



I. R. of Iran

Ministry of Science Research and Technology

Iranian Research Organization for Science & Technology (IROST)

Presentation of the Programmes and Activities

By: Prof. Ahmad Akbari

Deputy Minister and President of IROST

17th Meeting of COMSATS Coordinating Council

Tehran- I. R. of Iran

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IROST Background

- ❖ Founded: 1980
- ❖ IROST is affiliate organization of the Ministry of Science, Research and Technology (MSRT)





IROST Mission

- Strengthening the foundations of self-reliance in science and technology
- Supporting Iranian inventors, innovators, researchers and industrialists
- Responding to the increasing demands for science and technology development programs
- Supporting applied and developmental research
- Developing technologies through employing qualified experts and utilizing modern equipment's and facilities



The Major Objectives of IROST

- to provide support and facilities and making necessary arrangements with inventors, innovators, researchers and industrialists in S&T
- to support development of technology at national level
- to encourage a positive interaction between technology supply and demand
- to provide ground for growth, creativity and innovation in utilizing the research results
- to facilitate and support technology transfer and commercialization in a competitive environment



The Major Objectives of IROST

- to organize annual Khwarizmi International Award (KIA) and Khwarizmi Youth Award including Robotic Competition
- to spread awareness on the investment opportunities available in various fields of science and technology
- to extend help and training to the entrepreneurial communities in technology development
- to attract investments in the fields of advanced technologies



IROST Structure & Facilities

IROST provides the following facilities for developing new technologies and supporting innovations:

- Infrastructures and enhancement of human resources for development of technology in IROST technology incubators and technology parks, universities and industries
- An appropriate institutional and laboratory framework to support various national projects



IROST structure & facilities

IROST's 8 Institutes:

- Institute of Advanced Material & Renewable Energies
- Institute of Advanced Technologies
- Institute of Agriculture
- Institute of Biotechnology
- Institute of Chemical Technologies
- Institute of Electronics & Computer
- Institute of Mechanics
- Institute of Space Technologies (newly established institute)



IROST structure & facilities

Facilities:

- Necessary infrastructure
- High educated researchers and technicians
- Developed Research labs
- Pilot plants
- Projects oriented research setups
- Reference labs



Personnel

- ◆ Scientists: 150
- ◆ Experts and Technicians: 217
- ◆ Administration & Finance: 99
- ◆ Total: 466



PhD and MSc Students

IROST mission in training research based PhD and MSc.

Students in:

- ◆ Chemistry
- ◆ Chemical Engineering
- ◆ Agricultural Engineering
- ◆ Biotechnology
- ◆ Mechanic
- ◆ Electronic

- **Number of PhD and MSc Students**
- **MSc. : 98**
- **PhD : 84**
- **Total : 182**





Researchers Support



- Khwarizmi International Award

- ✓ Annually
- ✓ 28th at Feb 2015
- ✓ to select best researchers , inventors and innovators around the world (based on application and evaluation)





27th Khwarizmi International Award Ceremony

Tehran, I. R. Iran, 3 March. 2014

The 27th KIA ceremony had been inaugurated and honored by His Excellency, Dr. Hasan Rouhani, the President of the I. R. Iran to encourage the outstanding efforts of researchers, innovators and inventors, from all over the world and to appreciate their invaluable achievements in various fields of science and technology.





• **Khwarizmi Youth Award**

- ✓ Annually
- ✓ 16th at Dec 2014
- ✓ National
- ✓ To select best young researchers (based on application and evaluation)





IROST Programmes for 2014 -15

The 28th Khwarizmi International Award (KIA)

Tehran, I. R. Iran

February, 2015

The KIA secretariat invite researchers, innovators and inventors, from all over the world and to participate their invaluable achievements in various fields of science and technology as indicated in bellow table:

No	Field	No	Field
1	Technology Studies	8	Medical Sciences
2	Basic Sciences	9	Chemical Technologies
3	Materials & Metallurgy	10	Agriculture & Natural Resources
4	Electronic & Computer	11	Mechanical Engineering
5	Nanotechnology	12	Aerospace
6	Civil Engineering	13	Information Technology
7	Biotechnology & Basic Medical Sciences	14	Mechatronics

Call for participation is open from June 2014



Researchers Support

- ☐ Feasibility study of research results of private sectors
- ☐ Commercialization of developed technologies
- ☐ Marketing of developed technologies
- ☐ Coordinating universities and research centers with industries
- ☐ Supporting students' research projects
- ☐ Organizing workshops and training programs for private sector

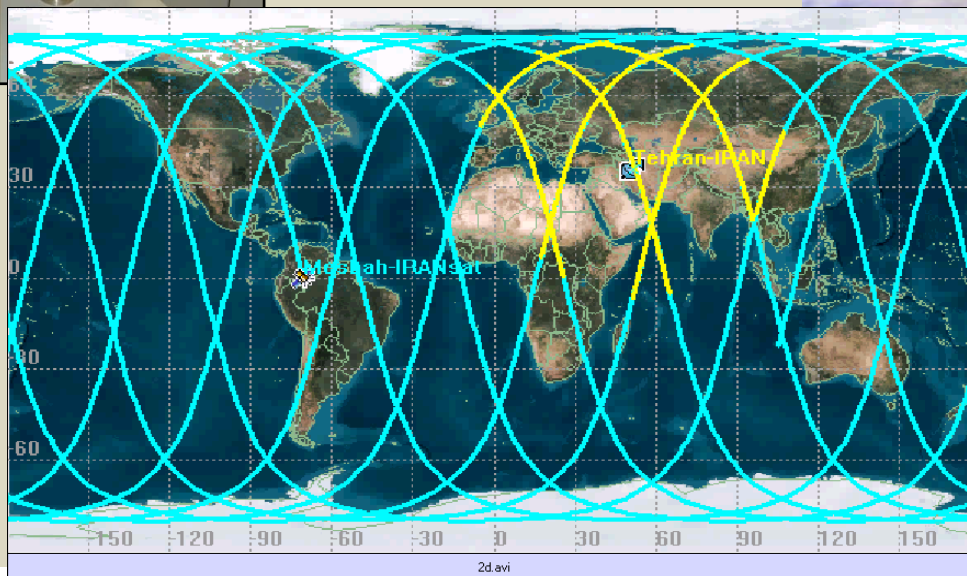
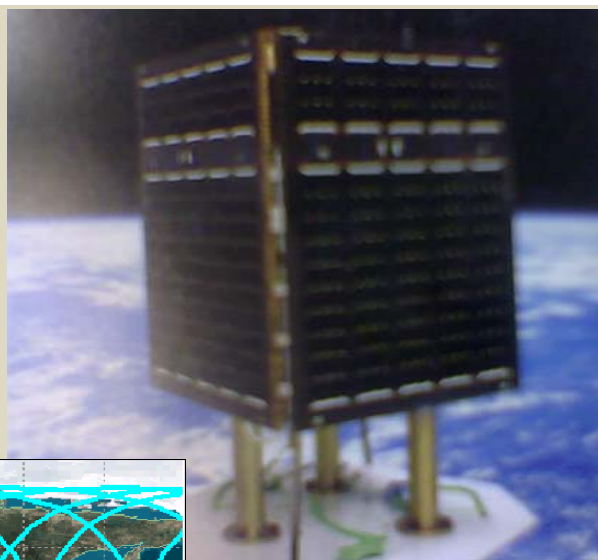
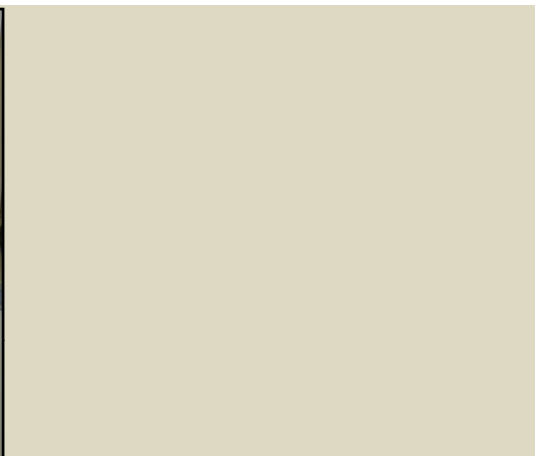
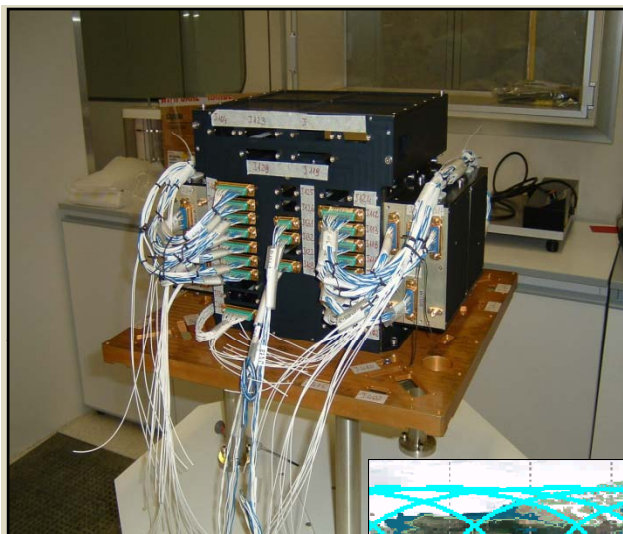


Researchers Support

- ❖ Managing Iranian Scientific Data Network
- ❖ Providing scientific information and documents to research communities
- ❖ Supporting the Intellectual Property of the researchers
- ❖ Giving Consultancy R&D and R&T institutions to enhance their infrastructure and procedures
- ❖ Developing entrepreneurship centres in universities.



Achievements: Mesbah Satellite Project





Achievements: Vertical Wind Tunnel





Achievements: Freeze Dryer

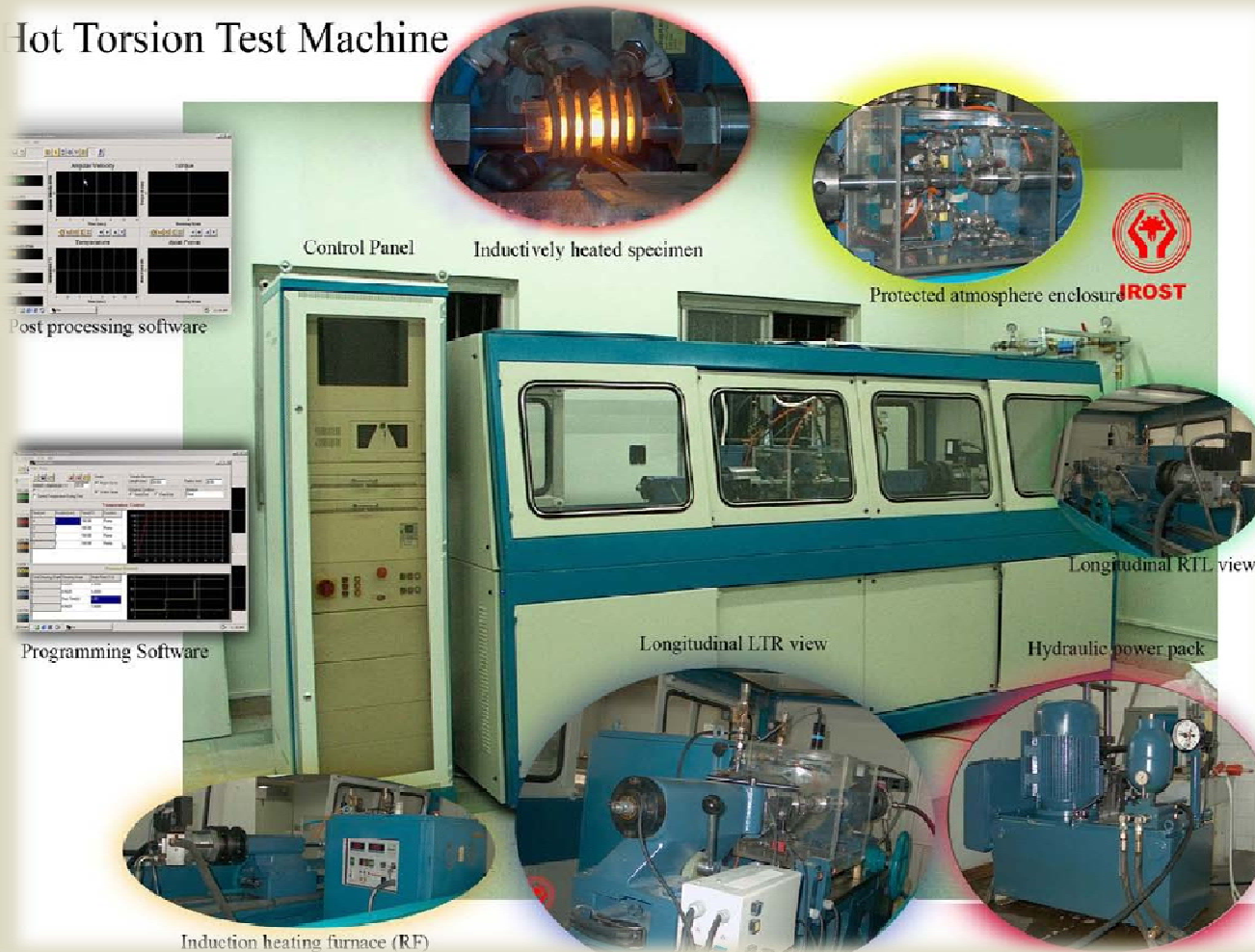


Fully designed & made at IROST



Achievements: Torsion test

Hot Torsion Test Machine





Achievements: Hemodialysis Machine





Achievements: Herbal Medicine

- ❖ Iran has a fairly well established herbal medicine sector
- ❖ Pilot plant already constructed
- ❖ To provide training, research and technology development
- ❖ Herbal extraction
- ❖ Finished products preparation



Achievements: Chem. Technology Pilot Plants





Achievements: Alumina Pilot Plant



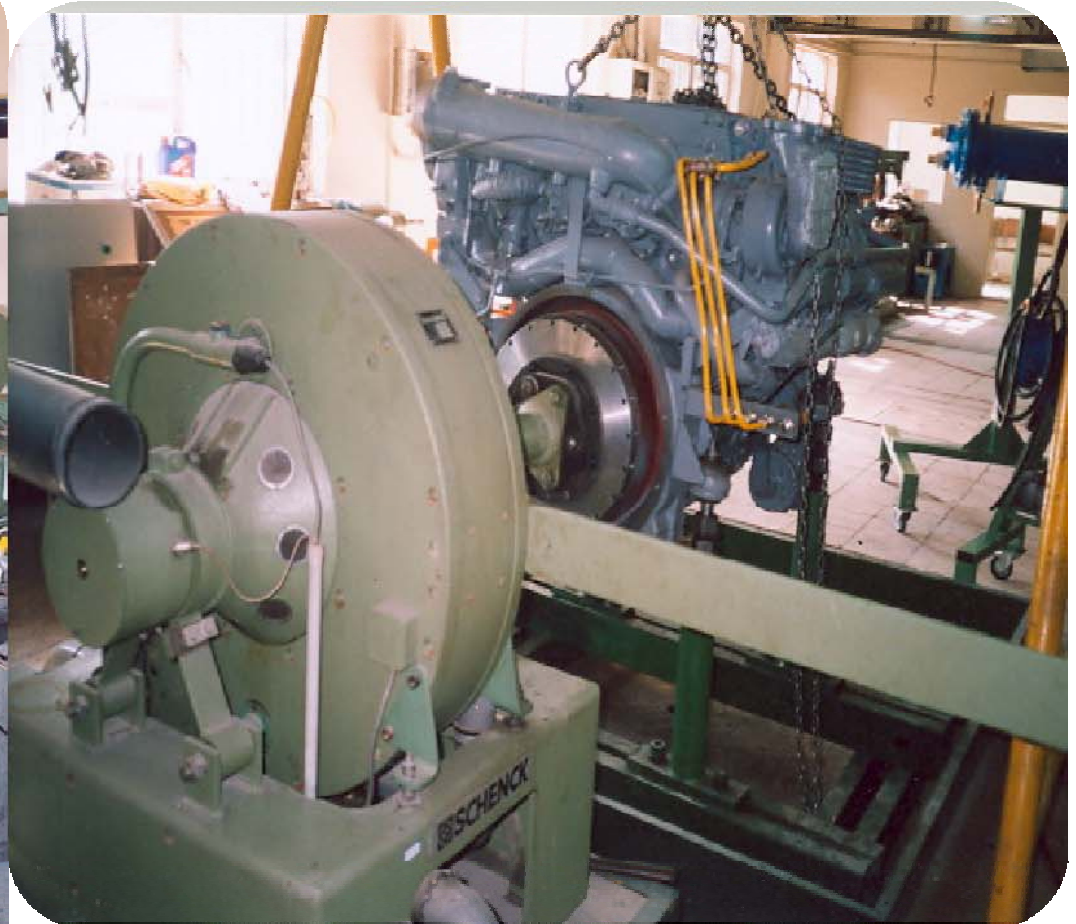


Achievements: De-Methyl Ether (DME) Pilot Plant





Achievements: Engine prototype for DME and Bio-diesel fuel



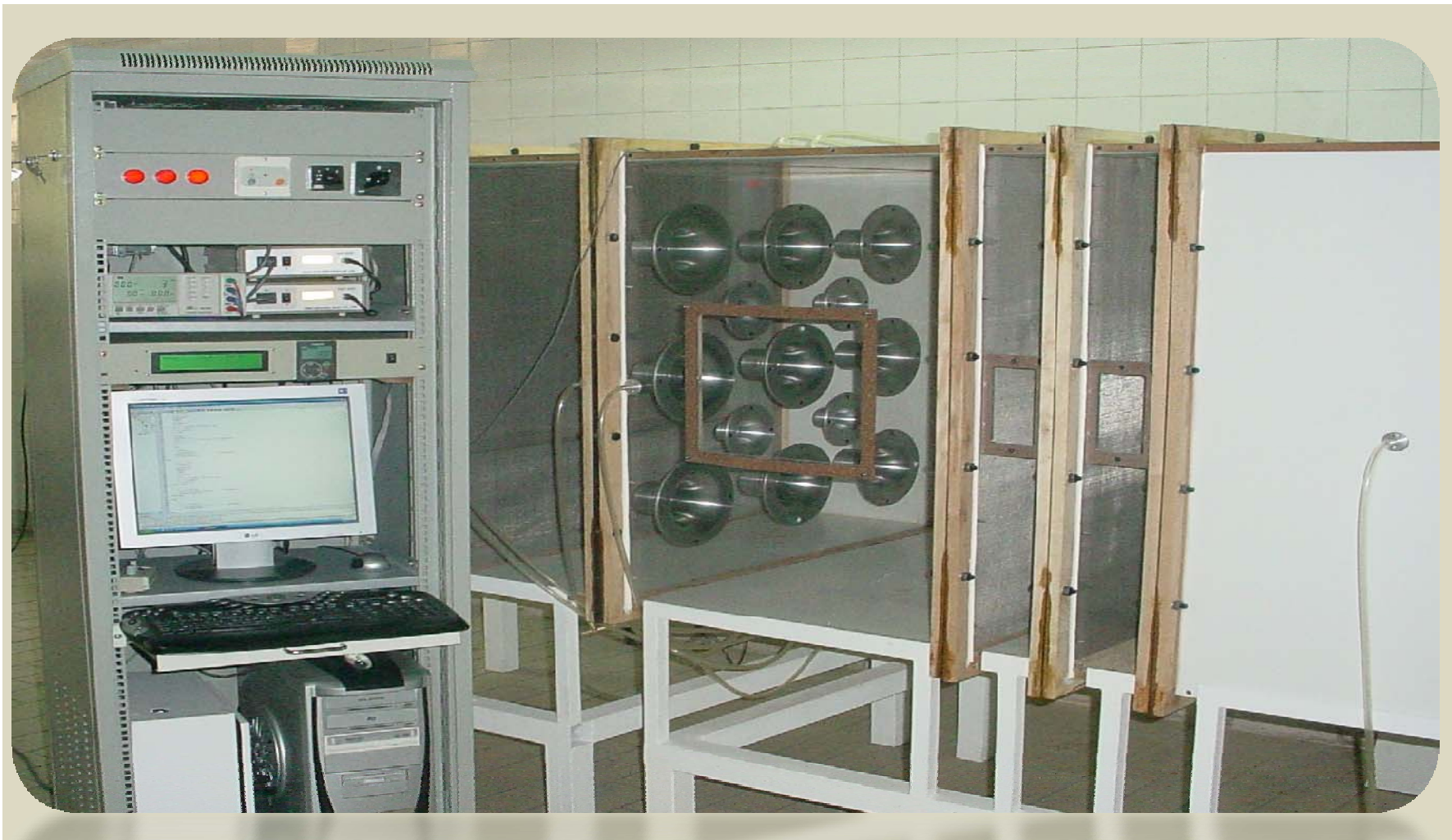


Achievements: Biotechnology Pilot Plant





Ref Labs: Fan Tester





INTERNATIONAL COOPERATION

IROST is official focal point of following international organizations:

- ☐ Asian And Pacific Centre For Transfer Of Technology (UN-APCTT)
- ☐ Commission on Science & Technology for Sustainable Development in the South (COMSATS)
- ☐ Organization of Islamic Conference Standing Committee on Scientific & Technological Cooperation (COMSTECH)
- ☐ IOR-ARC Regional Centre for Science and Technology Transfer (IOR-ARC RCSTT)
- ☐ Centre for Science and Technology of the Non-Aligned and Other Developing Countries (NAM S&T Centre)
- ☐ World Association of Industrial & Technological Research Organizations (WAITRO)



IROST PROGRAMMES FOR 2014 -15

IROST in cooperation with COMSATS will host and organize

Training Workshop
on

‘Repair and Maintenance of Engineering Equipment’

August 25-27, 2014, Tehran, I. R. Iran

This event will be jointly sponsored by COMSATS and ISESCO.



IROST PROGRAMMES FOR 2014 -15

**International Training Workshop, Conference and
Exhibition**

on

‘Desalination Technologies’

October 14-16, 2014

Tehran, I. R. Iran

**Participants from COMSATS member countries are welcome
to take part in this international programme.**



IROST PROGRAMMES FOR 2014 -15

International Seminar and Workshop
on

‘Halal Food Standardization, Commercialization,
Application of Food Encapsulation Technology and
Food Nano Processing’

September 14-16, 2014
Tehran, I. R. Iran

Participants from COMSATS member countries are welcome to take part in this international programme.



IROST wishes to initiate collaboration with other COMSATS Centres of Excellence in the areas of :

Establishment of an International Thematic Research Group on ‘Renewable Energy’

The Establishment of an ITRG on ‘Renewable Energy’ led by IROST which will be discussed tomorrow in Technical Session–III of the COMSATS meeting.



IROST Programmes for 2014 -15

Establishment of Specialized Centre on
" *International Centre Advanced for Science and
Technology Research* "

IROST would like to establish the centre which may be affiliated to COMSATS and other international organization to train the participants, senior officials and trainers from member states of supporting international organizations. Therefore we would like to be endorsed by **17th Meeting Coordinating Council of COMSATS**



IROST PROGRAMMES FOR 2014 -15

IROST establishes a Research Center for Policy and Diplomacy

IROST signed an agreement with Iranian Vice Presidency for Science and Technology on establishment of a Research Center for Policy and Diplomacy within IROST's Research Institute for Technology Development Studies (RITDS).

The center has already started its activities by conducting the following three projects:

- Transition Map of S&T policy to innovation: A Model Design
- Post Evaluation of STI
- Forecast of STI in the I. R. Iran



IROST Programmes for 2014 -15

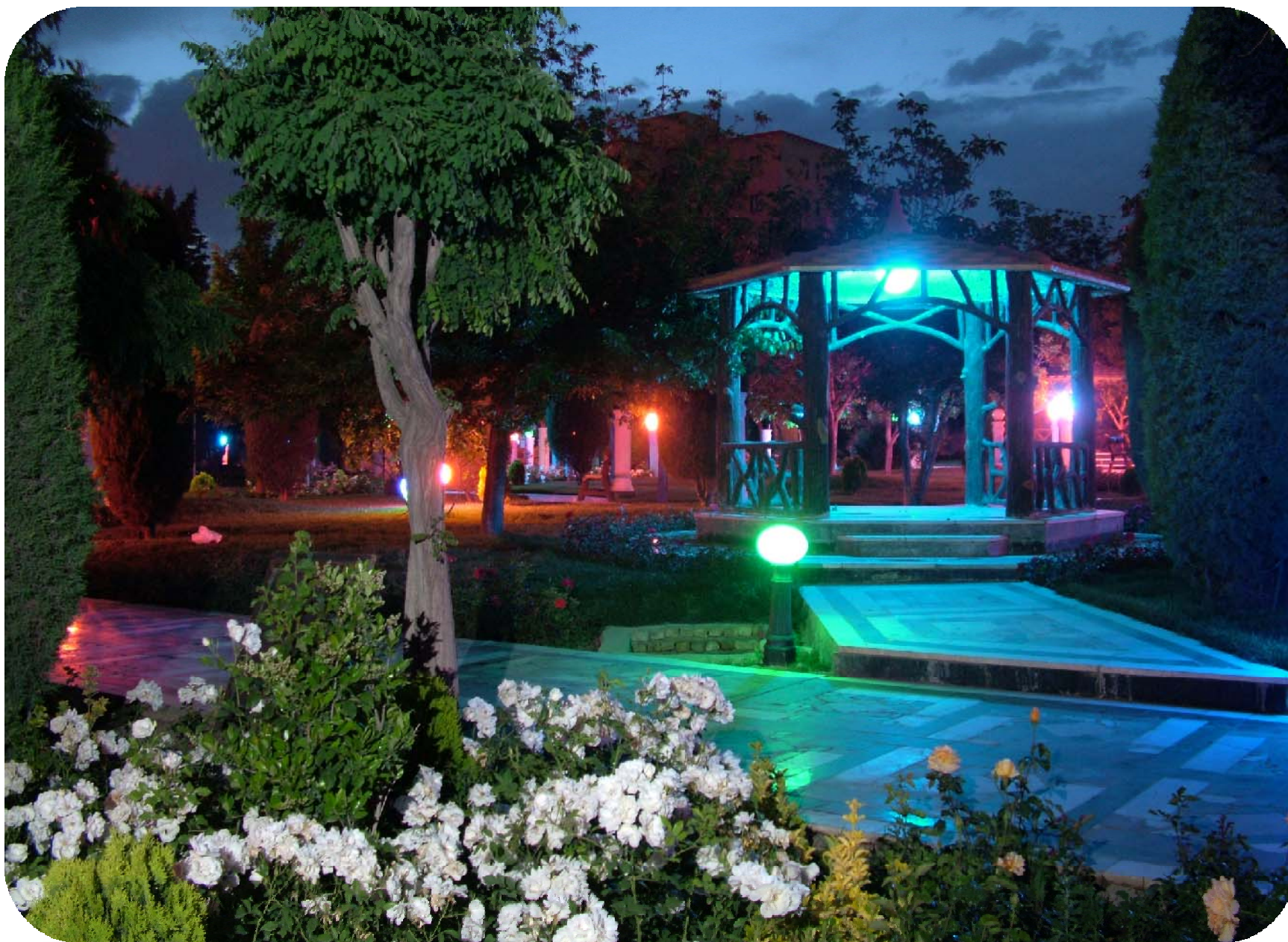
Establishment of Specialized Centres at IROST:

- 1. Regional Desalination Center (RDC)**
- 2. National and International Centre for Halal Food Standardization**
- 3. Sustainable Health Research Centre**
- 4. Aerodynamic Research Centre**
- 5. Herbal Medicine Research Centre**



IROST wishes to initiate collaboration with other COMSATS Centres of Excellence in the areas of:

1. Bio-fuels and their applications
2. Renewable Energies and their applications
3. Agriculture and Water-Industrial and Waste Management
4. Space Technologies and applications
5. Medicinal Plants Training, Technology Transfer, and Commercialization of Technology





Thank you very much for your kind attention

