

**1. Course Code**

2274

**2. Course Title**

Urban Planning

**3. Teacher**

LUKUMWENA, Nsenda

**4. Term**

Spring 2

**5. Course Requirements (Courses / Knowledge prerequisite for this course)**

Basic knowledge of google earth usage.

**6. Course Overview and Objectives**

This course hopes to archive a triangular knowledge sharing, teacher-student, student-student and teacher-students. The course introduces students of several backgrounds to basic notions of urban planning in order to help them better understand the environment in which they are likely to implement their respective research projects. The course thus focuses on the relationships between land use, mobility, social content and policy. In this course students will then:

- (1) learn the basics of urban planning and the role it plays in the development process of cities, both conventional and smart, in developed and developing economies (countries). With the acquired knowledge, students can approach urban issues and policy utilizing ICTs knowledge acquired from other courses;
- (2) learn space syntax—an analytical tool to analyze and interpret the relationships between physical planning and social content through the study of people's movements. The acquired knowledge in space syntax will help students better analyze and understand any given physical environment, urban and rural and predict its successful usage. Yet, for the purpose of this class, a group project is given to students whereby they explore the application of space syntax and evaluate their understanding of the course.
- (3) learn ways to engage in a group project whereby each and every participant will learn from each other during the collaborative process period.

**7. Course Outline**

- 1 Overview of the evolution of cities and urban planning as well as recent trends in the practice of urban planning
- 2 Reading into gathering and channeling space
- 3 The role and power of Open spaces in the city
- 4 The role of urban planning in the cities development process over time
- 5 Understanding the basic principles of the Neighborhood Unit
- 6 Space Syntax and the use of ICTs in urban planning (1)

- 7 Applying Space Syntax to an urban segment (2)
- 8 Introduction to Smart Cities
- 9 Functional Planning - Land use systems, including lessons from Japan
- 10 Land consolidation, (Re)adjustment (1)
- 11 Land consolidation, (Re)adjustment, including some lessons from Japan (2)
- 12 Functional Planning - Public Infrastructures and SDGs
- 13 Functional Planning - Urban Transportation—forms of Mobility
- 14 Technology Planning, associating urban planning to technologies over the time
- 15 Final Project presentation and Evaluation
- 16

#### 8. Textbooks (Required Books for this course)

None. the course engages students in several discussions using extensively videos on current issues related to urban planning and urban design. Students are encouraged to come up with articles related to urban planning out of their readings guided by the course under my supervision. I usually pick up video material that students have a chance to read prior to the course. Such material include the following topics, mobility, rapid, medium and slow; public spaces, smart and creative cities, etc.

#### 9. Reference Books (optional books for further study)

1. Human Centered Design Tool Kit 2nd Edition 2011 by IDEO
2. Publications: Urban Planning
3. Creative Cities
4. The City Shaped: Urban Patterns and Meanings By Spiro Kostof
5. Rethinking the informal City?Critical Perspectives from Latina America edited by Felipe Hernandez and Lea K. Allen
6. GIS Organizations and People A Socio-technical Approach by Derek Reeve and James Petch Published in 1999
7. Urban contemporary Planning by Levy, 2015
8. Urban Land Use Planning by Philip R. Berke, David R. Godschalk, and Edward J. King with Daniel A. Rodriguez, 2006.
9. E-Planning, ICTs for Urban Development and Monitoring by Carlos Nunes Silva, 2009
10. Urban Planning, 2nd Edition by Anthony J. Catanese and James C. Snyder, 1977
11. Building Smart Cities, Analytics, ICT, and Design Thinking 2016 by carol L. Stimmel, CRC Pres
12. Infill (Re)development, An Optimal Approach for Citywide Informal Settlement Upgrading by Bashir Ahmad Amiri, Nsenda Lukumwena, 2019 LAMBERT academic Publishing, Germany

#### 10. Course Goals (Attainment Targets)

- (1) Gain analytical and interpretative planning skills likely to support appropriate planning and design interventions and/or policies.

- (2) Understand the relationship between physical planning and social content—a key concept for undertaking the development of planning and its implementation in a fashion that earnestly fits the context of concern.
- (3) Building on (1) and (2), students can thus (i) initiate projects that meaningfully and socially impact the targeted society and its urban domain; and (ii) effectively forecast the usefulness and effectiveness of the projected urban development of the initiated projects.
- (4)
- (5)
- (6)
- (7)
- (8)

### 11. Correspondence relationship between Educational goals and Course goals

Educational goals of the school		Course Goals	
High level ICT skills	Basic academic skills	(1), (2)	
	Specialized knowledge and literacy	(2),(3)	
Human skill (Tankyu skill)	Ability to continually improve own strengths	(3)	
	Ability to discover and resolve the problem in society	Problem setting	(1), (2)
		Hypothesis planning	(1)
		Hypothesis testing	(3)
		Practice	(3)
	Fundamental Competencies for Working Persons	Ability to step forward	(2)
Ability to think through		(1),(2)	
Ability to work in a team		(3)	
Professional ethics			

### 12. Evaluation

Goals	Evaluation method & point allocation					
	examination	Quiz	Reports	Presentation	Deliverables	Other
(1)			○	○	○	
(2)			○	○	○	
(3)			○	○	○	
(4)						
(5)						
(6)						
Allocation			40	20	40	

### 13. Evaluation Criteria

Examination	
Quiz	
Reports	The report details the project

Presentation	The presentation shows the ability of the student to sell one's project and tells about the degree of confidence of the student and the degree to which they can be convincing about their arguments.
Deliverables	Students deliver a project comprising of a report and a visual presentation. The project is related to a segment of the city picked up by the teacher. Based on the knowledge acquired during the course, students work on a given segment of the city of which they identify issues, analyze them and propose possible improvements.
Other	

#### 14. Active Learning

Hourly percentage of active learning within the whole class time		40%
1	Active learning such as problem solving assignment using the knowledge and skills acquired in class.	Sometimes
2	Active learning such as group works and discussions.	Sometimes
3	Outcome presentations and feedbacks.	Sometimes
4	Students actively make decisions on how the class should be conducted.	Sometimes

#### 15. Notes

No exam is required. Term report and presentation are required instead. Course reading references will be provided to students timely.

#### 16. Course plan

(Notice) This plan is tentative and might be changed at the time of delivery

Lesson 1: Overview of the evolution of cities and urban planning as well as recent trends in the practice of urban planning

(Lecture 90 min)

This lesson presents a Synoptic overview of cities in history, from the legacy of the past to contemporary cities. Students are introduced to the basics of space structure, gathering and channeling spaces.

---

Lesson 2: Reading into gathering and channeling space

(Lecture 30min, Interactive 60 min)

---

Students attempt to read into gathering and channeling spaces based on Kevin Lynch's image of the city principals and Louis Khan's interpretation of the street as Room.

---

Lesson 3: The role and power of Open spaces in the city

(Lecture 60min, Interactive 30 min)

---

The lesson reviews the role played by open spaces in the City generic forms in history—from organic patterns to the grid pattern to the city as a diagram, to the grand manner and the skyline.

---

Lesson 4: The role of urban planning in the cities development process over time

(Lecture 90min)

---

This lesson explores the contribution of urban planning to the development process of cities and regions in the past and today, in developed and developing countries, from traditional to smart cities. Students are brought into discussing the extent to which new technologies impacting the city today and their future influence as technologies continue to evolve at exponential speed.

---

Lesson 5: Understanding the basic principles of the Neighborhood Unit

(Lecture 90 min)

---

A neighborhood unit is the smallest unit in urban planning. Students will learn the very basic principles of a neighborhood unit. Gaining an understanding unit enables the student to understand the functioning of basic movements that we all make on daily basis.

---

Lesson 6: Space Syntax and the use of ICTs in urban planning (1)

(Lecture 90min)

---

Introduction to the basics of Space Syntax, its application to urban planning/design, as well as the role of ICTs in the planning and design processes.

---

Lesson 7: Applying Space Syntax to an urban segment (2)

(Interactive 90min)

---

Students apply the space Syntax principles to a given urban segment.

---

---

Lesson 8: Introduction to Smart Cities

(Lecture 90min)

---

Discussing the framework of smart cities. Students prepare and engage in a discussion on smart cities both in the developed and developing countries.

---

Lesson 9: Functional Planning - Land use systems, including lessons from Japan

(Lecture 60min, Interactive 30 min)

---

Reading into Physical planning and urban design and urban development. Students will learn the difference between urban planning and urban design. Some lessons from Japan.

---

Lesson 10: Land consolidation, (Re)adjustment (1)

(Lecture 60 min Interactive 30 min)

---

Through the overview of the community master plan (or Community wide), students will gain an understanding of the land use Design and of the Real Estate Development. This section is valuable and critical for developing countries whose cities are dominated by informal sprawl and settlements that require a lot of fixes. At the end of the class students are asked to select a section of an informal city in their countries of origin for the next class.

---

Lesson 11: Land consolidation, (Re)adjustment, including some lessons from Japan(2)

(Lecture 30 min, Presentation 60 min)

---

Students select a section of an informal city in their own countries and apply the principles of land re-adjustment, present and self-evaluate their proposals.

---

Lesson 12: Functional Planning - Public Infrastructures and SDGs

(Lecture 90 min)

---

Students will learn about Public Infrastructure, values, and communities sustainability. Public Infrastructures include physical, social, environmental and digital infrastructures.

---

Lesson 13: Functional Planning - Urban Transportation—forms of Mobility  
(Lecture 45 min, Interactive 45 min)

---

Students learn about Urban Public Transportation planning, systems and delivery. Rapid, medium and slow mobility are examined.

---

Lesson 14: Technology Planning (Interactive Lecture 90 min)

---

Students will learn how to associate technologies (from the introduction of computers into planning to ICTs) to urban planning? be it physical, social or environmental.

---

Lesson 15: Presentation and Evaluation (Presentation, 90 min)

---

Students make their final presentation for evaluation.

---