

FIDIC-EFCA Consulting Engineering Industry Survey

Total demand (market - non-market; private - public)

EU28

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Gent, 1 June 2018

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Summary

Annual survey

- Delayed: reset to 2010 (new National Accounts)
- Main issues settled:
 - architecture and engineering product use by AED industry is subcontracting; infrastructure investment from functions of government database;
- Remaining questions:
 - public corporations demand – still of interest?
 - R&D demand – share of total?
 - own-account design and R&M – how much in accounts?
 - demand disappearing – why?
 - worldwide – UN SDG11/UN Task Force
 - revenue – surveys (more use of official/big data)

Demand

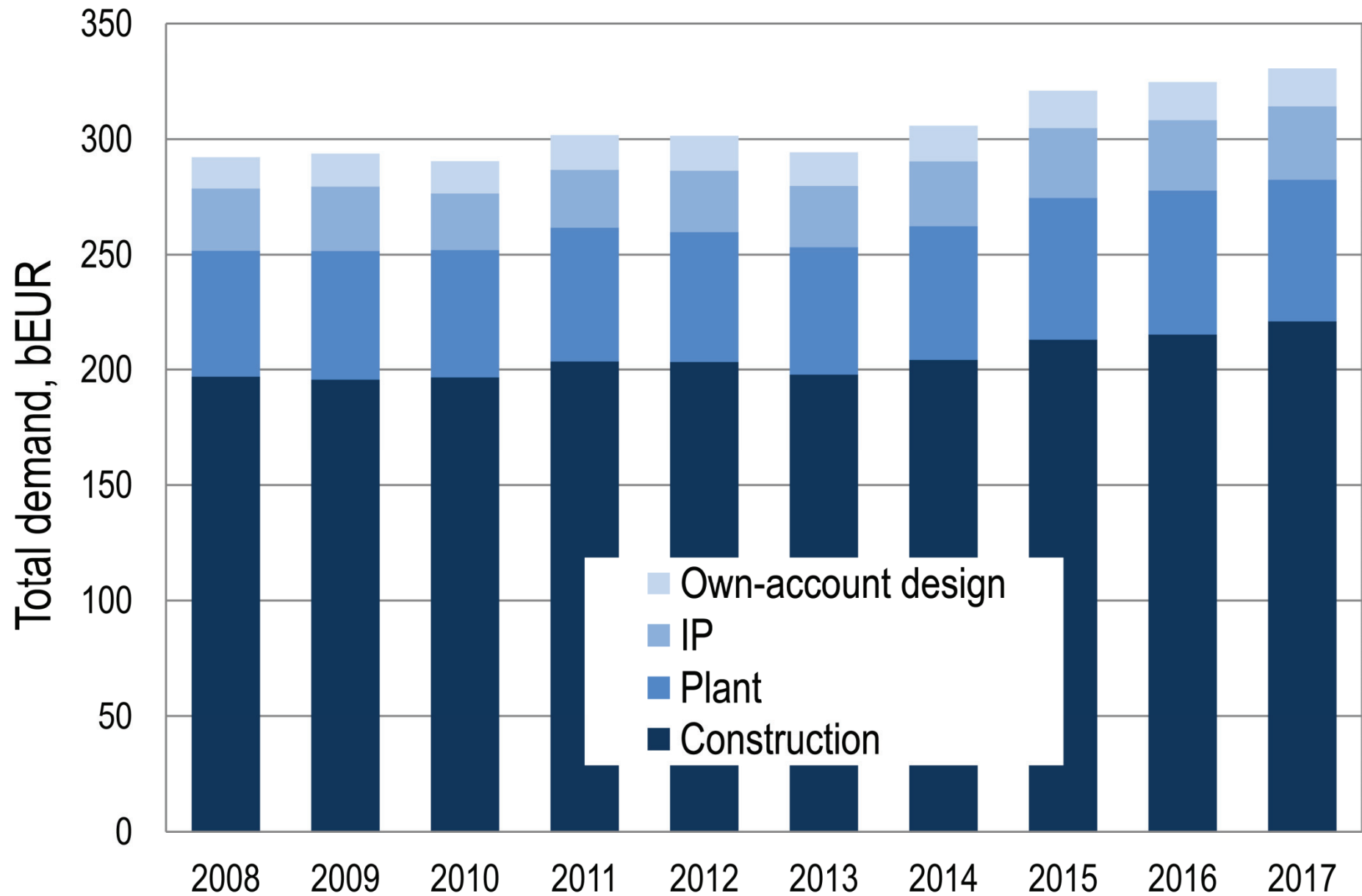
From National Accounts

- Investment (GFCF)
..... benchmark against
- Supply-Use Tables

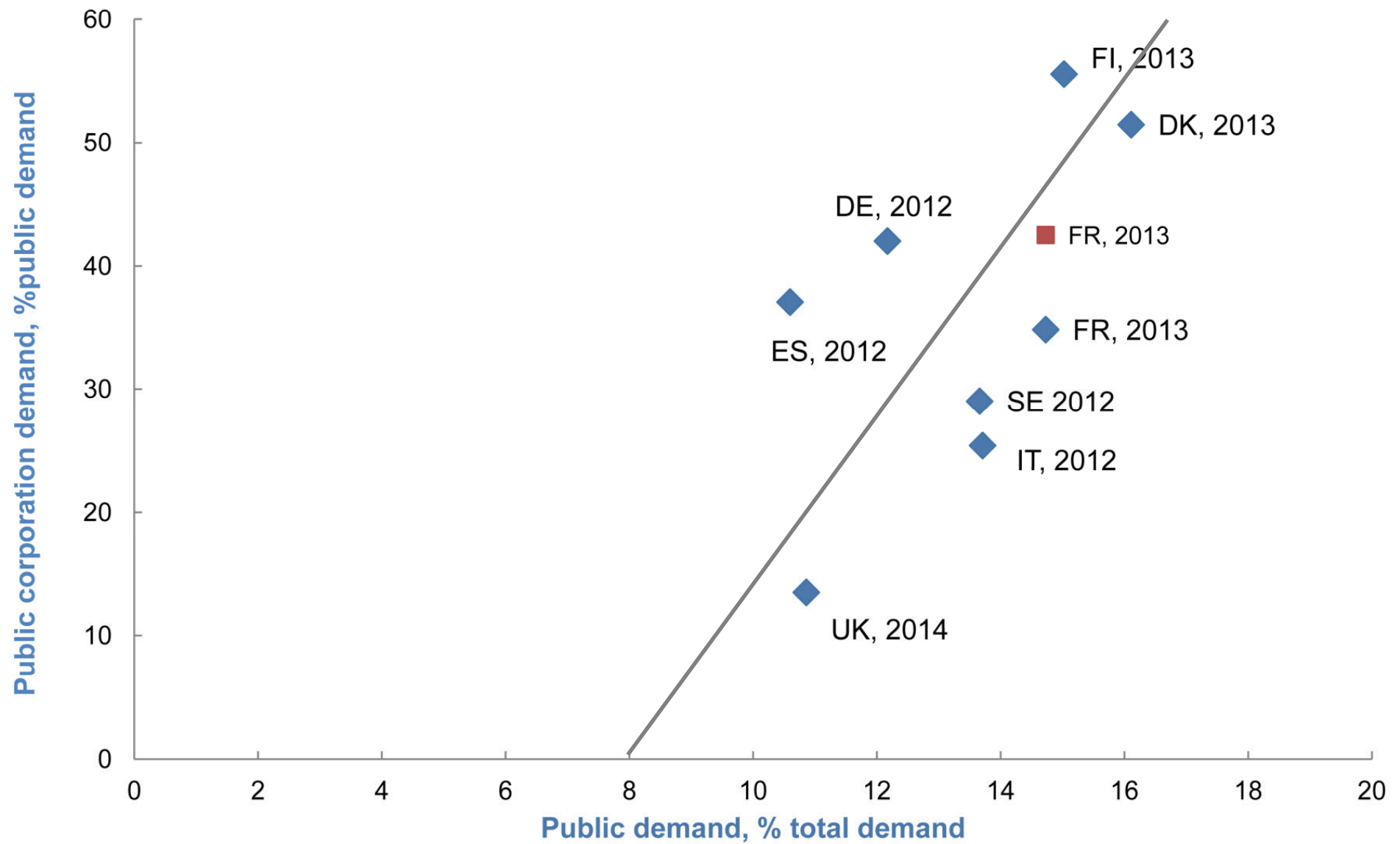
Now move to extended National Accounts

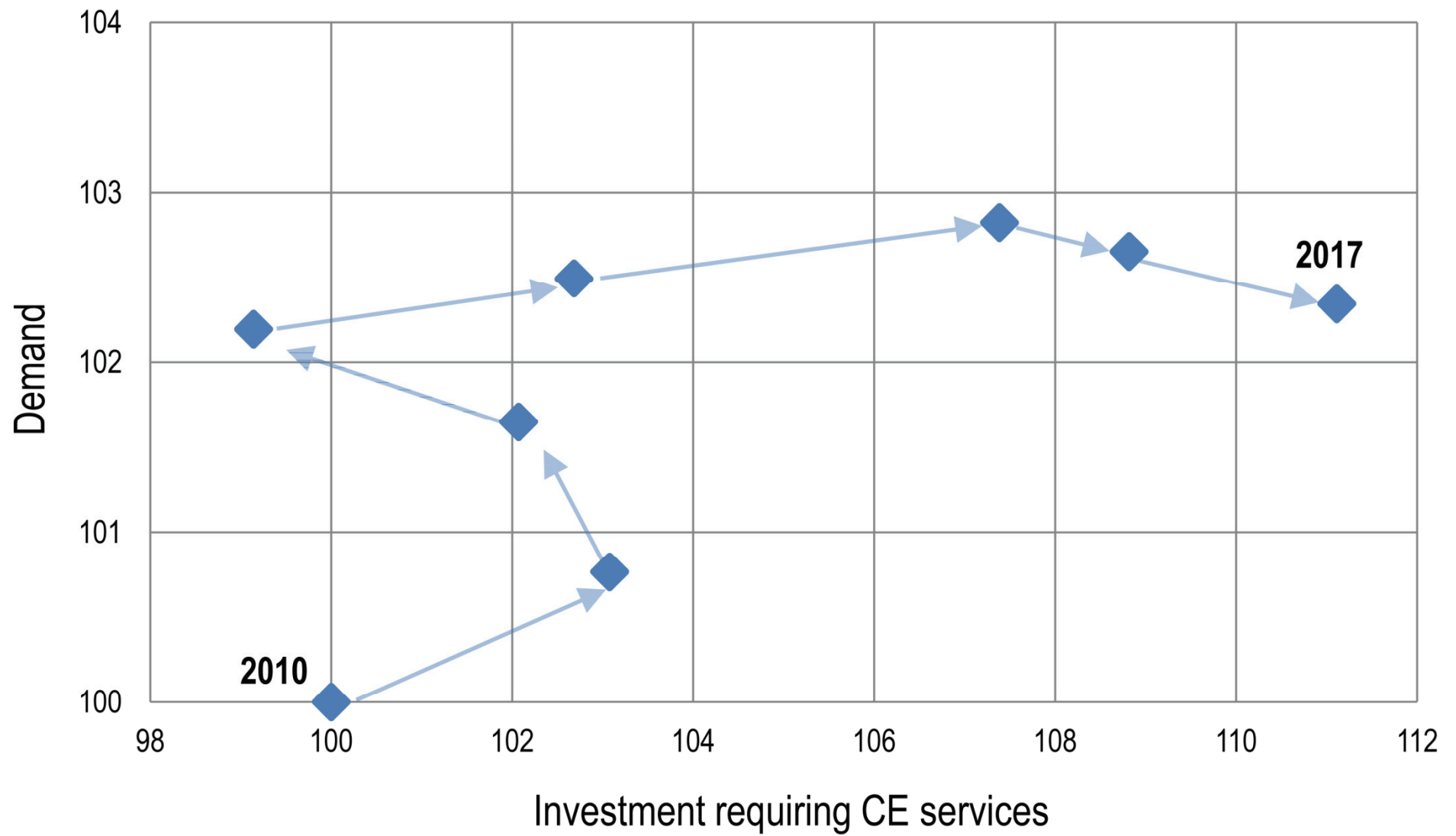
- climate change “sustainable” services (70% urban)
- potential impact on carbon footprint

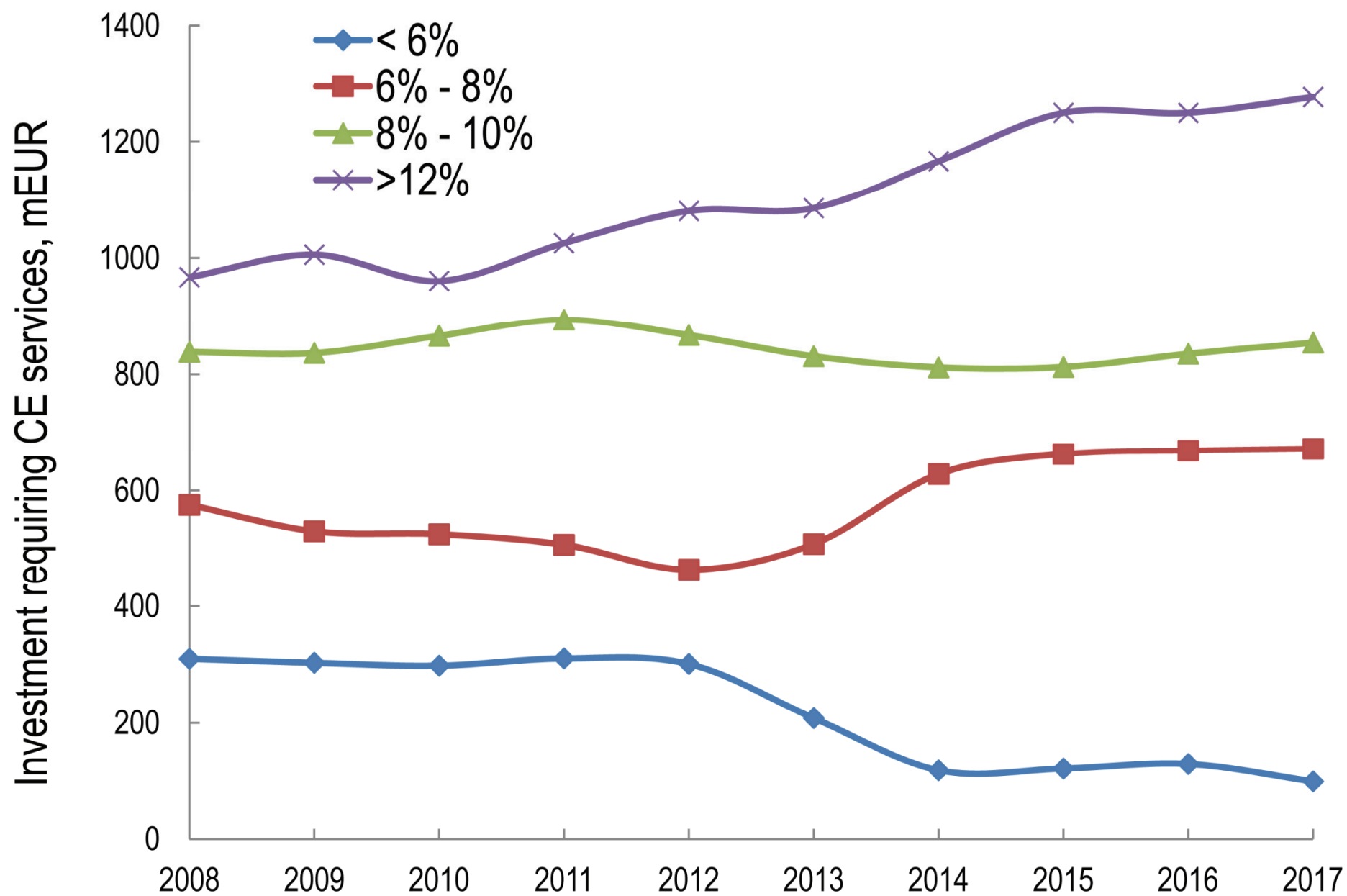
	PUBLIC	PRIVATE
NON-MARKET	35	
MARKET	15	300 bEUR



Public-corporation demand







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- Climate Change Adaptation, EU27, 2016, EIB, bEUR

Aid the response to climate change

Investment across many sectors; difficult to identify

Demand for services based on forecast needs?

Water, waste-water (need 90 pa): >1 b

Efficient transport equipment, buildings (need 100 pa)

Climate-proof core infrastructure (need 1-2% of what)

Adaption infrastructure

Investment requiring CE services: 2828

Total demand 330

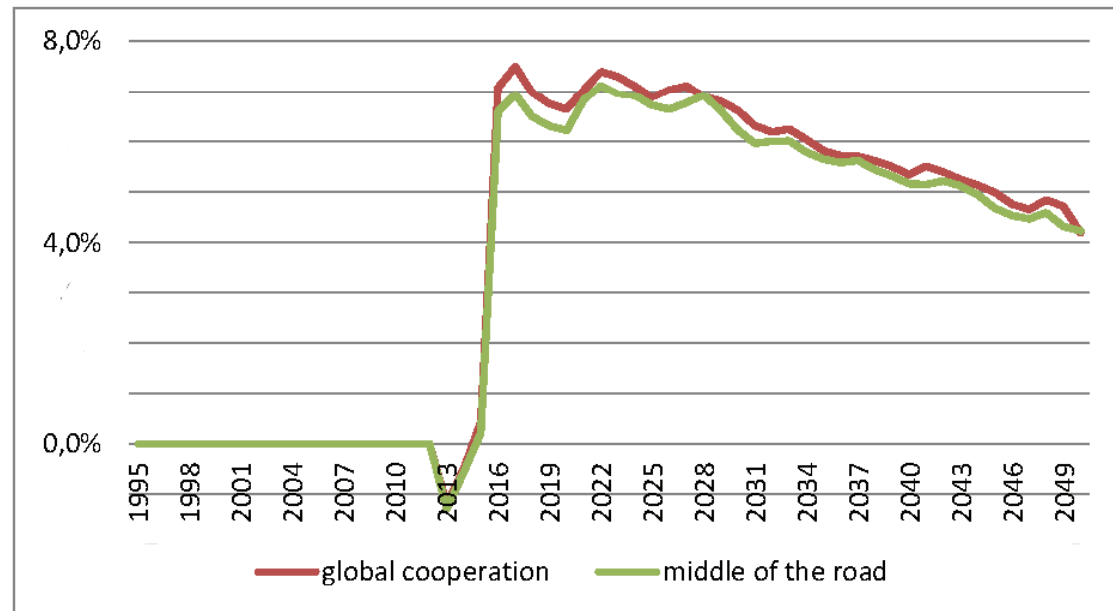
Sustainable (CCM + CCA) demand: 14

4.2% of total demand

Sustainable demand (top-down)

Modelling (EU CECILIA, EU27, 2017)

- 7% GFCF for first 15 years after introducing climate agreement.
- For current 66% construction, 34% plant + other GFCF, demand is 20 bEUR (6.1% of total demand)



Carbon Footprint (potential to mitigate/adapt)

Environmental extended national accounts' input-output tables

Carbon Intensity (13 KLEMS developed countries, 2007)

	%GFCF	%CF	%CI (CF/GFCF)
Developed countries	-	-	100
Construction x 1.2	61.2	72.0	118
Plant x 0.6	11.4	12.6	111
CE industry	72.6	84.6	117
CE industry: France	80.5	83.7	104 (for national 89)
CE industry: Italy	102.5	126.1	123 (for national 105)

Sustainability services

CE industry shares

- Carbon footprint potential responsibility – LARGE
 - some developed countries much higher than average of 85% (e.g., Italy, 126% of national footprint)
- “Climate required” sustainability investment – SEEMS SMALL?
 - 4.2 to 6.1% total demand
- Total sustainability investment (“10% more”) – BETTER IMAGE?
 - monetarise non-climate project features
 - has to be for top-down (macro-economic; not LCA!)
 - standards coming, so maybe within 10+ years.