

Taiwan's Dual-Axis Transformation

-Advancing EIA with Digital and AI Tools



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The EIA Process in Taiwan

Development scale
and location meet
identification criteria

Conduct briefings
and address public
comments

Submit an EIA
report

Forward an EIA
report

Review by EIA
committee

Publish the
review findings

Hold a public
consultation meeting

Phase 1

Alternatives may be submitted

If significant adverse environmental
impacts are anticipated, enter the phase 2
environmental impact assessment

Distribute the report to
relevant agencies and
hold a public hearing

Define the scope
of the
assessment

Compose the
first draft of the
EIA report

Conduct site
surveys and
public hearings

Forward the EIA
report to EIA
Authority

Review by EIA
committee

Disapproved

Publish the assessment
outcome in the official
gazette

Phase 2

 Developer

 Competent Authority

 EIA Authority

Our Features

Livestream

Since 2017, we have livestreamed major controversial EIA cases on our website, expanding to all EIA review meetings in 2019. Post-meeting recordings are uploaded to YouTube, enabling concerned citizens and groups to watch later.



環境部環評會議直播



- 名稱：「台灣~澎湖161kV電纜線路工程環境影響說明書變更內容對照表（停止營運期間環境監測）」專案小組第2次審查會議
- 時間：114年04月23日下午02時00分
- 地點：環境部後棟（臺北市中正區延平南路156號）101會議室

直播

全文檔案(KB) .PDF

章節	長度(KB)
全文檔	64,850
目錄	1,317
第01章	333
第02章	341
第03章	1,045
第04章	357
第05章	800

開發行為名稱

(1130924A) 台灣~澎湖161kV電纜線路工程環境影響說明書變更內容對照表
(停止營運期間環境監測)

書件摘要

本區摘列環評書件內容摘要以利參考,該書件若已完成實質審查程序,則一併列出「審查結論」;如屬尚在「審查中」之書件,歡迎民眾點按「我有意見」按鍵,針對本開發案提出您的寶貴意見!

書件摘要

書件類別 變更內容對照表 基地行政區 雲林縣,澎湖縣

EIA inquiry system

The EIA inquiry system enables public access to detailed reports online, enhancing transparency. It streamlines queries, saves time, encourages public involvement in environmental decisions, and supports efficient data management for businesses and government.

Staff Review Process

Significant manpower is needed for the review process to yield results at a comparatively low cost.

Process review

Spend approximately 1 ~ 2 weeks on the process review, comparing each document to ensure compliance with regulations.

Compile review comments

Integrating feedback from reviewers and authorities, plus developer responses

Write real-time meeting minutes

At least 3 people are needed to transcribe verbatim and produce meeting minutes in real-time.



Heated public participation in EIA

Controversial EIA cases always have both supporters and opponents, leading to intense discussions during meetings.



(Photo from The Central News Agency)

Why go digital & use AI for EIA?



Too many documents, and the process is too complex.



Data is limited, and lacks visualization.



Complex information hinders public participation.



Enhance review efficiency and ensure information transparency.



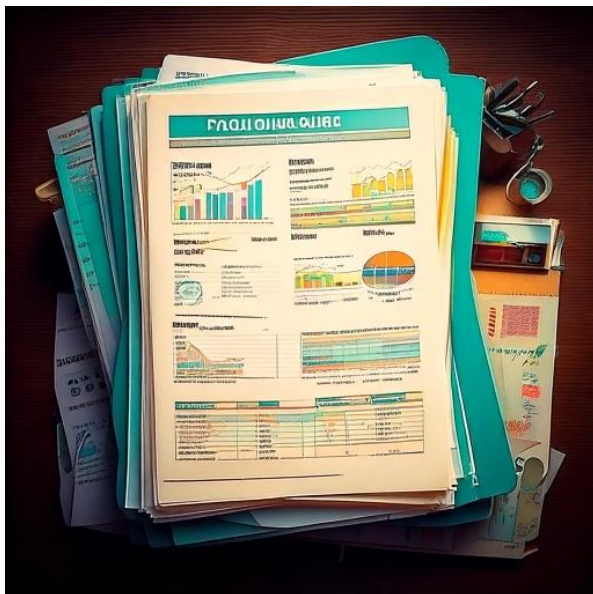
Improve risk management and increase accessibility for engagement.



Enhance policy trust and foster social agreement.



Current Challenges Impeding EIA's Twin Transitions



Unstructured Data

EIA reports, review data, and public comments are in PDF format with extensive text, tables, images, and videos. The absence of a fixed format hinders direct analysis and processing.



High Time and Labor Intensive

Many manual operations are necessary, including detailed procedural checks and pre-meeting summarization of review points.



Limited AI Tool Proficiency

Staff lack sufficient knowledge regarding the operation, features, and practical application of AI tools in review work.

Overcoming the Challenges to EIA's Twin Transitions



Data Standardization

AI struggles with the diverse formats of report data. A unified data format and tagging system is required to boost processing efficiency and accuracy.



Dataset Construction

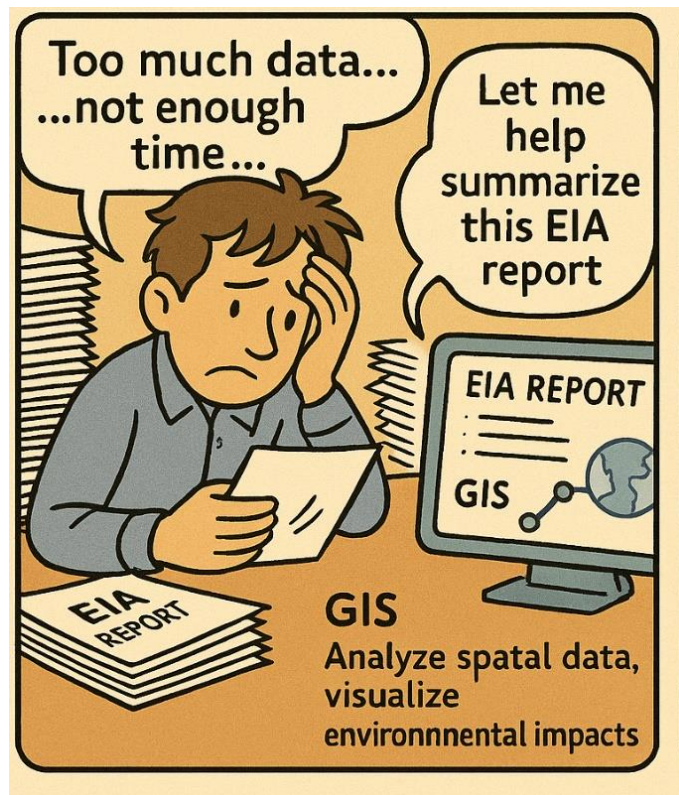
AI's learning and prediction accuracy is limited by the lack of a dedicated EIA training dataset. Coverage of various case types and guaranteed data quality are necessary.



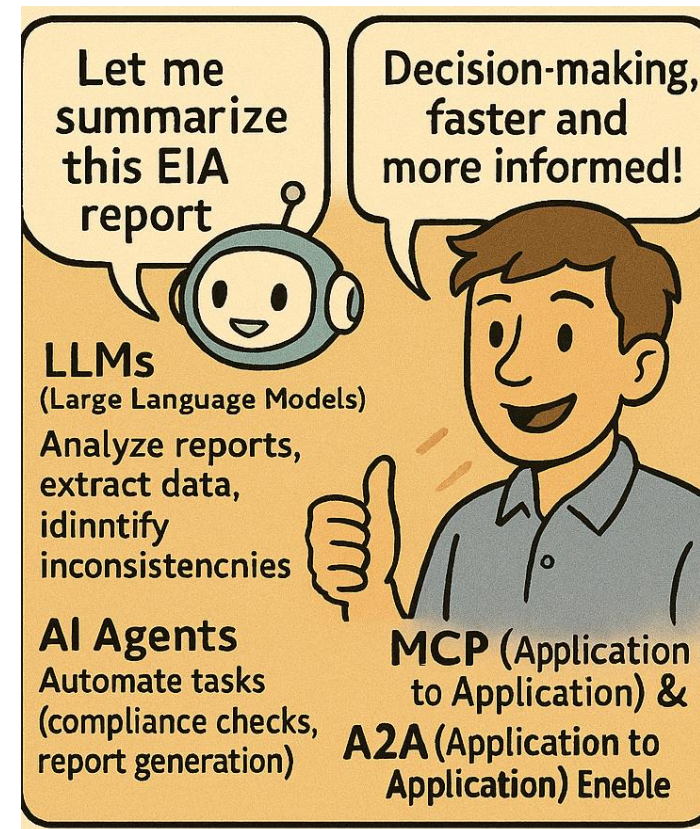
Reliability of AI Results

AI decision-making requires justification to build trust with staff, EIA committee, and the public. Developing explainable AI will increase decision transparency.

Transforming EIA: AI-Powered Efficiency and Engagement



VS



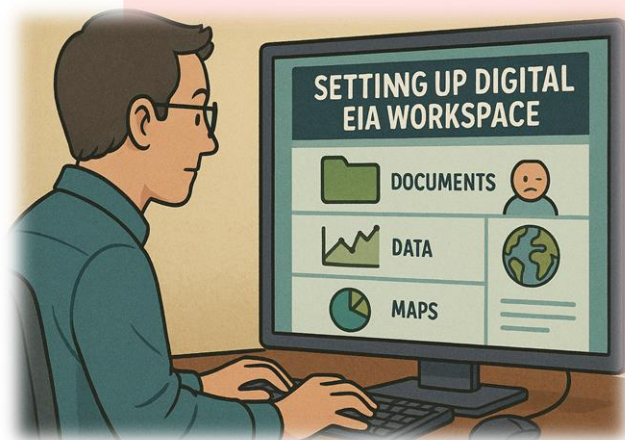
We are revolutionizing EIA with a suite of AI tools to enhance efficiency, accuracy, and stakeholder engagement.

Overview of the current progress in digitalization and AI adoption within Taiwan's EIA framework

01

Establish Digital EIA Workspace

Such as Expert Pool and Data Integration...

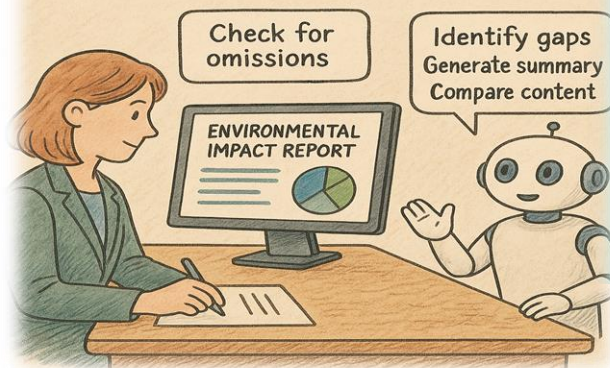


02

AI-Assisted Review

AI functionality includes automated report completeness checks, summary generation, and regulatory compliance comparison.

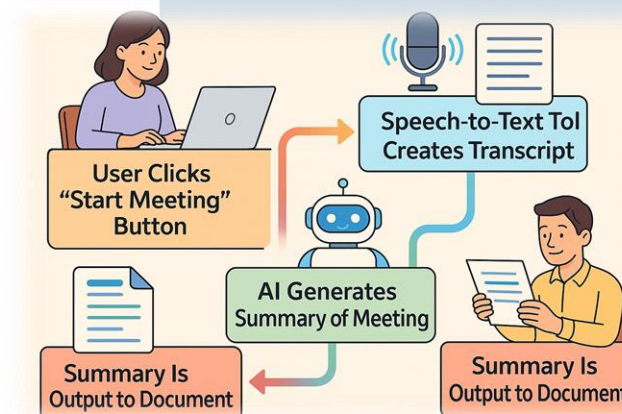
AI ASSISTED REVIEW OF ENVIRONMENTAL IMPACT REPORTS



03

Draft Meeting Conclusions

One-click generation of transcripts and meeting conclusions greatly reduces manpower and boosts efficiency.



Conclusion & Next Steps

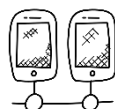
We're using AI to build a smarter, transparent, and effective EIA future.



2024-2025

- Establish Digital EIA Workspace
- Standardize data formats and procedures

Digital Foundation



2026-2027

- Develop AI-assisted EIA review
- Train personnel and stakeholders on digital tools
- Data governance and cybersecurity

Smart Integration



2028⁺

- Deploy an AI-assisted system for EIA decision-making support
- Facilitate public participation via interactive dashboards
- Enhance EIA by integrating GIS and real-time environmental data, alongside establishing cross-agency data exchange and implementing risk prediction models
- Legal and institutional framework adaptation

Intelligent EIA System





Let's continue the conversation!

Message me your questions or comments in the IAIA25 app.

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