

Departamentul de Calculatoare si Tehnologia Informatiei

Domenii si teme propuse pentru disertatie

Nr.crt.	Nume coordonator	Domenii propuse	Teme propuse	Teme alocate
1	prof.dr.ing. Brezovan Marius	<p>Natural language processing (Procesarea limbajului natural):</p> <p>a) Question answering</p> <p>b) Sentiment analysis (Analiza sentimentelor)</p> <p>c) Automatic summarization (Sumarizarea automata a textelor)</p> <p>d) Text classification (Clasificarea textelor)</p> <p>e) Topic modelling (Modelarea topicilor in documente)</p> <p>f) Text-to-image generation (Generarea automata a imaginilor din texte)</p> <p>Computer vision:</p> <p>a) Object recognition in images (Recunoasterea obiectelor din imagini)</p> <p>b) Gesture recognition in video sequences (Recunoasterea gesturilor in secvente video)</p> <p>c) Facial recognition in images (Recunoasterea fetelor in imagini)</p> <p>d) Scene understanding in images (Intelegerea scenelor din imagini)</p> <p>e) Sentiment analysis in images (Analiza sentimentelor din imagini)</p> <p>f) Controlling physical devices (e.g. computer mouse) by using eye movement / Controlul echipamentelor (de exemplu mouse) folosind miscarea ochilor</p> <p>g) Video-to-text generation (Generarea automata a textului din secventele video)</p> <p>Software engineering (Inginerie software):</p> <p>a) Generating UML diagrams from requirements (Generarea diagramelor UML din specificatiile software)</p> <p>b) Generating test cases from use cases (Generarea cazurilor de test din scenariile de utilizare)</p>		
2	prof.dr.ing. Mocanu Mihai	<p>Algoritmi paraleli si distribuiti</p> <p>Modelarea si analiza datelor</p> <p>Simularea sistemelor discrete</p> <p>Sisteme informatice medicale</p>		
3	prof.dr.ing. Stanescu Liana	<p>Aplicatii pe baze de date relationale</p> <p>Aplicatii pe baze de date NoSQL</p> <p>Aplicatii care utilizeaza metode de regasirea informatiei</p> <p>Analiza sentimentelor / Visual Sentiment Analysis</p> <p>Big Data Applications</p>		
4	prof.dr.ing. Badica Costin	<p>Algoritmi de optimizare cu restrictii cu aplicatii in diverse domenii (turism, transporturi, alocarea resurselor, etc.) / Constrained optimization algorithms with applications in various domains (turism, transport, etc.)</p>		

		<p>Aplicatii ale teoriei jocurilor pentru rationament strategic in diverse domenii (siguranta si protectie, economie, sociologie, etc.) / Game theory applications for strategic reasoning in various domains (safety and protection, business, etc.)</p> <p>Aplicatii ale grafurilor si retelelor complexe in diverse domenii (retele sociale, colaborare, partajarea continutului online, etc.) / Graph and complex network applications in various domains (social networks, collaboration, online content sharing, etc.)</p> <p>Aplicatii ale inteligentei artificiale (invatare automata, procesarea limbajului natural) in analiza datelor mari (analiza sentimentelor si opiniilor, clasificarea stirilor, recomandari, etc.) / Artificial intelligence applications (machine learning, natural language processing) in Big Data analysis (sentiment analysis, news classification, recommendations, etc.)</p> <p>Aplicatii ale modelarii si simularii multi-agent in diverse domenii (propagarea informatiei in retele sociale, Internetul obiectelor, incredere si reputatie, competitie si/sau colaborare, analiza deciziilor, etc.) / Multi-agent modeling and simulation applications in various domains (information propagation in social networks, Internet of Things, trust and reputation, competition and / or collaboration, decision making, etc.)</p> <p>Instrumente software pentru sisteme distribuite multi-agent (platforme, cadre de lucru, limbaje de programare) / Software tools for distributed multi-agent systems (platforms, frameworks, programming languages)</p>		
5	prof.dr.ing. Popescu Elvira	<p>Aplicatii web, web 2.0 si web semantic</p> <p>Sisteme si tehnologii pentru e-learning</p> <p>Analiza si vizualizarea datelor</p> <p>Sisteme colaborative si interactiune sociala</p>		
6	conf.dr.ing. Patrascu Constantin		<p>Sarcina electronica comandata prin Bluetooth</p> <p>Sistem Arduino controlat prin GSM si Bluetooth</p> <p>Sisteme încorporate pentru controlul automobilelor</p> <p>Sistem de supraveghere si control "Casa inteligenta"</p>	
7	conf.dr.ing. Mancas Dan		<p>Tehnologii avansate pentru aplicatii web in timp real</p> <p>Ierarhizarea resurselor sistemelor Grid prin evaluari de performanta elementare</p> <p>Managementul resurselor in Sisteme Grid</p> <p>Automated WiFi troubleshooting</p> <p>Prelucrarea grafica a imaginilor 3D</p>	
8	conf.dr.ing. Dogaru Dorian		<p>Progrmarea animatiilor procedurale in mediu de tip Gaming Engine</p>	Da
9	conf.dr.ing. Nicolae Ileana		<p>Information systems monitoring</p> <p>SAP solution for Human Resources Management</p> <p>SAP solution for Production Planning</p>	

10	conf.dr.ing. Mihaescu Cristian	Distributed Programming in Cloud		
		Distributed Programming with Hadoop		
		Distributed Programming with Blockchain		
		Distributed Programming in Java/C++/etc.		
11	conf.dr.ing. Udristoiu Anca	Machine Learning		
		Deep Learning		
		Aplicatii Web/ Mobile cu baze de date		
12	s.l.dr.ing. Lemeni Ioan	Proiectarea cu microprocesoare		
		Programare Android		
13	s.l.dr.ing. Udristoiu Stefan	Tools for assisting object-oriented design		
14	s.l.dr.ing. Marius Marian		Analiza malware cu Python – volatility	
			Management of screen time and screen usage to profile a smart phone user	
			Interactive map assistant for a generic store	
			Cross-site scripting scanner	
			Real Guard Protect - Application for the management of alarm messages	
			Aplicatie ghid cu recomandare de trasee optime în interiorul unei institutii	
			Buoy Android application	
			Free parking spots counter	
			Car parking application with Arduino hardware-software	
			Implementarea unui portofel electronic pentru monede criptografice bazat pe framework-ul Ethereum	
15	s.l.dr.ing. Dumitrascu Eugen		Aplicatie pentru Monitorizarea Semafoarelor unei Intersectii Rutiere / Application for Monitoring the Traffic Lights of a Road Intersection	
			Robot Controlat prin Gesturi / Gesture Controlled Robot	
			Sistem de Acces prin Autentificare Biometrica / Access System through Biometric Authentication	
16	s.l.dr.ing. Enescu Nicolae		Sistem automat de dozare a hranei zilnice pentru animale folosind RaspberryPi si o aplicatie web	
			Sistem automat de dozare a apei zilnice pentru animale folosind RaspberryPi si un smartphone cu Android	
			Sistem automat de permiterea a accesului intr-o incapere folosind RaspberryPi	
17	s.l.dr.ing. Ganea Eugen			
18	s.l.dr.ing. Stoica Cosmin			
19	s.l.dr.ing. Barbulescu Lucian	Aplicatii software pentru dinamica spatiala		
		Utilizarea serviciilor GNSS		
		Aplicatii Android		
		Sisteme distribuite		
20	s.l.dr.ing. Cerbulescu Catalin	Management Baze de Date de dimensiuni mari (Big Data management)		Da
		Jocuri (Games)		Da
		Hardware / Microcontrolere / IoT / Senzori (Hardware / Microcontrollers / IoT / Sensors)		Da
		Procesarea Imaginilor / Recunoasterea formelor, obiectelor, fetelor (Image processing / Shape, Objects, Face Recognition)		Da
		Invatarea automata (Machine learning)		Da
		Procesarea limbajului natural (Natural language processing)		Da

		Navigatia utilizind API-uri publice (Navigation using public API)		Da
		VR/AR (VR/AR)		Da
		Aplicatii web (WebApps)		Da
21	s.l.dr.ing. Ilie Sorin	Aplicatii de e-commerce web		
		Servicii online de e-commerce		
		Aplicatii mobile		
		Aplicatii mobile si embeded		
		Aplicatii integrate mobile + web		

22	s.l.dr.ing. Mancas Catalina	<p>Project Management:</p> <p>a) PMBOK guidelines efficiency</p> <p>b) Agile Project Management</p> <p>c) Project Management Methodologies/Practices</p> <hr/> <p>Cloud Computing:</p> <p>a) Virtualization</p> <p>b) Loadbalancing</p> <p>c) Security and integrity</p> <p>d) Secure Cloud architecture</p> <p>e) Secure data management within and across data centers</p> <p>f) Integrity assurance for data outsourcing</p> <p>g) Privacy in multi-tenancy clouds</p> <p>h) Availability, data recovery and backup</p> <p>i) Cloud access control and key management</p> <p>j) Failure detection and prediction</p> <p>k) Mobile Cloud Computing</p> <p>l) Green Cloud Computing</p>		
23	s.l.dr.ing. Popa Radu Teodoru			
24	asist.dr.ing. Sboru Catalin			
25	asist.dr.ing. Popescu Stefan			
26	asist.drd.ing. Badea Gabriel			
27	asist.drd.ing. Popa Liliana			
28	asist.drd.ing. Muraretu Ionut			