2030 per lo sviluppo sostenibile	$lbl_legenda_sviluppo_sostenibile