科目ナンバリング															
授業科目 <英訳>	名 Produ > Impa	Impacts of Climate Change on Food 担当者所属 Production-E2 担当者所属 Impacts of Climate Change on Food Production-E2 Production-E2 地名・氏名													
群	統合科	統合科学科目群			分野(分類)	環境					使	用言語	英語	英語	
旧群		単位数	単位数 2単位		時間数	30時間		授業形態		講	褭(対面授調	業科目)		
開講年度・ 開講期	2025・ 後期集	025・ 後期集中 曜時限 第		集	中		配当	当学年 主とし		て1回生 対象学		対象学:	生 全学向		
[授業の概要・目的]															
This course will focus on the impacts of climate change on food production systems, especially on rice production systems. The current nature of scientific as well as evidence of the changing climate will be shown and discussed. The course will provide key understanding on the connection between food production and climate, using agroecosystem approaches. The course will introduce information systems as collaborative tools to assess the impacts of climate change on rice production systems as well as alternative options to collectively adapt to the changing climate in the future.															
[到達目	[到達目標]														
 To understand nature of climate change. To understand the connection of climate and food production systems, especially rice crops, using agroecosystem approaches. To understand methods to assess the impacts of climate change on rice production systems. [授業計画と内容] Introduction & concepts and terminology in climate & weather. & 3. Introduction to human societies and food production systems. 															
 4. Transitions of human from hunting & gathering, early agricultural systems where rice was domesticated as a staple food crop. 5 & 6. Agroecosystems concepts & approaches to understand the connection of climate/weather and food production systems. 7. Emergent properties of various rice production systems (Upland, rainfed, irrigated, deepwater). 8. Mid-term examination 9. Soil-Crop-Weather Information Systems to assess impacts of climate change on food production systems. 10 & 11. Integrated information systems to assess the impacts on emergent properties. 12. Alternative options for climate change adaptation and mitigation. 13. Economics and policy of climate change. 14. Review and Conclusion 15. Final Examination 															
IS. Final Examination [履修要件]															
 Self-directed study is required for the essential knowledge for the class. Self-organized to learn and contribute to the class. 															
[成績評価の方法・観点]															
Total 100 points: 1. Class attendance (10 points). 2. Assignments (30 points) Impacts of Climate Change on Food Production-E2(2)へ続く															

Impacts of Climate Change on Food Production-E2(2)

3. Mid-term examination (30 points)

4. Final examination (30 points).

Those who are absent more than three times will NOT be credited.

[教科書]

Johnson, A. W. and T. Earle ^{The Evolution} of Human Societies: From Foraging Group to Agrarian State (Stanford University Press) ISBN:978-0-80474-031-9

Hillel, D. and C. Rosenzwieg (eds.) ^FHandbook of climate change and agroecosystems. ^J (Imperial College Press) ISBN:978-1-84816-655-4

Tsuji, G.Y., G. Hoogenboom, and P.K. Thornton ^{II} Understanding options for agricultural production (Kluwer Academic Publishers & ICASA) ISBN:0-7923-4833-8

[参考書等]

(参考書)

IPCC ^𝔽IPCC 5th Assessment Report (IPCC)

Journals (for example):

1. Agriculture, Ecosystems & Environment,

2. Agricultural Systems,

3. Computers and Electronics in Agriculture,

4. Southeast Asia Studies-Kyoto University.

(関連URL)

http://www.ipcc.ch/publications_and_data/publications_and_data_reports.shtml

[授業外学修(予習・復習)等]

1. Read the class note and/or Chapters before class

2. Review questions after class.

3. Complete all assignments.

[その他(オフィスアワー等)]

1. The course is for 1st year students.

2. Consultation based on Kyoto University office hours.

[主要授業科目(学部・学科名)]