Courses

Fall 2016

- IKNS K5100. Campus Practicum ("Residency") I. 1 pt.
- IKNS K5300. Information and Knowledge in the 21st Century Economy. 3 pts.
- IKNS K5301. Building Effective Knowledge Strategy and Services. 3 pts.
- IKNS K5302. Findability and Innovation with Information. 3 pts.

Spring 2017

- IKNS K5304. Business Analytics Management. 3 pts.
- IKNS K5306. Law for Knowledge Innovations and Practices. 3 pts.
- IKNS K5100. Campus Practicum ("Residency") II. 1 pt.
- IKNS K5305. Networks and Collaboration. 3 pts.

Summer 2017

The summer sequence includes Part 1 of the Capstone Project Seminar (2 pts.) and two online electives chosen from this list, or with the approval of the IKNS academic director, chosen from elsewhere at the University.

- IKNS K5336. Collaboration at Scale. 3 pts.
- IKNS K5338. Knowledge-Driven Digital Product Innovation: Idea to Profitability. 3 pts.
- IKNS K5550. Research Based Product Design (UX). 3 pts.
- APAN K5700. Analytics and Leading Change. 3 pts.
- APAN K5200. Analytics Frameworks and Methods. 3 pts.

Fall 2017

- IKNS K5303. Enterprise-Wide Applications and Project Portfolio Management. 3 pts.
- IKNS K5100. Campus Practicum ("Residency") III. 1 pt.

Capstone Project Seminar

Note: The Capstone Project Seminar starts during the second residency in April and continues through the following December.

Note: Students register for the Part 1 of the Seminar (2 pts.) during the summer term and the Part 2 (4 pts.) during the fall term.

- IKNS K5350. Capstone Project Seminar. 6 pts.

IKNS K5100. Campus Practicum ("Residency") I. 3 points total (1 point per residency)

Description

Scheduled during the first, eighth, and thirteenth months of the program, the residency brings students together in New York City for an intensive series of lectures, seminars, workshops, coaching and career advisement sessions, and networking events facilitated by Columbia faculty, administrators, and industry professionals. Students are required to attend and actively participate in all practicum events.

IKNS K5300. Information and Knowledge in the 21st Century Economy. 3 pts.

Instructor

Katrina Pugh

Description

(Has both an online and face-to-face component)

How do decision makers build business strategy and translate that into their organizations' knowledge strategy? This course tackles these questions, providing students with an understanding of the issues that encompass the field of information management, and knowledge management, and knowledge product innovation. We propose that well-managed knowledge can not just enable, but drive the business:

- By informing the business positioning, well-managed knowledge can help to define "Where do we compete?"
- By driving execution of that positioning, well-managed knowledge (including knowledge-driven digital products) can help to answer "How do we win?"
- By accelerating change toward viable outcomes, well managed knowledge answers, "How do we sustain a competitive advantage?)

Case studies, personal projects, and other approaches are used to familiarize students with issues such as managing intellectual capital, knowledge asset management, building the capacity to collaborate, critical knowledge technologies, and measurement and evaluation of knowledge services.

IKNS K5301. Building Effective Knowledge Strategy and Services (Online). 3 pts.

Instructor

Edward Hoffman

Description

Drawing on examples from a variety of organizations, this course will focus directly on strategies for building a successful knowledge service or product for organization or institution. Topics will include ways to talk to management about products and knowledge services, process improvement, building sustainable stakeholder relationships, knowledge services that improve the top and bottom lines, communicating knowledge services, ways to measure success, building communities of practice, and creating a reflective practitioner environment through the use of stories. Students will get hands-on experience diagnosing and proposing knowledge strategies that help their organization improve its effectiveness and competitiveness.

IKNS K5302. Findability and Innovation. 3 pts.

Instructor

Ralph Poole

Description

How do we organize and present information and knowledge to ensure accurate and relevant access (or push) at the "point of need" in the digital age? Metadata is one essential component of making any knowledge asset or electronic information findable and valuable. The first part of the course focuses on metadata development: In readings, examples and exercises, we explore metadata standards, user-focused metadata schemas, controlled vocabularies, taxonomy, and search. We discuss search and other applications interacting with metadata, full-text, and ontologies. In the second part of the course, we explore modern uses of metadata for new products, new revenues, improved productivity, and societal impact. We look at products like Pandora, services like Salesforce.com, and game-changing applications like counter terrorism and poverty mapping. In sum, students will understand the rationale and operations of findability, and will role-play the modern innovator, taking metadata to market.

IKNS K5304. Business Analytics Management. 3 pts. (Offered Online)

Instructor

Jeanne Harris

Description

How do organizations leverage both their own data and external information to transform their business? Emphasizing the need to continually innovate and understand customers, this course explores

the growing role of business analytics and big data. It also addresses the critical skills and capabilities an organization needs for success, including leadership, culture, methods and tools for becoming data driven, while also balancing human judgment. Lectures, readings, cases, and guest speakers consider the impact and challenges of gathering, storing, analyzing and providing access to insights to facilitate effective decision making. Students use a business analytics maturity model to frame and define the right investments to build an analytics capability in their own organizations.

IKNS K5306. Law for Knowledge Innovations and Practices. 3 pts.

Instructor

Anne Kershaw

Description

How do decision-makers deal with the constantly evolving legal issues generated by the growing importance and value of information and knowledge? This course uses the Socratic Method to stimulate rational thinking and illuminate ideas, while introducing the fundamental principles and practical consequences of recent developments in legislation and case law. These include legal issues with respect to labor and employment litigation, intellectual property, privacy regulations, and electronic discovery in investigations and commercial litigation. Governance, security, and regulatory issues relating to information and knowledge management are also covered in this course.

IKNS K5100. Campus Practicum (“Residency”) II. 3 points total (1 point per residency)

Description

Scheduled during the first, eighth, and thirteenth months of the program, the residency brings students together in New York City for an intensive series of lectures, seminars, workshops, coaching and career advisement sessions, and networking events facilitated by Columbia faculty, administrators, and industry professionals. Students are required to attend and actively participate in all practicum events.

IKNS K5305. Networks and Collaboration. 3 pts.

Instructor

Katrina Pugh

Description

(Has both an online and face-to-face component)

How do we effectively use team and network collaboration for impact?> Collaboration, through networks, communities, alliances and project teams, is essential to organizational life. While the need for collaboration is widely recognized, we sometimes take the view that "all collaboration is good," without assessing the costs and benefits. This course looks at what it takes to convene effective collaborations

across individuals and organizations. Through classroom and online dynamics, students learn how to better facilitate collaborative knowledge-sharing, innovation and change. We also examine techniques and tools for defining, diagnosing, and driving social capital and effective knowledge networks (also called "communities of practice") within and across organizations. Students will learn to measure, diagnose, and improve their organization's collaboration model and individual networks as a resource for eliciting and spreading insight, human capital development, and problem-solving.

IKNS K5336. Collaboration at Scale (Online). 3 pts.

Instructor

Mary Abraham

Description

This course is about leading boundary-spanning coalitions. An old African proverb tells us that, "If you want to go fast, go alone. If you want to go far, go together." While this advice is especially relevant in our interconnected 21st-century world, we have learned that working together is not always easy to do well.

"Collaboration at Scale: Leading Boundary-Spanning Coalitions" takes the study of collaboration into an even wider realm by examining the potential and complexity of large-scale, cross-organizational collaboration, and how to lead it.

The concept of scalability is common in the business world and this course demonstrates what it takes to make collaboration scalable and suitable for a variety of challenging contexts larger than a single organization. Inherent in the concept of scalability are the notions of "appropriate scale" and also "at scale." Both of these notions raise valid questions that we will address in this course. (Though our interpretations of scale have evolved with the advent of social media, specific technology selection is not the focus of the course.)

Students will learn the characteristics, conditions and dynamics of various large-scale collaborations, as well as how to design and lead them effectively. Course materials will be drawn from the for-profit and nonprofit worlds. Using a balance of practice and theory of networks and large system facilitation, students will demonstrate their mastery of course materials through an assignment in which they diagnose and (re)design a "collaboration at scale." This could be in the business, scientific, religious, political, or humanitarian domains. ***Elective***

IKNS K5338. Knowledge-Driven Digital Product Innovation: Idea to Profitability. 3 pts.

Instructor

Ralph Poole

Description

Exponential growth of information and data—combined with software that can understand and learn from analytic experience—provides entrepreneurs with tremendous opportunities to bring innovative customer-

focused solutions to market. While there are no direct paths to bring a new product idea to market, there are easily identifiable milestones that can guide the way from idea generation to product profitability. This course will explore the process of early stage development of knowledge-driven, data intensive digital products like Pandora, Netflix, Watson and Trip Advisor. The goal is to create an entrepreneurial experience at its most elemental and visceral level—ideation, brainstorming, interacting with customers, building a founding team, developing a business model, managing risk, investigating competitors, and pitching the business to potential investors. Students will be exposed to all the pressures and demands of real world start-ups by participating on teams tasked with creating deliverables required to launch a new business. ***Elective***

IKNS K5303. Enterprise-Wide Applications and Project Portfolio Management. 3 pts.

(Has both an online and face-to-face component)

Instructor

Jean-Claude Monney

Description

How do information professionals ensure that investments in digital workplaces meet strategic objectives in a timely and cost-effective manner? Moreover, how do corporations and institutions create an effective portfolio of investments that are aligned with the organization's mission and strategy? This course provides an introduction to enterprise-wide applications that constitute the digital workplace, such as intranets, search, enterprise social media, and content management. It also looks as other sources of record, such as Enterprise Resource Planning (ERP), Customer Relationship Management (CRM), and digital marketing.

In-person and classroom discussions, as well as guest speakers, focus on the scope of these mission-critical platforms (examining case studies on actual project implementations and their impact), project management techniques, and current and emerging trends in technology. As this course begins in Fall residency, students get exposure to digital workplace owners at significant institutions and businesses, and conduct role-plays or case examinations in teams. The course culminates in group projects that teach students the governance and decision process of making broad investments in technology.

IKNS K5100. Campus Practicum ("Residency") III. 3 points total (1 point per residency)

Description

Scheduled during the first, eighth, and thirteenth months of the program, the residency brings students together in New York City for an intensive series of lectures, seminars, workshops, coaching and career advisement sessions, and networking events facilitated by Columbia faculty, administrators, and industry professionals. Students are required to attend and actively participate in all practicum events.

IKNS K5350. Capstone Project Seminar. 6 pts.

Instructors

Madelyn Blair, Timothy Powell, Vanessa DiMauro, Christopher J. Samuels and Nita Gupta

Description

The IKNS Capstone project is the culmination of the students' immersion in this executive-level program, and an opportunity to demonstrate mastery of the cross-disciplinary curriculum. Working individually and in small teams, students do a consulting project for an organization seeking to initiate or improve its information and knowledge processes, or to expand revenue opportunities from intelligent, knowledge-enabled products. Clients benefit from applied and scholarly research, analysis, and insight from students, who, guided by faculty, bring considerable professional and academic credentials. Students benefit from applying their learning in an environment that is at the same time realistic and supported by IKNS faculty and sponsors, and from getting exposure to a new industry, KM function, and network of practitioners. Capstone projects showcase IKNS student learning, are well-articulated, are moderately complex, and can be conducted virtually (outside of New York, and/or in New York with remote students). Industry and nonprofit "sponsors" are curious, motivated, well-networked professionals who can help the students bring to light the insights and vision of their organization. Student projects might include:

- Improving knowledge-sharing patterns and incentives
- Designing a business analytics competency for decision-making
- Improving or introducing knowledge networks or communities
- Improving or introducing social media and other collaboration processes
- Redefining information architectures, taxonomies and tagging for maximum engagement
- Expanding the repertoire of tacit knowledge sharing approaches
- Introducing knowledge-based products as incremental revenue streams
- Defining a knowledge and information governance model, and expanding the capacity to act
- Defining a KM vision from the ground up, with roadmap, program, and technology evolution

Students begin doing independent work on the Capstone during their second residency in April, and then step into the team component at the third residency in August-September. Independent work could entail secondary research, expert interviews, and model development. Team work could entail employee interviews; joint design of processes, operations, and technology; analysis and improvements to content or technology, and client training and presentations. Students work alongside their industry "clients" to strive for not just lofty strategies, but practical action.

IKNS K5550. Research Based Product Design (UX). 3 pts.

Instructors

Beverly W. May

Description

In this hands-on class, students will learn the theoretical and practical fundamentals of research-based digital product design through the creation of an interactive mobile app prototype and a process case study.

This class will focus specifically on ideating, researching, defining, designing and testing a mobile app idea of your choice through an iterative user-centered design process. Outside of this course, these same methods can be applied to creating any type of product, not just mobile apps. If you've taken Ralph

Poole's "Knowledge-Driven Digital Product Innovation" course (IKNS K5338), this course will create a tangible design proof of concept for your business idea (Ralph's class is preferred, but not required as a prerequisite).

The course has three components:

1. Prototype: A realistic, interactive mobile app prototype that students create and refine through multiple iterations in industry-standard free prototyping software

2. A Case Study that incorporates comprehensive documentation of the industry, audience, problem, solution, research and iterative design and testing process used to create the prototype

3. Research and Testing: Peer and external user research, testing, evaluations and feedback during the course

The user experience skills and methods that are taught in this class are in demand by employers and startups across nearly every industry, and reflect the latest best practices used to create today's most widely used and award-winning digital products.

The University reserves the right to withdraw or modify the courses of instruction or to change the instructors as may become necessary.