

**JAIPURIA INSTITUTE OF MANAGEMENT, NOIDA**  
**PGDM / PGDM (SM)/ PGDM (M)**  
**2017-19 Batch**

**Course Title: Sustainability in Resource Management - Environment Perspectives**

**Course Code: CP-LA01**

**Session Plan 1**

**Total Sessions & Interactions/Assessments: 18**

**Course Description & Objectives**

This course will focus on managing systemic risks and dealing with uncertainty due to environmental change impacts on resources, including monitoring known risks as well as reducing the unknown risks, through management solutions and policy interventions. The course will also focus on the identification of adaptation measures with particular emphasis on sustainable management of natural resources under changing environment and the possible strategies to close the gap between raw materials supply and demand to control and resolve future issues or conflicts. The aim will be to discuss the skills, tools and techniques needed for design, implementation, monitoring and evaluation of sustainability of project work plans from the perspective of key stakeholders involved. On successful completion of this course, students will be able to understand and envision the principles, practices and concept of sustainability from different perspectives, as an inherent essentiality and a characteristic of successful long-term project planning.

**Learning Outcomes**

1. To study the different processes involved and the associated interplay between changing environment and resource management
2. To learn about the material flows and the associated vulnerabilities and risks in sustainable resource management and their assessment
3. To understand the concept of Integrated Resource Management
4. To develop a comprehensive understanding towards the need for innovative interventions for building resilience through management solutions, guiding frameworks and adaptation strategies needed in sustainable response to changing environment

<b>Course content</b>		
<b>S.No.</b>	<b>Topic</b>	<b>No. of Sessions</b>
1.	<p><u>General Overview of Sustainable Development and Sustainability:</u></p> <p>History and basic concepts of sustainable development, visions and different perspectives emphasizing various aspects such as energy &amp; food security, business &amp; economic development or environmental protection. Local and global sustainability, Future scenarios</p> <p>Understanding variability, drivers and physical basis of change (focus on consumption); patterns of large-scale variability</p> <p>Global environmental issues &amp; international regulations; Issues related to international trade and its environmental linkages</p> <p>Sustainable enterprises - corporations of the future</p>	4
2.	<p><u>Towards Sustainable Production and Consumption:</u></p> <p>Concepts and practices involved with sustainable production and consumption and the respective roles of businesses, consumers and other stakeholders. Approaches in cleaner production, maintaining ecosystem services, eco-efficiency &amp; preventing pollution.</p> <p>Environmental Cost Benefit Analysis of projects; valuing environment as an input in production and accounting for externalities in context of supply chain management</p> <p>Complex sustainability issues faced by businesses in context of climate change, resource quality/quantity, supply chain relations, labour, occupational hazards, human rights, etc.</p> <p>Importance of stakeholder engagement and communication; Role of Corporate Social Responsibility (CSR) towards attaining sustainability – concepts, principles, standards &amp; examples</p>	4
3.	<p><u>Impacts on Systems and Productivity:</u></p> <p>Key drivers and observed impacts on resource availability and demand, major ecosystems &amp; global biodiversity, agriculture and food security, land use &amp; forestry, energy security and transportation; Socio-economic</p>	4

	<p>and environmental impacts and indicators of risks involved. Special focus on issues faced in agri-business management</p> <p>Influences and feedbacks of changes at systemic level; Understanding and addressing vulnerability (and factors responsible) at various stages of resource management; Augmented product design strategies</p>	
4.	<p><u>Strategies in Response to Changes Influencing Sustainability:</u></p> <p>Integrated Impact Assessment; Vulnerability assessment and adaptation frameworks - challenges, methodology and tools to evaluate impacts; Managing risk and uncertainty; Addressing critical knowledge gaps</p> <p>Integrated Resource Management; Decision support systems - tools and indicators; Resolution of potential conflicts in resource management; Adaptation and mitigation strategies - challenges and opportunities; Production process and product design related strategies; Implications for corporate policy, value creation and long-term sustainability</p> <p>Case studies, assignments &amp; group discussion</p>	6
	<b>Total</b>	<b>18</b>

### **Pedagogy and Evaluation components**

The course will be delivered through a mix of lectures, case studies, etc with focus being active classroom discussion and supplemental reading material / suggested reading to follow up afterwards to develop further clarity and deeper understanding. There will be assignments to be completed by the students in groups and their appraisal, followed by a quiz/short exam towards the end of semester.

- Group discussion - 30 %
- Assignment / Case study - 40 %
- Quiz / Short Exam - 30 %