

Course title: Integrated Impact Assessment				
Course code: MPD 145		No. of credits: 2	L-T-P: 21-7-0	Learning hours: 28
Pre-requisite course code and title (if any): NA				
Department: Department Policy Studies				
Course coordinator: Prof V Subramanian			Course instructor: Prof V Subramanian	
Contact details: subra42@gmail.com				
Course type: Core			Course offered in: Semester 2	
Course description:				
<p>There is growing realization that the multi-dimensional nature of sustainable development targets requires the use of different disciplinary approaches, in an integrated framework, to the impact assessment of development projects/programmes. Integrated Impact Assessment (IIA) provides such a framework for a balanced consideration of the economic, environmental, social and health impacts of development interventions at the project, sector and economy levels. The course in Integrated Impact Assessment (IIA) is designed to build detailed knowledge, understanding and skills among students for conducting IIA, so that they are able to identify sustainable modes of environmental operation. The course starts with an overview of IIA – the different methodologies on which it draws the state of the art, current practices, constraints and future directions. The final module of the course is intended to strengthen students’ analytical capacity and assessment skills by making them work through actual/simulated scenarios.</p>				
Course objectives: NA				
Course contents				
Module	Topic	L	T	P
1	<p>Introduction & an Overview of IIA</p> <ul style="list-style-type: none"> - Defining IIA; Sustainable Development challenges and need for IIA - Key Approaches of IIA: Environment, Social Health and Economic - Current Practices, Changing Perspectives & Debate in IIA; Contribution of IIA to decision-making – prospects & constraints; Stakeholder participation in IIA – importance, methodological and practical issues <p>In this module, various approaches to IIA are discussed with examples including Life cycle analysis, Environmental management, waste reduction in all way of manufacturing processes, indicators for various studies and index and their limitation with examples. For various types of assessment, examples are shown from India.</p>	4	1	
2	<p>Assessing Environmental Impacts (1): the EIA Approach/SEA</p> <ul style="list-style-type: none"> - Environmental Impacts – examples, need for assessment, difficulties; The EIA Approach – Background, Objectives, Components & Techniques, Impact prediction & analysis, Treatment of Risk and Uncertainty, EIA inputs to the project cycle and development planning, Strategic Environmental Assessment (SEA). - EIA and SEA case studies. <p>In this module, procedures for SEA and EIA, their similarities and differences and case studies from India are discussed in detail. Indicators suitable for SEA specific to India and their usefulness are discussed; EIA steps are discussed at length EIA and SEA case study</p>	6	2	
3	<p>Assessing Environmental Impacts Biodiversity Impact Assessment (BIA)</p> <ul style="list-style-type: none"> - Role of BIA in the existing EIA process, Identification, prediction and evaluation of impacts on biodiversity, techniques of biodiversity impact assessment and monitoring, threat reduction methods and case study. <p>The module discusses methodology for Biodiversity assessment in the light of IUCN guidelines are discussed with examples from India. Assessment tools specific to biodiversity components and their importance are discussed.</p>	2		
4	<p>Incorporating Health Concerns: the HIA Approach</p> <ul style="list-style-type: none"> - Developing framework for HIA Analysis, Changing concept and approach in Health Impact Assessment. - Health Need Assessment, tools and techniques in HIA and Case Study <p>The module discusses various concepts of health risk assessment in the light of WHO mandates. Protocols for various levels and types of health assessment are analysed with special reference to India.</p>	4	1	
5	<p>Handling Social Issues: the SIA Approach</p> <ul style="list-style-type: none"> - SIA and community, marginalized/vulnerable groups, indigenous people, resettlement & rehabilitation and development - SIA Case Studies 	3	2	

	Specific methods suitable for India under different social strata are discussed; case studies for many sectors such as education, water etc. in the light of SIA are discussed with data from many developing countries.			
6	Mapping Tools and Techniques in IIA Role and relevance of GIS Techniques in IIA All sustainability studies need a variety of ground level data. Many data generation tools, their basis, reliability and applicability are discussed.	2	1	
	Total	21	7	
Evaluation criteria:				
<ul style="list-style-type: none"> ▪ Minor tests : 30% ▪ Assignments + field work : 20% ▪ Final examination : 50% 				
Learning outcomes: At the end of the course, the student would be able to;				
<ul style="list-style-type: none"> - Understand various dimensions of impact assessments - Acquire knowledge about an array of tools and techniques of the IIA - Understand the domains of applications of such tools and techniques 				
Pedagogical approach: NA				
Suggested Readings :				
<ol style="list-style-type: none"> 1. Canter, L.W. 1996. Environmental Impact Assessment. 2nd Edn. New York, McGrawHill. 2. Asian Development Bank 1997. Environmental impact assessment for developing countries in Asia, Vol I & II. ADB Publication 3. Lee, N. and C. Kirkpatrick (Eds). 2000. Integrated Appraisal and Sustainable Development in a Developing World. Cheltenham, Edward Elgar. 4. British Medical Association 1998. Health and Environmental Impact Assessment- an integrated approach. Earthscan 5. Vanclay F and Bronstein D A 1995. Environmental and Social Impact assessment, Wiley publishers. 6. Linkage methods for environment and health analysis – General guidelines. Edited by D Briggs, C. Corvalan, M. Nurminen, World Health Organization, Geneva, 1996. 136 p 7. Handbook of Environmental Impact Assessment. R.R. Bathwal. New Age, international Publishers. 8. Dale, R. 2004. Evaluating Development Programme and Project, Second Edition, Sage Publication. 				
Additional information (if any): NA				
Student responsibilities:				
Attendance: At-least 75% attendance will be necessary to be able to appear for the final exam.				

Course Reviewers:

Dr Niraj Sharma, CRRI