



FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Presented at the FIG Working Week 2024,
19-24 May 2024 in Accra, Ghana

Exploration and Practice of China's Construction Land Saving and Intensive Use Evaluation System

Xiaoli Wang

Senior Engineer

China Land Surveying and Planning Institute

wangxiaoli@mail.clspi.org.cn



Monday 20 May 2024





FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

CONTENTS



Background



Evaluation System



Situation & Challenges



Suggestions

ORGANISED BY



PLATINUM SPONSORS





FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Background

- Human-land relationship conforms to the continuous succession of civilization



Primitive Civilization:
The passive adaptation stage



Agricultural Civilization:
The understand and adapt to
nature stage



Industrial Civilization:
The influence and
change nature stage



Ecological Civilization:
High quality development
stage of Man and nature
coexist in harmony

ORGANISED BY



PLATINUM SPONSORS





FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Background

• Definition of land saving and intensive use

- a land use model
- purpose : continuously optimizes the human-land relationship enhancing efficiency and benefits
- measure: reducing consumption and increasing input

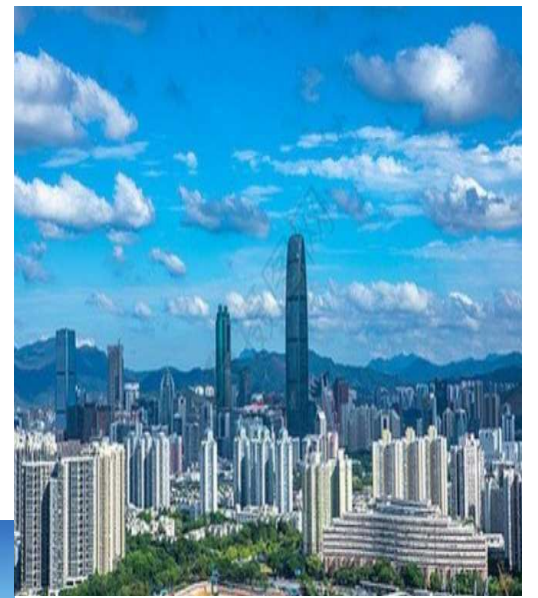




FIG Working Week 2024

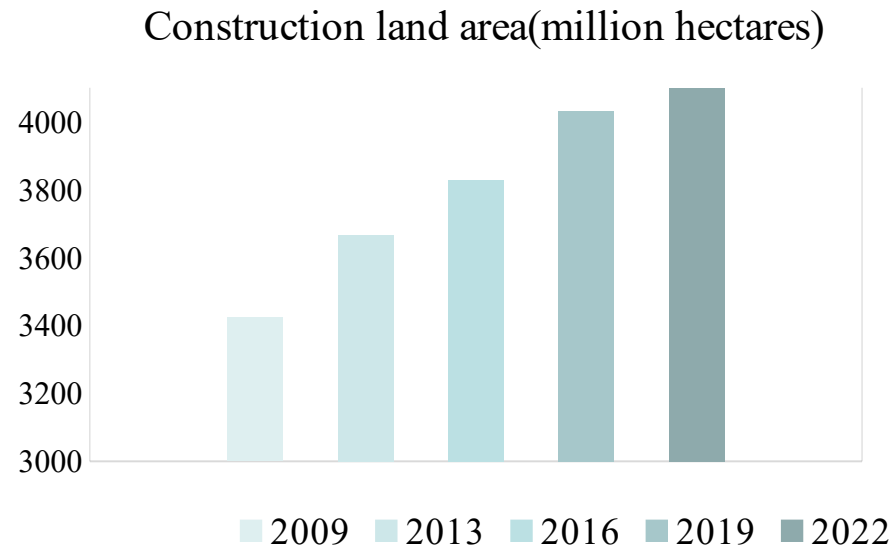
19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Background

•Urbanization process in China (2009-2022)



2023

National urbanization
rate of permanent
resident population:

66.16%



FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Background

- Land saving and intensive use is a fundamental policy for achieving high-quality development base on the situation of China's resources

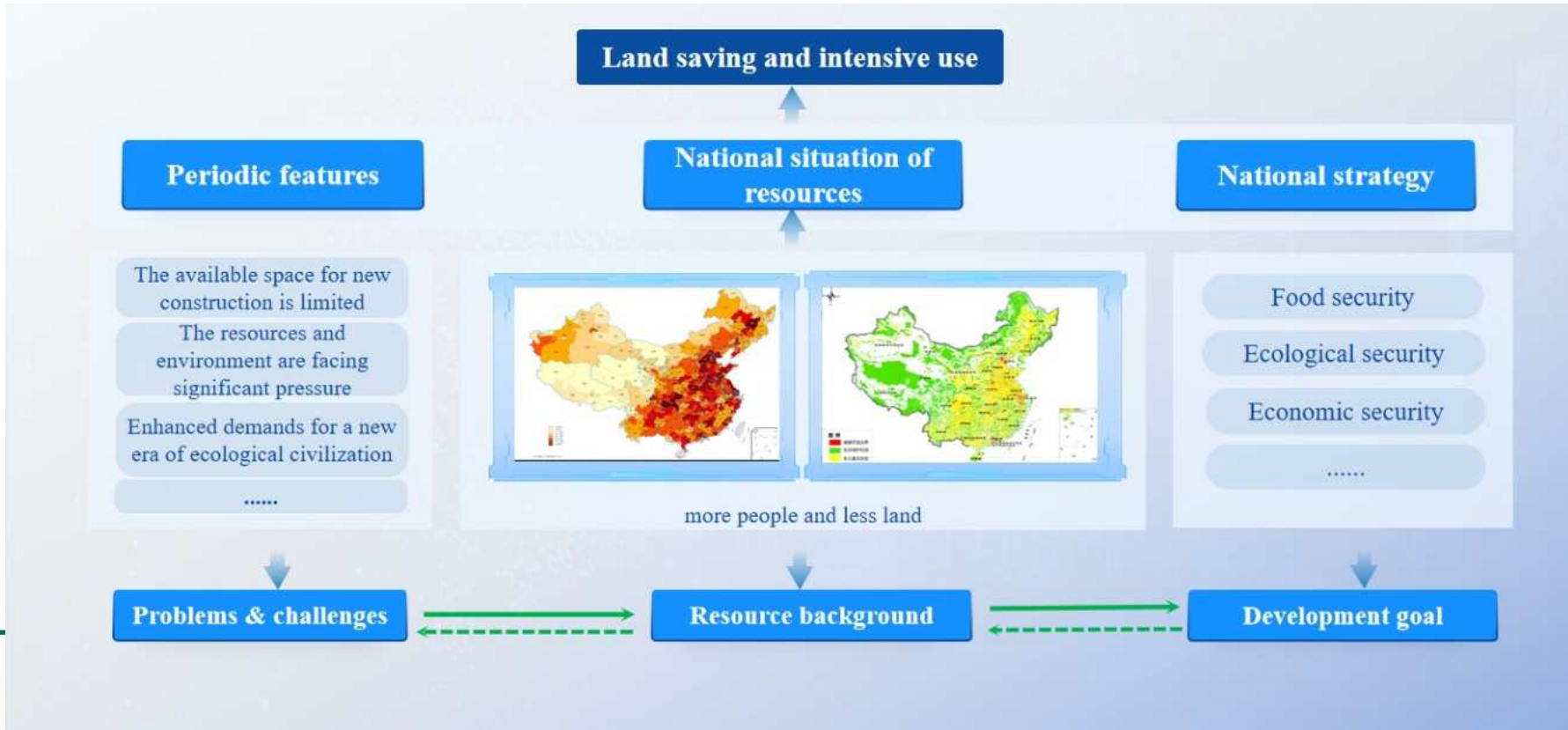




FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Background



- Planning guide → Territorial spatial planning
- Planned adjustment → Total annual increase in construction land
- Standard specification → Standard system of land use
- Market disposition → Standard plot supply Market-based land allocation
- Incentive policies → Pilot project for redevelopment of inefficient land
- Monitoring & supervision → Land market dynamic monitoring and supervision system
- Evaluation & examination → **Land saving and intensive use evaluation system**
- Joint responsibility → Party committee, government, department, public



FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Background

- **Development Process of Construction Land Saving and Intensive Use Evaluation System**

01 **Theoretical exploration**

1999-2010
Construct evaluation index system
Pilot verification
Release evaluation code of practice

03 **Expansion and improvement**

2019 to present
overall evaluation (region/city) + special evaluation (development zone/university land/other) + detailed evaluation (land parcel)

2011-2018
conducted the evaluation on an annual basis

02 **Project implementation**

04 ?

ORGANISED BY



PLATINUM SPONSORS





FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Evaluation System

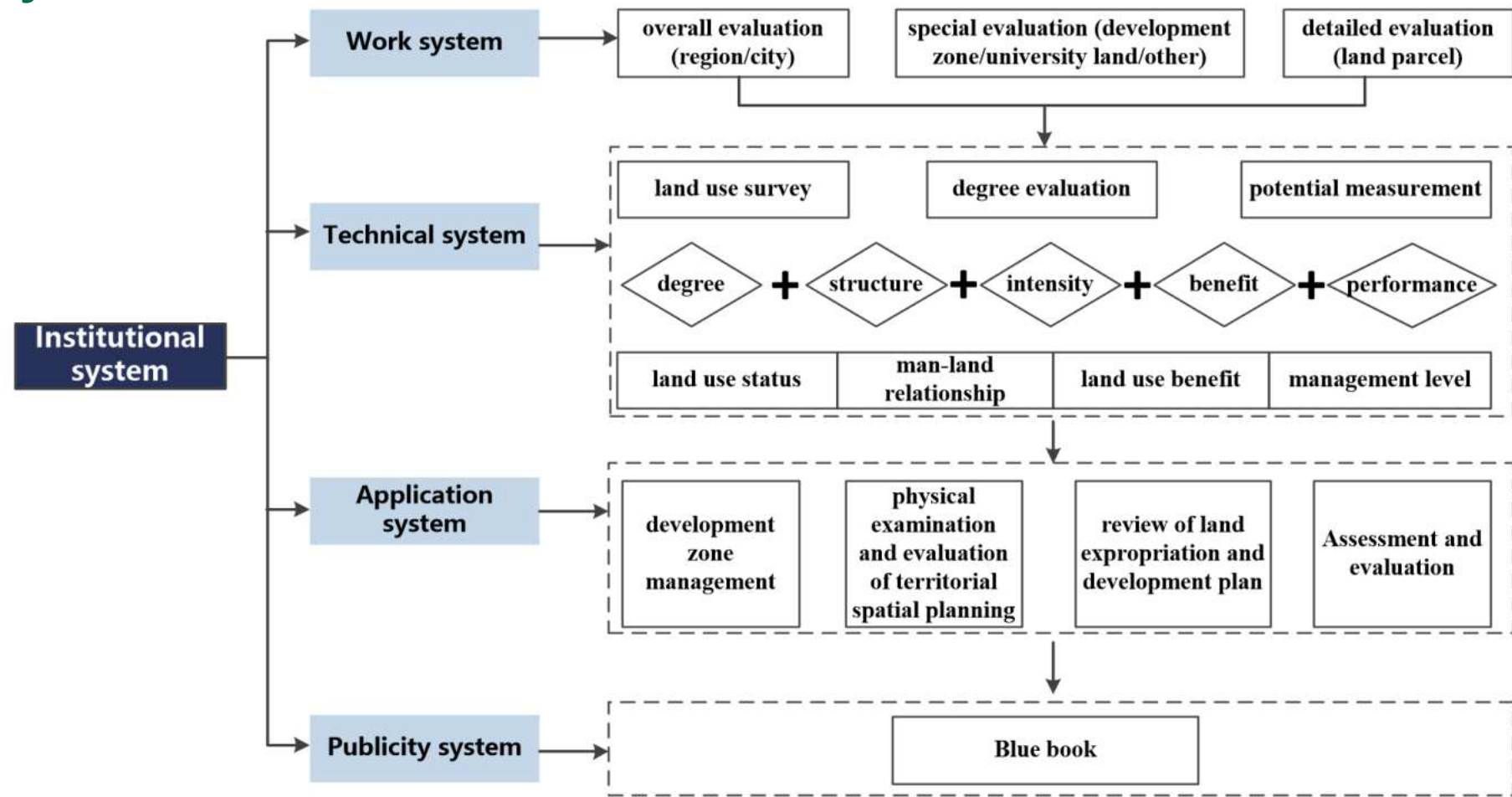




FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

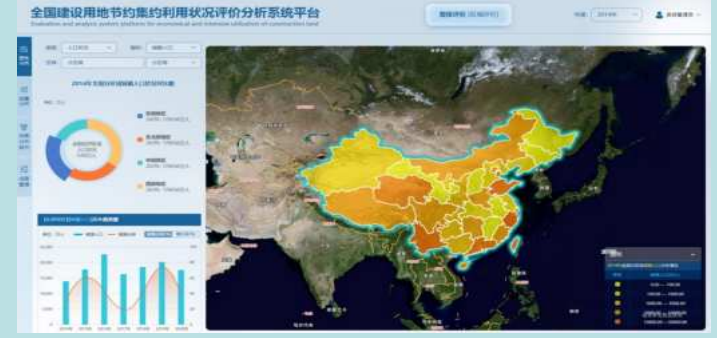
Evaluation System

- Effectiveness

1.a set of code of practices



2.a database



4.Publication



3.support land use management

- adjustment and upgrading of land use
- physical examination and evaluation of territorial spatial planning
- land expropriation and development plan review
- the creation of land saving and intensive use model cities



FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Evaluation System

- Latest achievement : Comprehensive index of construction land saving and intensive use



Non-final cover

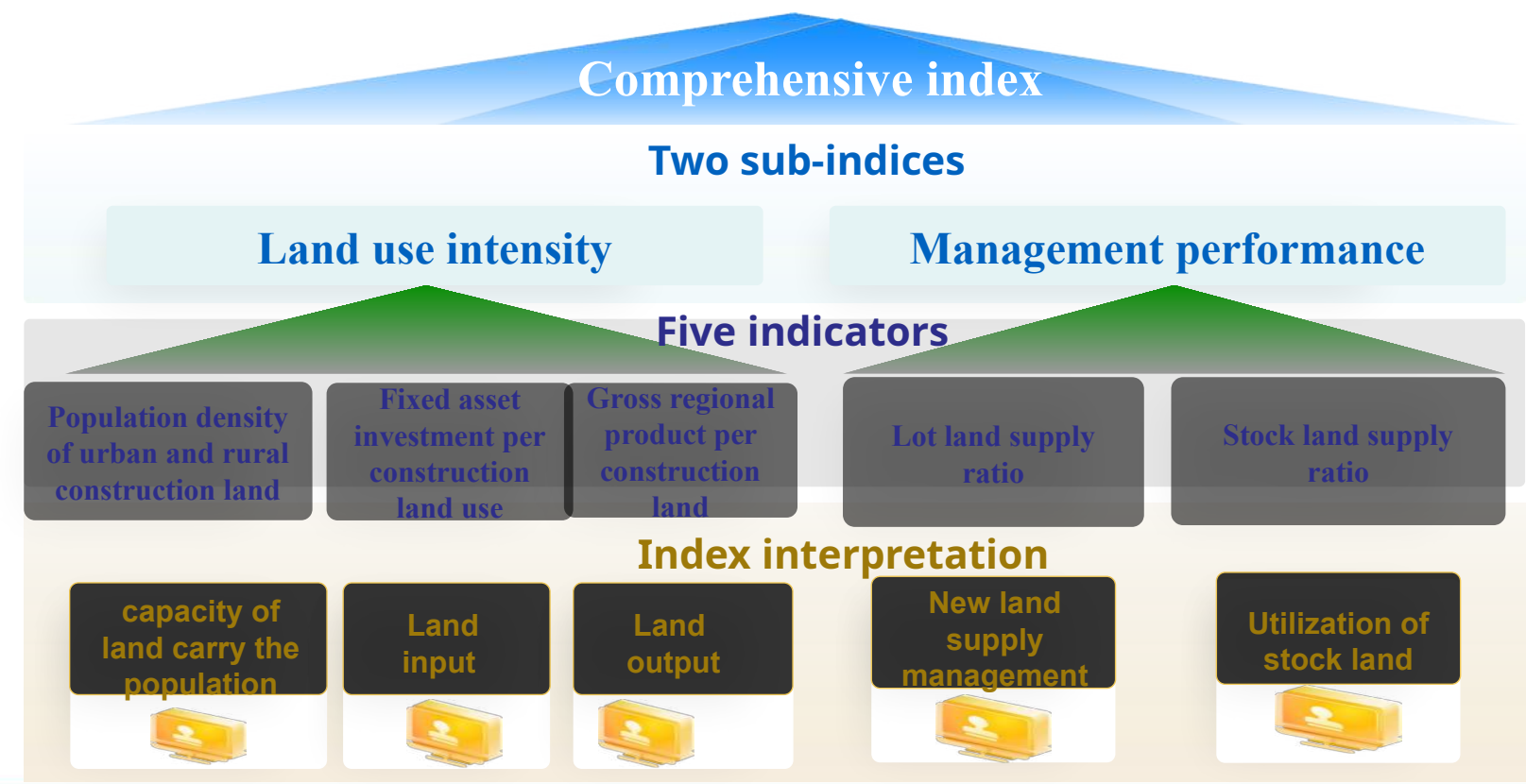




FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Situation & Challenges

- Situation

Improving the evaluation system is the objective requirement of implementing laws and regulations

« Regulations for the Implementation of the Land Administration Law »

The construction of ecological civilization requires that the evaluation system should further reflect "green" and "low-carbon"



Global climate governance



Biodiversity conservation



Sustainable development



FIG Working Week 2024

19-24 May

Accra, Ghana

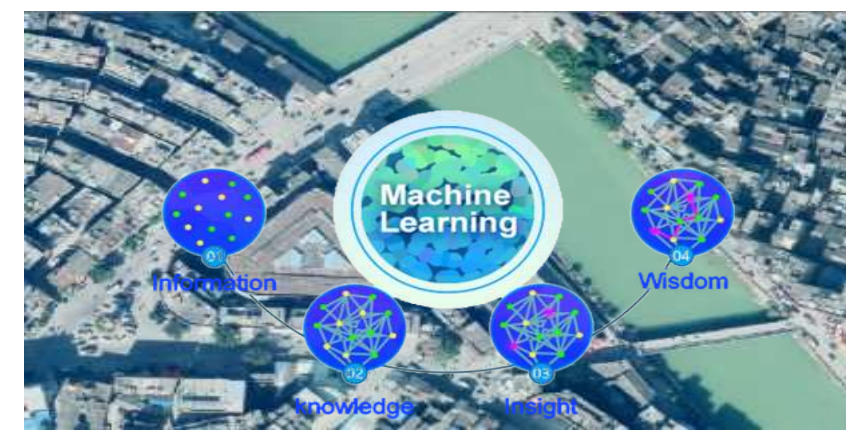
Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Situation & Challenges

- Major problems

- the timeliness of results is lagging

- the new demand for docking management is insufficient



Aerospace Technology



Big Data



Artificial Intelligence



Blockchain



FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Suggestions

- Build a "5E" evaluation system for the saving and intensive use of construction land

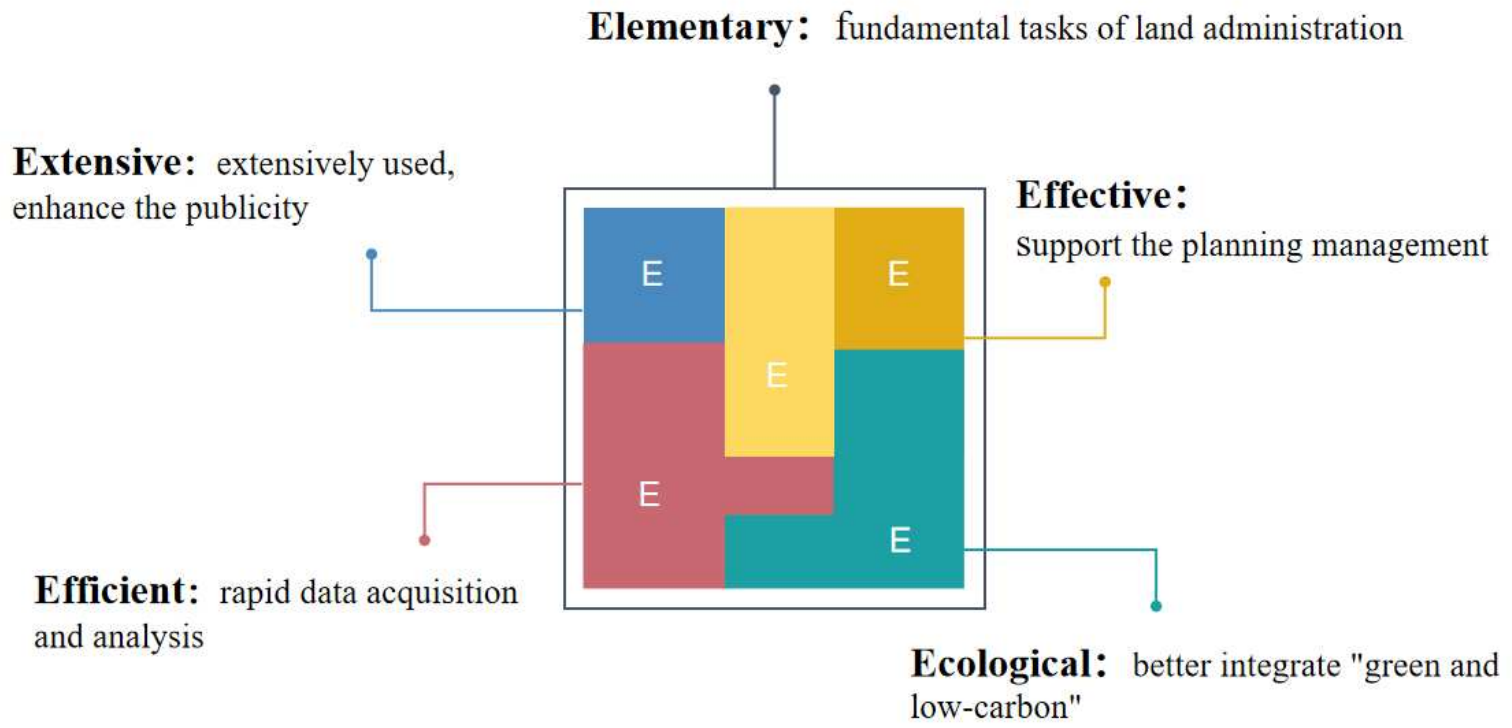




FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Suggestions

- Measures



Making the work system long-term



Standardization of the technology system



Diversification of application systems



Normalization of the publicity system

ORGANISED BY



PLATINUM SPONSORS





FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

Let's work together to promote the saving and intensive use of land!





FIG Working Week 2024

19-24 May

Accra, Ghana

Your World, Our World:
Resilient Environment
and Sustainable
Resource Management
for All

SUSTAINABLE DEVELOPMENT GOALS

International Federation of Surveyors supports the Sustainable Development Goals

Commission 8

Spatial Planning and
Developments

Serving Society for the Benefit of People and Planet



ORGANISED BY



PLATINUM SPONSORS

