

The Netherlands – infrastructure sharing and co-investment

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CULLEN

INTERNATIONAL

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Overview

FTTH in NL

- FTTH in the Netherlands

Reggefiber

- Reggefiber and KPN

Amsterdam
CityNet

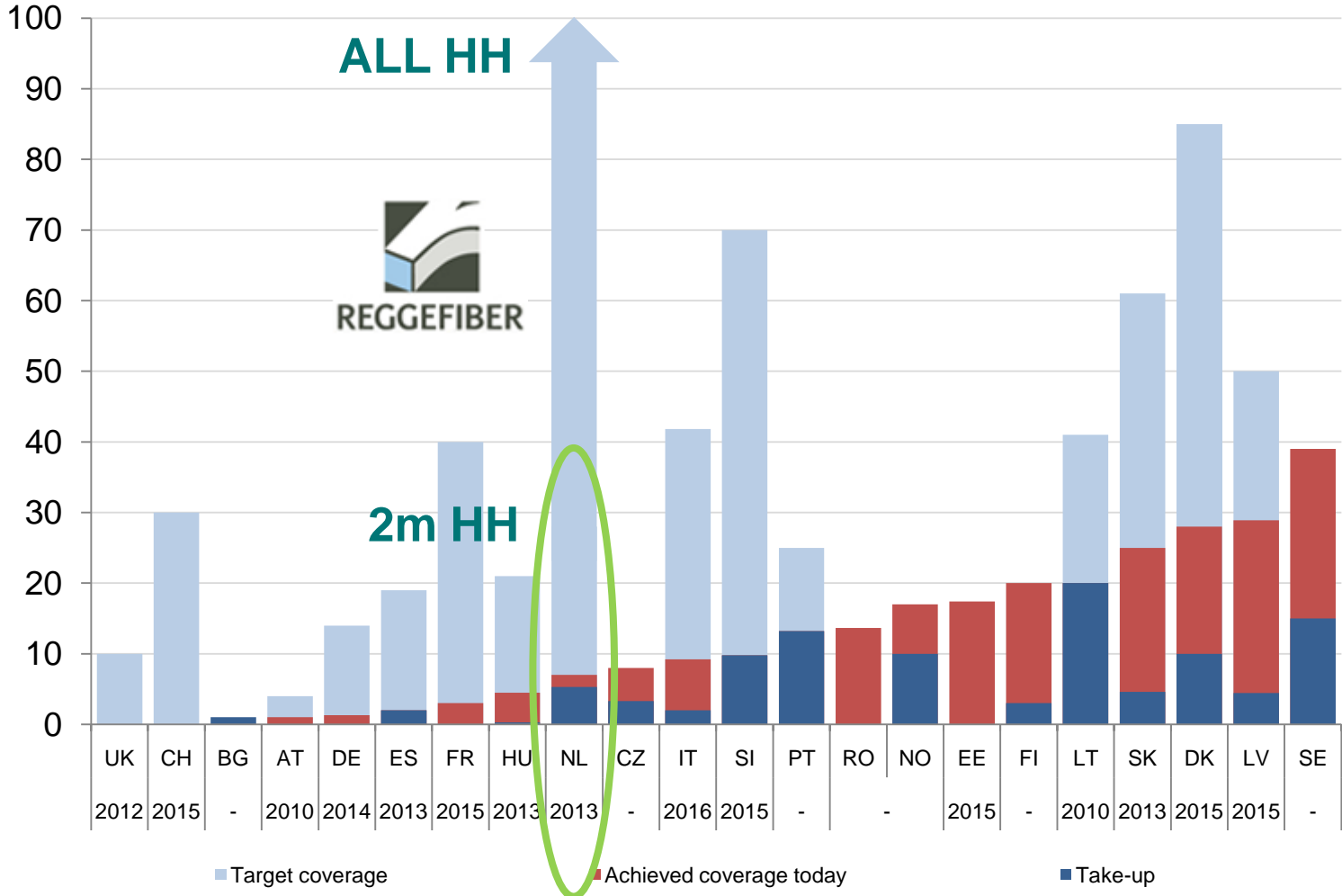
- Co-investment: Amsterdam CityNet

Regulation

- Regulation of fibre

No significant FTTH coverage yet 7% of households passed

% of households



FTTH in NL

Reggefiber

Amsterdam CityNet

Regulation

Where are the FTTH networks? Many local deployments

FTTH in NL

Reggefiber

Amsterdam
CityNet

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FTTH in NL

Reggefiber

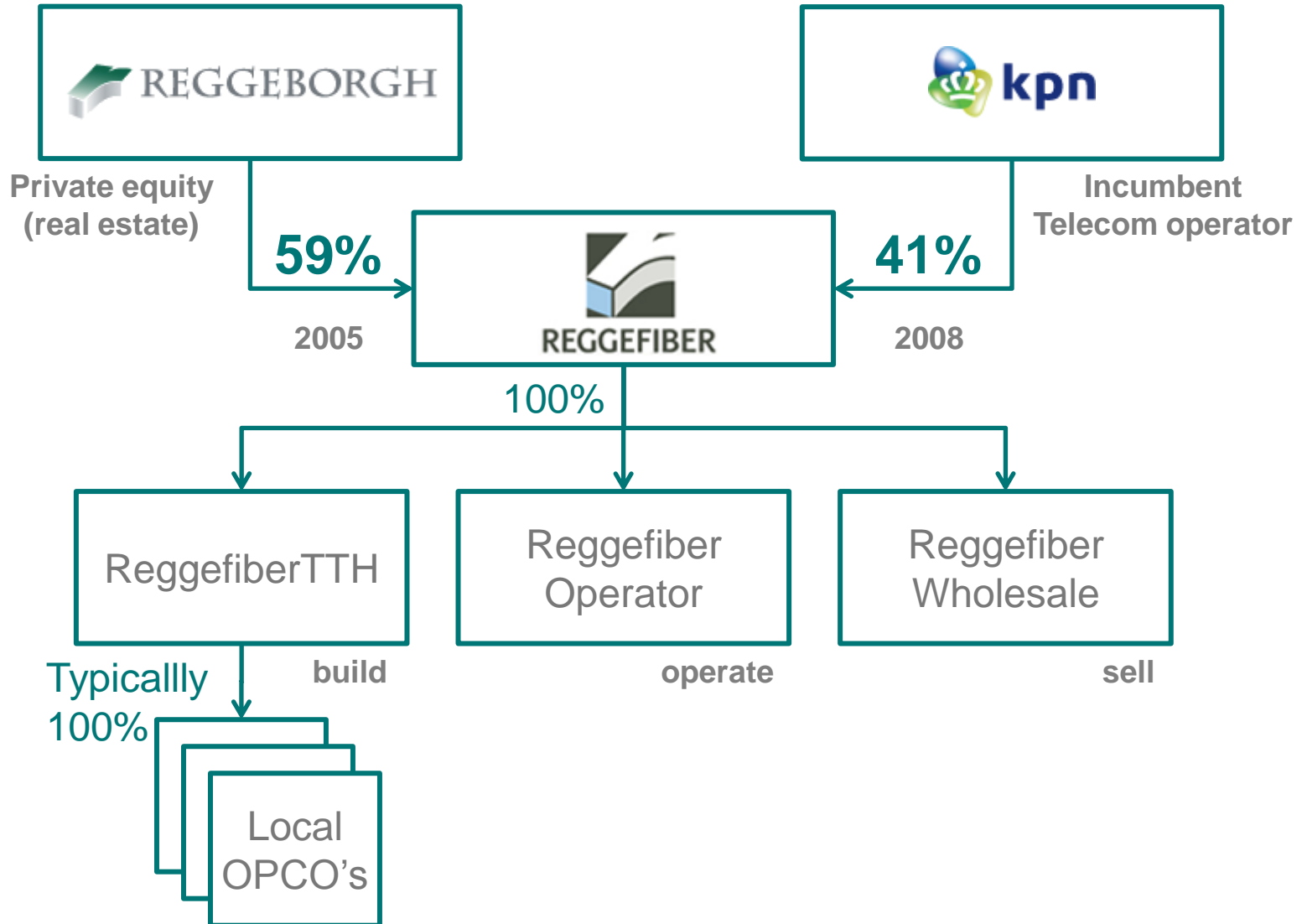
Amsterdam
CityNet

Regulation



Who is Reggefiber?

It's a real estate investment company



FTTH in NL

Reggefiber

Amsterdam
CityNet

Regulation

How does Reggefiber work?

Local OPCO's and demand bundling

- Local OPCO's
- Close contacts with local government
 - Fast licenses for works
- Demand bundling
 - Sign up and be connected for free
- “Easy digging”
 - Works start at 6 AM, finish before 6 PM
 - Only pavement is opened
 - Connect house: “drilling”

FTTH in NL

Reggefiber

Amsterdam
CityNet

Regulation



How does Reggefiber work?

Open access three layer model



Service provider

FTTH in NL

Reggefiber

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Regulation



Wholesale broadband access (WBA)
Commercial



Active operator



Fibre unbundling
Regulated



Passive operator

Amsterdam CityNet

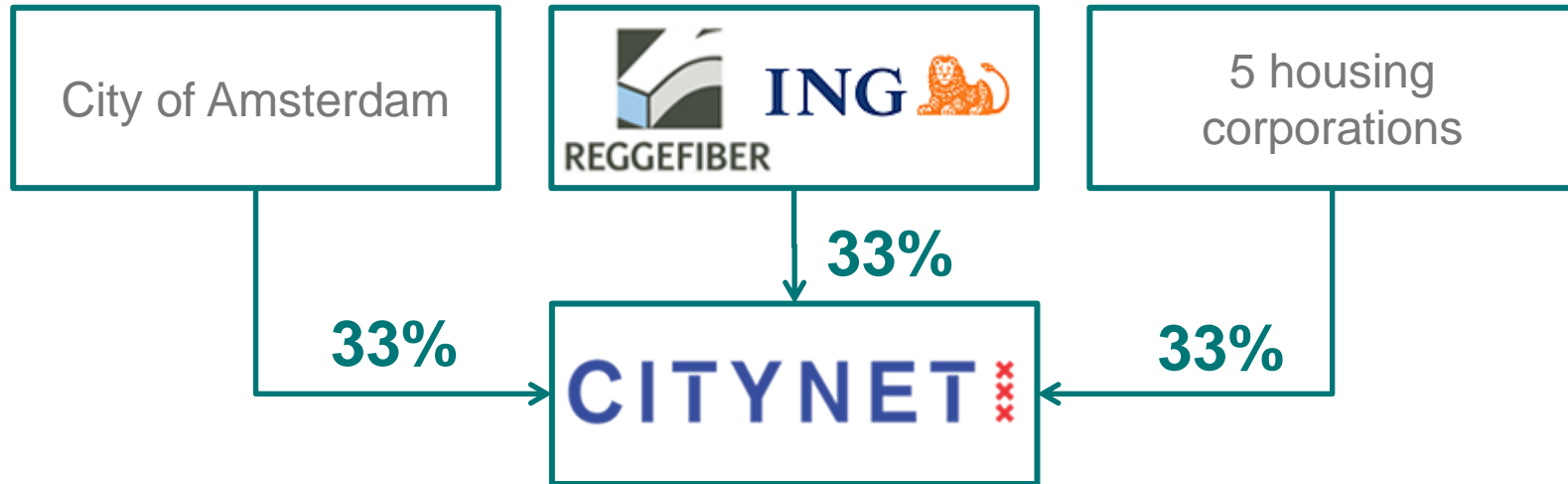
Local government invests as normal market player

FTTH in NL

Reggefiber

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Regulation



Amsterdam CityNet

Local government invests as normal market player

- Dec. 2007: European Commission approves JV
- Not state aid
- Market economy investor principle
 - Two private companies active in the sector, invested on equal terms with the municipality
 - All investing parties would have to support any losses
 - Private investors have significant stakes
 - No single shareholder can exert sole control over the company
 - Detailed analysis of the business plan
- The wholesale operator (Reggefiber) selected through a tender procedure
- Open, non-discriminatory access to retail operators which offer TV, broadband and telephony services

FTTH in NL





Reggefiber

Amsterdam
CityNet

Regulation

Regulation of fibre

Fibre unbundling, no duct access

		market 4		market 5			
				residential		business	
		 					
		Cu	Fi	Cu	Fi	Cu	Fi
FTTH in NL							
Reggefiber							
Amsterdam CityNet	access	LLU/SLU	FU	WBA	X	WBA	WBA
	transparency	✓	✓	✓	X	✓	✓
Regulation	non discrimination	✓	✓	✓	X	✓	✓
	price control	FDC/CCA	IRR	X	X	FDC/CCA	FDC/CCA



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THANK YOU!