





# PAKISTAN Strategy Support Program



# **Research to Support Vision 2025**

Competitive Grants Program, 3rd Round Awards to 35 Projects, June 2014

# **Integrated Energy**

### **Development of Demand Side Energy Management in Pakistan**

Dr. Fahad Javed, GIFT University, Gujranwala

Assesses alternatives for energy demand management using computer simulation

# An Integrated Model of Sustainable Energy Systems

Dr. Khanji Harijan, Mehran University of Engineering and Technology Develops an operations research integrated energy sector and decision aid model

# **Impact of Climate Change on Electricity Consumption**

Dr. Pervez Janjua, International Islamic University, Islamabad, Islamabad Investigates potential effects of climate change on energy demand

# Energy Security through Adopting Biogas System in Kyber Pakhtunkhwa

Dr. Malik Inayatullah Jan, Centre for Research and Development, Peshawar Evaluates potential for small-scale organic energy production in rural KPK

### **Water Security**

### **Developing a Real-Time Intelligent Water Allocation System**

Dr. Muhammad Jehanzeb Masud Cheema, UAF, Faisalabad Integrates remote sensing and hydrological models to inform water allocation decisions

### Optimal Groundwater Management in the Indus Water Basin

Dr. Steven Helfand (Ph.D. candidate, Sanval Nasim), University of California, Riverside Models groundwater extraction and quality under alternative policies

### **Efficient Irrigation Technologies for Groundwater Security in Balochistan**

Dr. Junaid Alam Memon, PIDE, Islamabad

Investigates efficient irrigations systems and farmers' willingness to adopt

### **Modernization of Infrastructure**

### Urban Transportationand Access to Economic Opportunity: Lahore Metrobus

Dr. Hadia Majid, LUMS, Lahore

Evaluates effects of Metrobus on labor mobility and earnings

### **Infrastructure Development and Economic Growth**

Dr. Samina Sabir, University of Azad Jammu and Kashmir, Muzaffarabad Assesses impacts of public physical and social investments on aggregate growth

# **Efficiency of Alternative Public Investments**

Dr. Qazi Masood Ahmed, Institute of Business Administration, Karachi Assesses impacts of public physical and social investments on growth in 8 sectors

### Pakistan KLEMS Database and Productivity Measurement at the Industry Level

Dr. Abid Aman Burki, LUMS, Lahore

Creates internationally-consistent growth and productivity database for 14 industries

### **Indigenous Resource Mobilization**

### Regime Switches in Pakistan's Fiscal Policies

Dr. Iftikhar Ahmad, PIDE, Islamabad

Assesses effects of government spending/taxes on growth and trade balance

# Implementation of UIPT Reforms in Punjab

Daniyal Aziz, GINI, Islamabad

Examines possibilities and impediments to updating and reform of UIPT

### Improved Estimates of Changes in Stocks/Inventories for National Accounts

Zafar Ul Hassan, Planning Commission of Pakistan, Islamabad

Develops accurate and consistent estimates of changes in stocks

# **Value Addition in Commodity Producing Sectors**

# Strategies to Control Diseases and Increase Productivity of Livestock Sector

Dr. Muhammad Ashfaq, UAF, Faisalabad

Assesses impediments to improved disease control and livestock quality

### Food Utilization among Poor Households in Peri-Urban Areas of Punjab

Dr. Muhammad Khalid Bashir, UAF, Faisalabad

Investigates consumption among peri-urban households with focus on food safety

### Effective of Biofertilizer on Productivity of Chickpeas in Cholistan-Bahawalpur

Dr. Maqshoof Ahmad, Islamia University, Bahawalpur

Demonstration trials and economic analysis of biofertilizer to raise production

### Medicinal and Aromatic Plants to Promote Economic Development in Swat Valley

Dr. Hassan Sher, University of Swat

Demonstrations and economic analysis of MAP cultivation to raise incomes and preserve species

# **Local Marketing Channels and Farm Profitability**

Dr. Bushra Yasmin, Fatima Jinah Women University, Rawalpindi

Investigates marketing alternatives to raise farm incomes

# **Export Promotion and Private Sector Led Growth**

# A Value Chain Analysis of the Leather Industry

Dr. Zahoor Ul Haq, Abdul Wali Khan University, Mardan

Examines intra- and inter-firm determinants of value-added and export performance

# Channelizing Pakistan-Afghanistan Informal Trade into Formal Channels

Dr. Adil Khan Miankhel, Embassy of Pakistan, Kazakhstan

Examines informal and formal trade and possible preferential trade arrangement

# Social Compliance Audits in the Textile and Garments Sector

Muhammad Faraz, Bahria University, Karachi

Investigates labor practices that affect social compliance export requirements

# Developing a Vibrant Financial System and Bond Market

Dr. Syed Kumail Abbas Rizvi, Synergistic Financial Advisors, Lahore

Investigates market discipline on banking sector and potential for bond market development

### Dynamic Behavior of Corporate Investment in Pakistan

Dr. Adnan Haider, Institute of Business Administration, Karachi

Investigates micro-level/balance sheet determinants of KSE-Listed firm investment

# **Effects of Corporate Governance on Earnings Management Practices**

Bilal Hafeez, National University of Computer and Emerging Sciences, Islamabad

Investigates effects of corporate governance and audit regulation on firm performance

# **High-Level Human Resource Management to Enhance Firm Performance**

Dr. Mansoor Ahmadand Dr. Muhammad Majid Khan, COMSATS, Islamabad Investigates effects of large-firm HR management on absenteeism and other indicators

### **Strategic Human Resource Management Practices for Medium Enterprises**

Dr. Naveed Ur Rehman, Igra University, Karachi

Investigates effects of medium-firm HR management on performance

### Livelihood Diversification in the Rural Economy in Punjab and Sindh

Dr. Faisal Jamil, NUST, Islamabad

Investigates farm, non-farm and remittance income strategies of rural households

### **Social Capital**

# Competition between Private and Public Schools in Rural Pakistan

Dr. Muhammad Jehangir Khan, PIDE, Islamabad

Assesses alternatives for improving school quality and effects on attendance

### Child Labour in the Urban Informal Sector

Dr. Ambreen Fatima, AERC, Karachi

Assesses supply and demand determinants of child labour

### Health Benefits of Urban Open Spaces for Adolescent Girls

Dr. Nomana Anjum, Allama İqbal Open University, Islamabad

Assesses effects of open space access and outdoor recreation on health of adolescent girls

### Financial Literacy Challenge and Empowerment

Dr. Imran Ali, COMSATS, Lahore

Investigates strategies for raising family financial management of low-income women

### Socio-Economic and Health Status of Female Cotton Pickers

Dr. Muhammad Abubakkar, Sub Campus UAF, Vehari

Investigates health and economic status of women cotton pickers

### **Employment in Textile Sectors**

Dr. Muhammad Khan, COMSATS, Lahore

Evaluates workplace safety and health status of women workers in cotton-textile industries

### Precarious Lives, Disrupted Bodies: Social Repair after Disaster in Northern Pakistan

Omer Aijazi (Ph.D. candidate), University of British Columbia, Vancouver

Examines social repair after natural disasters and recovery strategies