



Latest smart city demands and KIND's support program

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KIND (Korea overseas INfrastructure & urban Development corp.)

K-City Network's speed and simplicity derived favorable reception from governments and municipalities around the world

The program is funding

- 1) Project planning/analysis
- 2) Online/offline capacity building
- 3) (For private companies) Smart solution demonstration

Merits of the program

- 1) Speed: Apply in 1Q / Selection in 2Q / Consultants hired and kick-off in 3Q
- 2) Simplicity: Application form is simple and does not require long time to edit
- 3) Open for the level of smartness



The program is budgeted by MOLIT and operated by KIND, while actual planning/analyses are carried out by external consultants

Structure of the program

 Designates KIND as K-City Network Operating institution



② Call for projects

Governments, Municipalities, Govt. institutions



3 Send project applications

4 Project selection / Planning scope discussion © Consultant selection & dispatch

6 Capacity building/ knowledge exchange

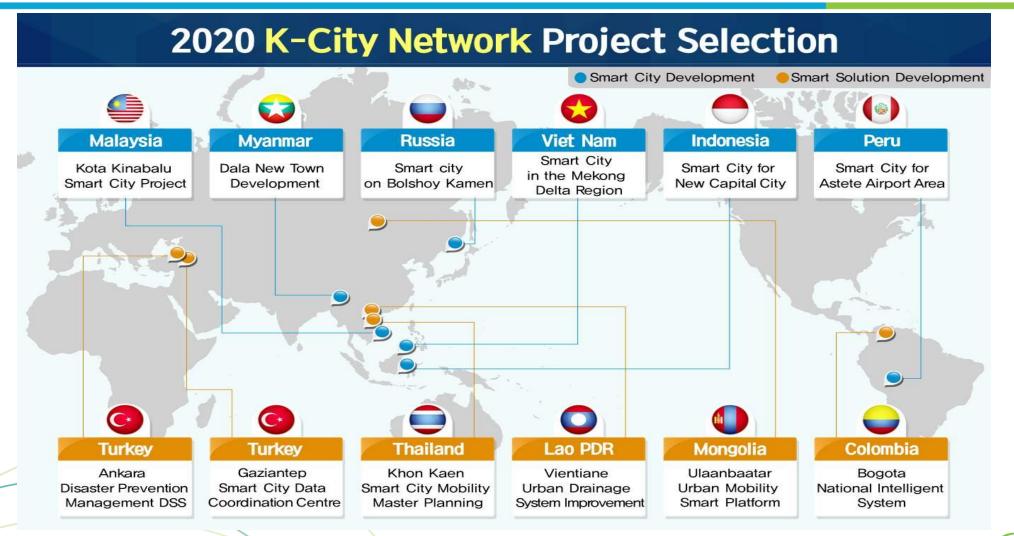
7 Further study / detailed planning

8 Financial advisory / investment

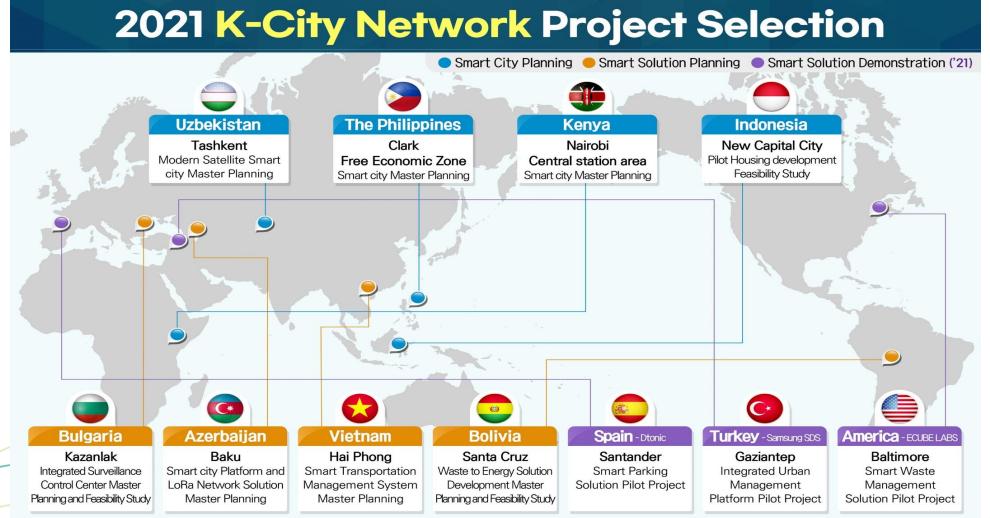
Subject to feasibility



K-City Network provided planning/analysis to 12 projects in 2020, and just finished selecting 11 for 2021



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Despite its short history, the large volume of applications provides insights on latest demands of smart city development

- Smart city development <u>purposes</u>
 - 1) Tackle existing city's urban problem

Clark Smart city, PH

Nay Pyi Taw Smart metering, MM

2) Future-proof <u>new city</u> development

New capital city housing pilot, ID

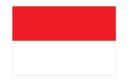
Ha Tinh Smart city, VN

3) Smarter tourist locations, campuses

Penang Island New township, MY

Pankor Island Smart mobility, MY

- Smart city development governance
 - 1) Federal government's initiative





2) Regional government's initiative





3) Regional demands collated by

Federal







Despite its short history, the large volume of applications provides insights on latest demands of smart city development

- Most requested smart solutions
 - 1) Transportation / mobility

Subic Bay port, PH

Danang, VN

Hai Phong, VN

2) e-Government incl. security/safety

Jakarta geospatial, ID

Panabo, PH

Phnom Penh, KH

3) Water / environment management

Nay Pyi Taw, MM

Klang air pollution, MY

- Other insights
 - Successful engagement brings the next step engagement

- A few advantages naturally lead to awareness and demand increase

- # from Regional >> # from Federal

To realize these smart city projects, there are works to do for each stakeholder

Government

Private Sector DFIs, MDBs

G1

Visionary urban planning

- Future-proof rule setting
- Consider induced demands

P1

Motivation and Innovation

- Seoul multimodal terminal
- Re-paving Gangnam stn. area

D1

Knowledge/info sharing

- Policy advisory to govt.
- Info sharing among DFIs

GZ

Setting rules and incentives

- Freezing price / sales
- Transferrable tax incentives

P2

Financing and Investment

- Equity/fund investment
- Loans/Guarantees

D2

Leading blended financing

- Realistic phasing
- Proactive structuring

Ministry of Land, Infrastructure and Transport



A long list of K-City Network's unsupported projects is invaluable information ADB and KIND can collaborate with

K-City Network, ADB, and KIND's works over a PPP lifecycle

MANAGING **IDENTIFYING** MANAGING **STRUCTURING** APPRAISING AND **CONTRACT** -**PROJECTS AND CONTRACT** -AND DRAFTING PREPARING THE **TENDER & AWARD OPERATING** SCREENING AS A **DEVELOPING & TENDER &** PROJECT-CONTRACT MAINTAINING AND COMMISSIONING PPP CONTRACT HANDING BACK

- Source to identify potential smart city projects
- Master planning, Feasibility analyses to make 'Green light' decision

- Technical assistance
- Transaction advisory
- Loans, guarantees



- Financial advisory / structuring

© ADB, EBRD, IDB, IsDB, MIF, PPIAF and WBG 2016

- Equity / Fund investment
- Sponsor's duties



K-City Network



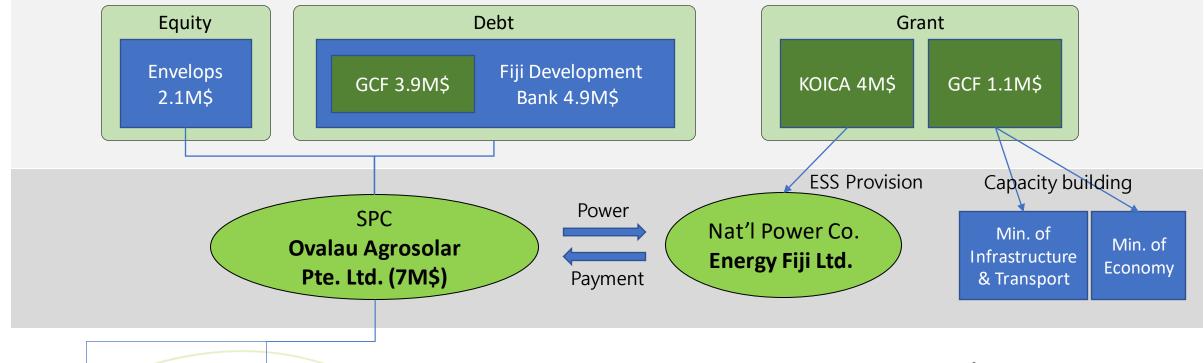
One recent renewable IPP deal shows that meeting stakeholders' needs and targets will lead to a good blended financing structure

• Fiji solar + ESS PPP structure

0&M

EPC

Source: Development Marketing Institute (modified for presentation purpose)



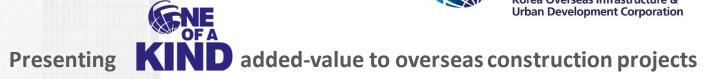
- KOICA effectively filled up the project's viability / govt's affordability gap
- GCF fulfilled all its targets: lending + grant for capacity building + renewable generation rollout





Thank you very much





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