This course will help participants in structuring research or extension program around the concepts of agroecology.

MSU is a leader in agroecology, IPM, sustainable agriculture and genetic technology research with an unsurpassed resident expertise and experience in systems interactions and biologic processes.

Multidisciplinary projects at MSU are generating information on what drives biological processes and on managing them for efficient production and resource conservation. MSU faculty representing diverse disciplines regularly conduct training programs in local and international settings.

Cooperating Departments and Units

- Institute of International Agriculture
- Kellogg Biological Station
- NSF - Long Term Ecological Research (LTER) Project
- Center for Integrated Plant Systems
- Department of Entomology
- Department of Crop and Soil Sciences
- Department of Horticulture
- Department of Plant Pathology
- Department of Agricultural Economics
- Department of Sociology
- MSU-Extension
- Michigan Department of Agriculture
- Private Institutions
- Farmers and Farmers Associations

For Further Information, Please Contact:

Dr. Karim Maredia
Phone: (517) 353-5262
Fax: (517) 432-1982
Email: kmaredia@msu.edu

Application Deadline: May 15, 2012

Registration Fee: $ 250 (non-Refundable)
Course Fee: $ 3,250

*Course fee includes the instruction fee, information packages, local travel, meals and lodging expenses.

*Course fee is non-refundable after May 31, 2013.

MSU is an affirmative action, equal opportunity institution.

ORGANIZED BY

WorldTAP

http://worldtap.msu.edu/

World Technology Access Program (WorldTAP)
(College of Agriculture and Natural Resources)

Kellogg Biological Station

MICHIGAN STATE UNIVERSITY

An International Short Course

Agroecology, Integrated Pest Management (IPM) and Sustainable Agriculture

June 16 – 26, 2013
Michigan State University

COURSE RATIONALE

Globally, countries are trying to increase the productivity and profitability of the agricultural sector of their economies, to feed growing populations and increase the quality of life for millions of people. Those goals must be achieved through practices that sustain those gains while protecting the environment and human health, and conserving biodiversity and other natural resources. In this context, ecological approaches to food production are increasingly important as alternatives to conventional, high input approaches.

Agriculture throughout the world is in the early stages of a new biological revolution. Research has led to rapid advances in biotechnology and to a greater understanding of biological processes. This course is designed to help participants better understand the management of new technologies and biological processes toward the ends of achieving higher productivity and enhancing environmental

quality within the context of available inputs of more traditional fertilizers and chemical pesticide technology.

COURSE DESCRIPTION

Michigan State University (MSU) is recognized as a center of excellence in international agricultural development and training. A multidisciplinary faculty will organize a two-week course focusing on the principles of Agroecology, integrated pest management (IPM) and sustainable agriculture.

The course will provide meaningful exposure to topics related to appropriate technology. The course will also address the social and equity issues in agriculture. Participants will receive background information and publications on these subjects.

COURSE COMPONENTS

- Concepts and Principles of Agroecology, IPM and Sustainable Agriculture
- Ecological Opportunities in Agricultural Productivity: Insects, Pathogens, Weeds, Nutrients, Soil, and Water
- Agronomic Opportunities in Agricultural Productivity:
  - Agroecosystem design and systems Integration
  - Environmental consequences of various systems
- New Horizons in Agriculture:
  - Biotechnological approaches to agricultural production
  - Ecologically based pest and nutrient management
  - Social concepts
- Organic production
- Integrated Natural Resource Management, including Soil, Water and Biodiversity Management
- Extension Strategies, Adoption/ Acceptance of New Technology
- Information and Training Resources in Agroecology, IPM and Sustainable Agriculture
- Field Visits to Agricultural Research
- Stations and Innovative Farmers Sites