

Sabanci University

**RESEARCH AND
GRADUATE POLICY
DIRECTORATE**

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in July 2008, features

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Program**

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1. Zoom to Industry Thesis (SAN-TEZ) Program

1.1 Industry Thesis (SAN-TEZ) Program

The SAN-TEZ Program is a research funding program by Ministry of Industry and Trade. The SAN-TEZ Program involves university and industry cooperation to address the Research and Development (R&D) needs of specific industries aided by the scientific perspective of universities.

The Objective of The SAN-TEZ Program

- To Institutionalize university-industry relation,
- To support high technology product or process development of industry,
- To developed R&D culture at SME's,
- Help universities to comercialize their IP,
- Provide funding for graduate students.

How projects are funded?

Approved SAN-TEZ project can obtaine upto 75% funding from the ministry. The remaining 25% funding must come from The Industry as a cash contribution. All companier registered in Turkey with a Turkish University can apply for SAN-TEZ funding. The last application date for SAN-TEZ Program is 15th August 2008. For further information please visit:

<http://www.sanayi.gov.tr/webedit/gozlem.aspx?sayfaNo=3093>

2. FENS Faculty Member Dr. Asif Şabanoviç, Dr. Yusuf Menceloğlu, Dr. Ahmet Onat and Dr. Volkan Patoğlu Describes their SAN-TEZ Project Experience

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| <p>Dr. Asif Şabanoviç, “Computer Controlled System for Preperation of Tc99 Radiopharmaceuticals (RADIOPHARMATIC)”</p> | <p>AsifSabanovic</p> |
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“Diagnostic radioisotopes used in nuclear imaging are used as markers within the body. They may be used in the free form, but more often they are attached to selected molecules as a 'label' or 'tracer' allowing the passage and distribution of these molecules to be traced. A large number of these agents are made up in the hospital pharmacies as and when required. The radioisotopes most desired for diagnostic purposes usually have a short half-life and emit a significant amount of radiation during the period of use.

Sabancı University Mechatronics Program in cooperation with Mol-Image AŞ with financial support from SanTez Program - Project 00183 is developing a Automated Radio-Pharmaceutical Dispenser Workstation for Tc99m Radiopharmaceuticals. The Workstation is aimed to carry out the preparation, calibration, dilution and measured dispensing of individual patient preparations - procedures which are currently carried out manually by Nuclear Medicine Departments units within hospitals.

The objectives for the Workstations are to: minimize the risk of errors, reduce radiation dose to fingers and eyes, achieve greater consistency of doses, increase efficiency, record storage and transfer of materials, limit contamination of sterile items. Expected benefits include: better utilization of trained staff, prevent human contact with hazardous substances, meeting “As Low As Reasonably Practicable” principles for radiation exposures, enhanced accuracy and efficiency, allowing for non-schedule dose preparation, permanent and compact record keeping.

The versatile intelligent mechatronics modular system is at the heart of the workstation and it performs three basic operations necessary for the preparation of patient doses, namely: dispensing of radioactive source stock solution; preparation of multi-dose kits and filling of patient syringes. The workstation carries out a series of programmed task sequences without manual intervention or assistance. The dispenser has been designed in a modular approach so that different preparations and procedures can be quickly accommodated by the addition of new modules and removal of redundant ones. The workstation will be enclosed in an aseptic self-contained cabinet. The sequences are controlled form a desktop computer and form part of a larger program suite, including: calibration of counting equipment, dispensing of radioactive source into stock bottle, monitoring of stock solution, extraction and dispensing of stock

solution into kit vials, monitoring of kit preparations, filling of patient syringe from the kit vial, monitoring of the patient syringe. During various stages of dose preparation automatic checks are initiated to prevent non-operation and system damage. The accuracy of the doses drawn up by the system have a repeatability of within 5%.

The software which controls the workstation includes security and safety principles like: authorised operator control, authorized manual intervention, database recording of radioactive materials, dose and volume calculation routines, record of patient data and doses, permanent record of radioactive source, calibration and campaigns, fault display.”

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| Dr. Yusuf Menceloğlu, “Development of an Active Spin Finish Formulation with Improved Adhesion Activation for Polyethylene Terephthalate (PET) Continuous Fibers” | YusufMenceloglu |
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“Our joint project with one of the local Industrial Synthetic Yarn Producers entitled "Development of Active Spin Finish Formulation with Improved Adhesion Properties for Polyethylene terephthalate (PET) Continuous Fibers" is a SAN-TEZ Project which has been granted by the Ministry of Industry and Trade.

Spin finishes are applied to melt-spun PET yarns as processing aids to lubricate the fibers during processing operations. PET yarns also need a spin finish to activate the fiber surface due to the lack of active functional groups in PET fiber structure. In the framework of our project we aim at improving the surface activation of PET fibers with an active spin finish oil and thus achieving enhancement of adhesion of PET fibers to rubber which is supposed to be used for rubber reinforcement products.”

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| Dr. Ahmet Onat, “Data Acquisition and Remote Diagnostics” | AhmetOnat |
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“Break downs of commercial vehicles such as buses and trucks cause interruption of service and thus loss of money and reputation. Impending failures of such vehicles can be predicted by data acquisition and fault detection schemes. This project aims to develop a multifunctional network based data acquisition and remote diagnostics system capable of recognizing and logging probable fault conditions by analyzing data on the vehicle electronics network, transmitting the predicted faults to a central database where a subsequent web based complement informs operators, owner companies and maintenance workshops to avoid failures on-the-road, and speedy recovery from faults. The database is also used for further research and development.”

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| Dr. Volkan Patoğlu, “Automation of Manual Thread Loading Process During Truck-Bus Tire Manufacturing” | |
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The current state of the art in tire manufacturing process is highly dependent on manual labor. To be able to compete in the global market pressured by the countries with low-cost labor advantage, and in order to satisfy the ever increasing demands on higher quality products, automation of manual processes during tire manufacturing is becoming a necessity. In this project, Sabancı University Mechatronics Program in cooperation with BriSA and with financial support from San-Tez Program aims to automate the manual thread loading process in truck-bus tire manufacturing machines. Automation of this critical stage of the manufacturing process intends to save operators a substantial amount of time, contributing to the main goal of operator reduction per machine. As a result, the project will not only significantly contribute to the efficiency and profitability of the tire manufacturing process, but will also result in improved tire quality, by reducing human related errors. Moreover, in accordance with San-Tez's vision of "a competitive and prosperous Turkey, which is aware of importance of innovation and research & development, can develop and market its own technology", the proposed automation technology will be developed, implemented, and customized for BriSA completely in house, without any external support

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3. Open Call for Proposals

EU 7TH FRAMEWORK - TUBITAK - SAN-TEZ - COST

| Sponsored Institution | Call Title | Deadline for Submission | Theme |
|---|-------------------------------|-------------------------|---|
| EU 7th Framework Program (FP7) Cooperation Specific Program | | | |
| EU FP7- People | FP7-PEOPLE-IEF-2008 | 19 August 2008 | People |
| EU FP7- People | FP7-PEOPLE-IIF-2008 | 19 August 2008 | People |
| EU FP7- People | FP7-PEOPLE-IOF-2008 | 19 August 2008 | People |
| EU FP7- People | FP7-PEOPLE-ITN-2008 | 2 September 2008 | People |
| EU FP7- People | FP7-PEOPLE-IRG-2008 | 8 October 2008 | People |
| EU FP7- People | FP7-PEOPLE-ERG-2008 | 8 October 2008 | People |
| EU 7th Framework Program (FP7) Capacities Specific Program | | | |
| EU FP7- Capacities | FP7-SCIENCE-IN-SOCIETY-2008-3 | 24 July 2008 | Science in Society |
| EU FP7- Capacities | FP7-INFRASTRUCTURES-2008-2 | 11 September 2008 | Research Infrastructures |
| EU 7th Framework Program (FP7) Cooperation Specific Program | | | |
| EU FP7- Cooperation | FP7-ERANET-2008-RTD | 12 August 2008 | Coordination of Research Activities Food |
| EU FP7- Cooperation | FP7-ERANET-2008-RTD | 12 August 2008 | Agriculture and Fisheries, and Biotechnology Nanosciences |
| EU FP7- Cooperation | FP7-ERANET-2008-RTD | 12 August 2008 | Nanotechnologies |
| EU FP7- Cooperation | FP7-ERANET-2008-RTD | 12 August 2008 | Materials and new Production Technologies |
| EU FP7- Cooperation | FP7-ERANET-2008-RTD | 12 August 2008 | Socio-economic sciences |
| EU FP7- Cooperation | FP7-ERANET-2008-RTD | 12 August 2008 | Humanities Transport |

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|----------------------------------|--|--|--|
| EU FP7-Cooperation | AAL-2008-1 | 21 August 2008 | Information and Communication Technologies |
| EU FP7-Cooperation | ARTEMIS-2008-1 | 3 September 2008 | Information and Communication Technologies |
| EU FP7-Cooperation | JU-ENIAC-1-2008 | 3 September 2008 | Information and Communication Technologies |
| EU FP7-Cooperation | FP7-ENERGY-2008-TREN-1 | 8 October 2008 | Cooperation |
| EU FP7-Cooperation | FP7-ICT-2007-C | 20 January 2009 31 December 2008 23 September 2008 2 September 2008 | Information and Communication Technologies |
| TUBITAK | | | |
| TUBITAK | Career Development Program (3501) | 04 August 2008 | - |
| TUBITAK | Support Program for Research Projects of Public Institutions (1007) | 29 August 2008 | - |
| TUBITAK | Support Program for Scientific and Technological Research Projects (1001) | 01 September 2008 | - |
| TUBITAK | Global Researcher Program (1010) | 01 September 2008 | - |
| TUBITAK | The Program for Participating International Scientific Research Projects (1011) | 01 September 2008 | - |
| TUBITAK | Visiting Scientists Fellowship Program (2221) | End of every month | - |
| TUBITAK | Support Program for the Initiative to Build Scientific and Technological Cooperation Networks and Platforms (1301) | Open | - |
| TUBITAK | Patent Application Promotion and Support Program (1008) | Open | - |
| TUBITAK | Short-Term R&D Funding Program (1002) | Open | - |
| INDUSTRY THESIS (SAN-TEZ) | | | |
| Ministry of Trade and Industry | Industry Thesis (SAN-TEZ) Program | 15 August 2008 | - |
| COST | | | |
| EU RTD Framework Program | COST - European Cooperation in the field of Scientific and Technical Research | 26 September 2008 | |

Proposals and Activities of RGP Directorate in April, May and June 2008

The RGP Office has processed 20 proposals for the following sponsoring agencies from April through June 2008.

- 14 proposals for TUBITAK Support Program for Scientific and Technological Research Projects (1001)
- 2 proposals for TUBITAK Global Researcher Program (1010)
- 1 proposal for TUBITAK Support Program for Participating International Scientific Research Projects (1011)
- 1 proposal for TUBITAK Scientific Activities Support Program (2223)
- 1 proposal for European Union FP7th Ideas Specific Program ERC Advanced Grant for Life Sciences
- 1 proposal for State Planning Organization, Research Infrastructures Project

Annual Turkish Conference on Marie Curie Actions

The Annual Turkish Conference on Marie Curie Actions was held on June 6, 2008 at Sabancı University in cooperation with EU Framework Programs National Coordination Office and European Commission. Mr. Cihan Kızıltan, EU FP7 National Coordinator, Mr. Georges Bingen, Head Marie Curie Fellowship Unit, Mr. Abdülkerim Kar, EU FP7 People Delegate, Mr. Orbay Bülbül, EU FP7 National Contact Point (NCP), Mr. Jean-Bernard Veyret, Marie Curie Actions - Networks, Mr. Karim Berkouk, Marie Curie Actions - Fellowships, Ms. Burçak Çullu, FP7 People NCP, made presentations on Marie Curie Actions. For presentations please visit;

<http://www.fp7.org.tr>

Attended Meetings and Events of the RGP Directorate in April, May and June 2008

- The Innovation at Hacettepe University Technopolis Days, Ankara, April 3, 2008. Dr. Cemil Arıkan made a presentation on the "Cooperation Between Industry-University Panel".
- Ministry of Trade and Industry, Ankara, April 7, 2008. Dr. Cemil Arıkan gave a presentation on the "National Innovation Initiative".
- ODTU Electrical Engineering Department, Ankara, April 7, 2008. Dr. Cemil Arıkan gave a presentation entitled "The Innovation for Prosperity at Community".
- TASSA 2008 Annual Conference, ABD, April 10-13, 2008. Dr. Cemil Arıkan attended "The Innovation and National Innovation Initiative".
- Visit to Deputy Prime Minister and Minister of State Mr. Nazım Ekren, Ankara, May 8, 2008. Dr. Cemil Arıkan made a presentation on the "National Innovation Initiative".
- "National Conference For Participatory Local Development", Ankara, May 23-24, 2008. Dr. Cemil Arıkan has attended to this conference.
- ABFT Innovation Conference, Istanbul, June 13, 2008. Dr. Cemil Arıkan delivered a presentation on the topic of University Industry Session at Hilton Convention Center.
- Cooperation between University and Industry National Congress (USAMP Congress), Adana, June 26, 2008. Dr. Cemil Arıkan made a presentation on "University-Industry Cooperation".
- Dr. Cemil Arıkan attended the Magna Charta Summer School held on Corfu Island, June 17-20, 2008.

5. Latest Research News

Sabancı University has been awarded with one new 2008 Industry Thesis (SAN-TEZ) Program Grant by Ministry of Trade and Industry

Dr. Ahmet Onat, faculty member at the Faculty of Engineering and Natural Sciences, has been awarded for his project entitled "Data Acquisition and Remote Diagnostics".

Sabancı University has been awarded with one new Promotion of the Civil Society Dialogue Between EU and Turkey Grant by Central Finance And Contracts Unit

Dr. Behlül Üsdiken, faculty member at the Faculty of Management, has been awarded for his project entitled "Mapping European Higher Education Models (MEHEM)".

Sabancı University has been awarded with 2 new FP7 Marie Curie International Reintegration Grants by the European Commission:

Dr. Gözde Ünal, faculty member at the Faculty of Engineering and Natural Sciences, has been awarded for her project entitled "Medical Image Analysis For Cancer Treatment Monitoring And Tumor Atlas Formation".

Dr. Mehmet Yıldız, faculty member at the Faculty of Engineering and Natural Sciences, has been awarded for his project entitled "Incompressible Single and Multi-phase SPH with Improved Boundary Treatment".

COST Open Call / 26 September 2008

COST invites researchers throughout Europe to submit proposals for research networks and use this unique opportunity to exchange knowledge and to embark on new European perspectives. COST's main objective is to stimulate new,

innovative and interdisciplinary scientific networks in Europe. COST activities (Actions) are carried out by research teams to strengthen the foundations for building scientific excellence in Europe. This continuous call is thematically open. A two stage process will be followed to assess proposals. Preliminary Proposals should provide a brief overview of the proposal and its impact. A pre-selection will rank the remaining Preliminary Proposals of which some 75 per collection date will be invited to submit a Full Proposal. The next collection date for Preliminary Proposals will be 26 September 2008, 17:00 (Brussels time). For further information please visit:

<http://www.cost.esf.org/opencall>

From the FP7 Newsroom on the CORDIS website: 'New Unique Registration Facility Launched' .

"A new service called Unique Registration Facility (URF) has been launched on CORDIS to facilitate the preparation of grant agreements between participants and the European Commission.

Thanks to the new service, participants in the Seventh Framework Programme (FP7) and other programmes managed by the Research Directorate General will no longer have to submit their legal and financial information each time a new grant agreement is in the pipeline.

Once participants have been validated by the European Commission's central validation team for their existence as legal entities and their legal status, they will only have to submit their Participant Identification Code (PIC).

The new service will also make it possible for participants to see the legal and financial data the Commission holds on them. As a result, they will be able to suggest changes and updates.

Furthermore, the unique identification of each participant will help the production of statistical reports. It will also be possible to track organisations from proposal to negotiation stage.

The URF is only the first module of a participant portal currently under development. In the future, this portal is intended to become the central means of communication between participants and the Commission."

6. Upcoming Events

- July 22-31, 2008, Bregenz, Austria, "Summer School on Endocrinology"
- August 3-6, 2008, Changsha City, China, "International Hydrogen Forum 2008"
- August 5-21, 2008, Helsinki, Finland, "Helsinki Summer School"
- August 6-14, 2008, Oslo, Norway, "International Geological Congress 2008"
- August 17-21, 2008, Perugia, Italy, "International Conference on Stochastic Resonance"
- August 25-29, 2008, Kuopio, Finland, "Course in Regulatory Toxicology"
- August 31-September 14, 2008, "The EDIT (European Distributed Institute of Taxonomy) Summer School 2008"
- September 1-6, 2008, Monte Sant'Angelo, Italy, "The European Summer School on Industrial Dynamics (ESSID)"
- September 8-10, 2008, Budapest, Hungary, "International AVIATION CO2 Conference"
- September 9-11, 2008, Cardiff, UK, "The fourth International Conference on Multi-Material Micro Manufacture"
- September 10-14, 2008, Vadstena, Sweden, "ESF Conference on European State System and Reform"
- September 11, 2008, Munich, Germany, "Workshop on E-government and Digital Archives"
- September 20-21, 2008, Paris, France, "Alzheimer's Trade Fair"
- September 24-26, 2008, Zaragoza, Spain, "Spanish National Congress of Fuel Cells"

7. Editorial

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