



THE REAL ESTATE INNOVATION LAB

RESEARCH AND DEVELOPMENT FOR THE BUILT ENVIRONMENT

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THE MISSION

A RESEARCH AGENDA FOR INNOVATION IN THE BUILT ENVIRONMENT

**A COMMUNITY
FOR
INNOVATORS**

**REMOVING
UNCERTAINTY IN
INNOVATION**

**UNCOVERING
INNOVATION
IN REAL ESTATE**

CREATING AN ANCHOR FOR INNOVATION

Our opportunity is to create an understanding of innovation in the built environment, by being the anchor for fundamental research on innovation that transforms real estate, districts and cities. When we apply innovation concepts and theory to the built environment, there is an opportunity to understand the lifecycle and impact of new building products and processes on market performance. In this way, the study of innovation in the built environment has much to contribute to real estate markets by tangibly identifying the economic value of innovation, how it contributes to the growth of cities and expanding the product portfolio of institutional investors.



RESEARCH PLATFORM SNAPSHOT

THE PATH OF INNOVATION FOR DATA, PRODUCTS AND PROCESSES

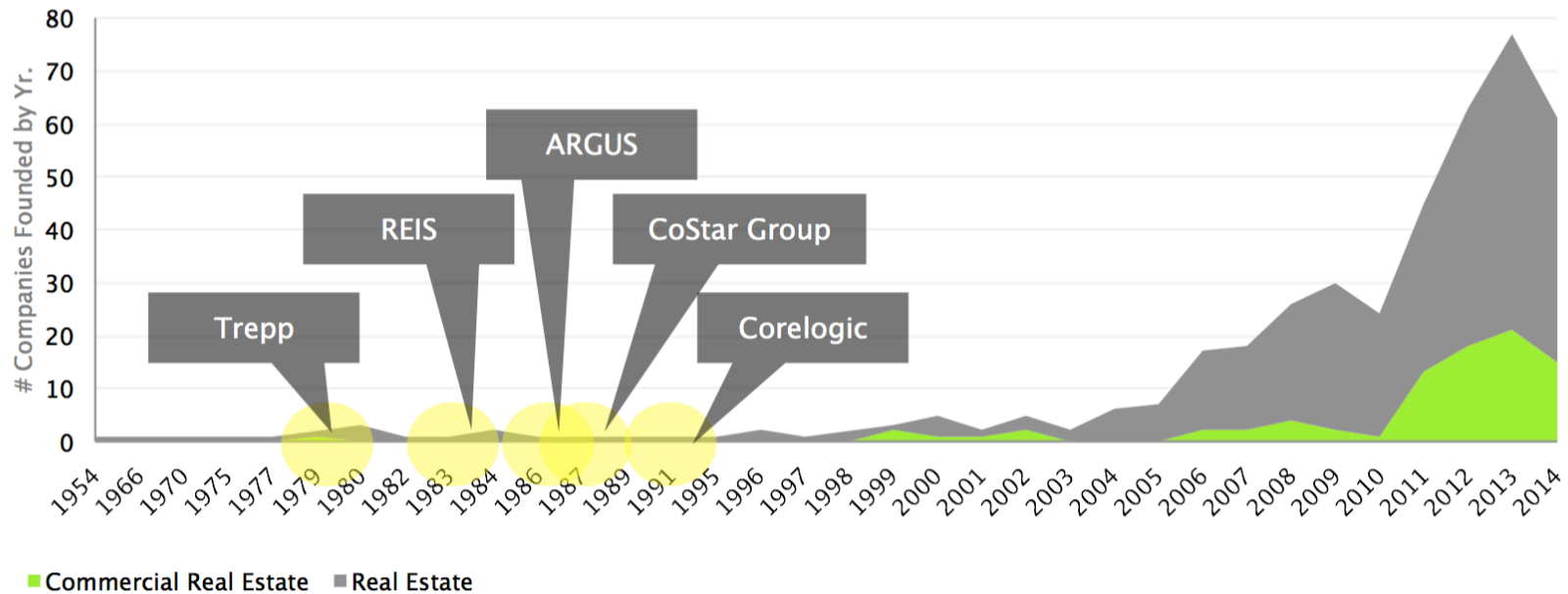
THE CRE TECH DATABASE	INNOVATIVE PRODUCTS SPACES & TECHNOLOGY	INNOVATION: CITIES PLACES & PEOPLE	THE IDEAL DEVELOPER	REAL ESTATE TECHNOLOGY HUB
<ul style="list-style-type: none">• NYC Market Data Analysis• Data Aggregation• Massing Data From Traditional And New Providers	<ul style="list-style-type: none">• Linking Innovation to the CRE Product Life Cycle• The Commercial Real Estate Product Hype Cycle• Product, Process & Organizational Innovations in CRE	<ul style="list-style-type: none">• Mapping 21st Century Agglomeration• Comprehensive Accelerator Database• Linking Firm Performance To Place	<ul style="list-style-type: none">• The Ideal Developer Survey• Hidden Value In Real Estate Development• A Benchmark In Development	<ul style="list-style-type: none">• CRE Tech Community• Data Scouting And Exposure• Network & Engagement• Knowledge Share
RESEARCH TEAM	RESEARCH TEAM	RESEARCH TEAM	RESEARCH TEAM	RESEARCH TEAM
<ul style="list-style-type: none">• Andrea Chegut• David Geltner• Daniel Fink• James Scott	<ul style="list-style-type: none">• Andrea Chegut• David Geltner• Charles Steelman• Alison Crowley• Emily Royall	<ul style="list-style-type: none">• Andrea Chegut• Lyndsey Rolheiser• Dennis Frenchman• Isabel Tausendshoen• Annie Ryan• Steve Weikal	<ul style="list-style-type: none">• Andrea Chegut• David Geltner	<ul style="list-style-type: none">• Andrea Chegut• Steve Weikal• Daniel Fink• James Scott



FROM ANALOGUE TO DIGITAL

THE GROWTH IN DATA PLATFORMS

THE RECENT RISE OF CRE TECH



SOURCE: CBRE - CRE TECH YEAR END REPORT 2015



NEW DATA LANDSCAPE & NEW DIMENSIONS

A PLETHORA OF NEW PLATFORMS

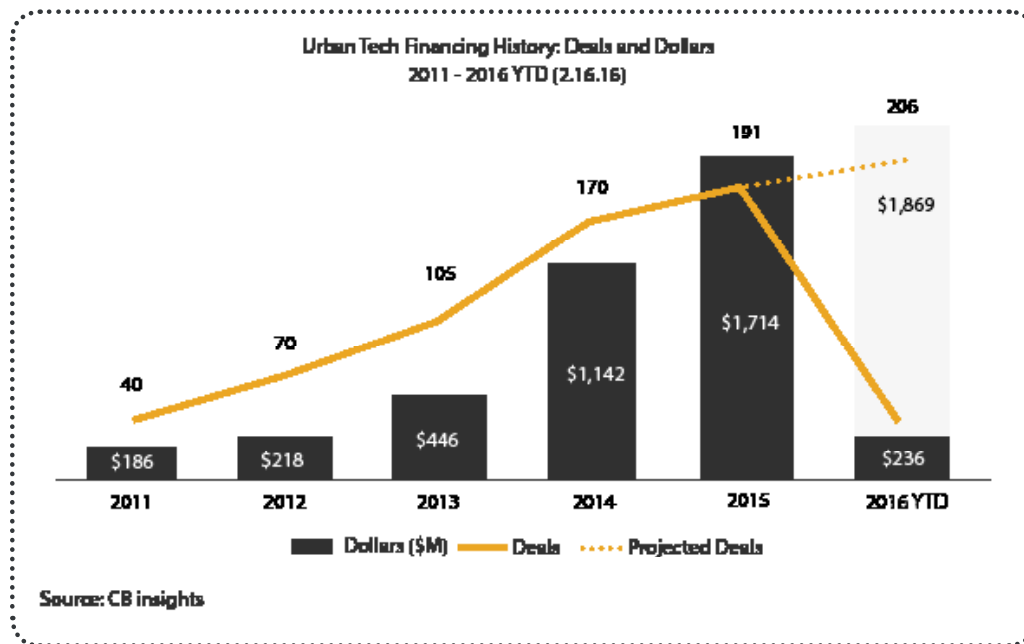




DEFINING REAL ESTATE TECH

A NEW WAVE IN REAL ESTATE VENTURES

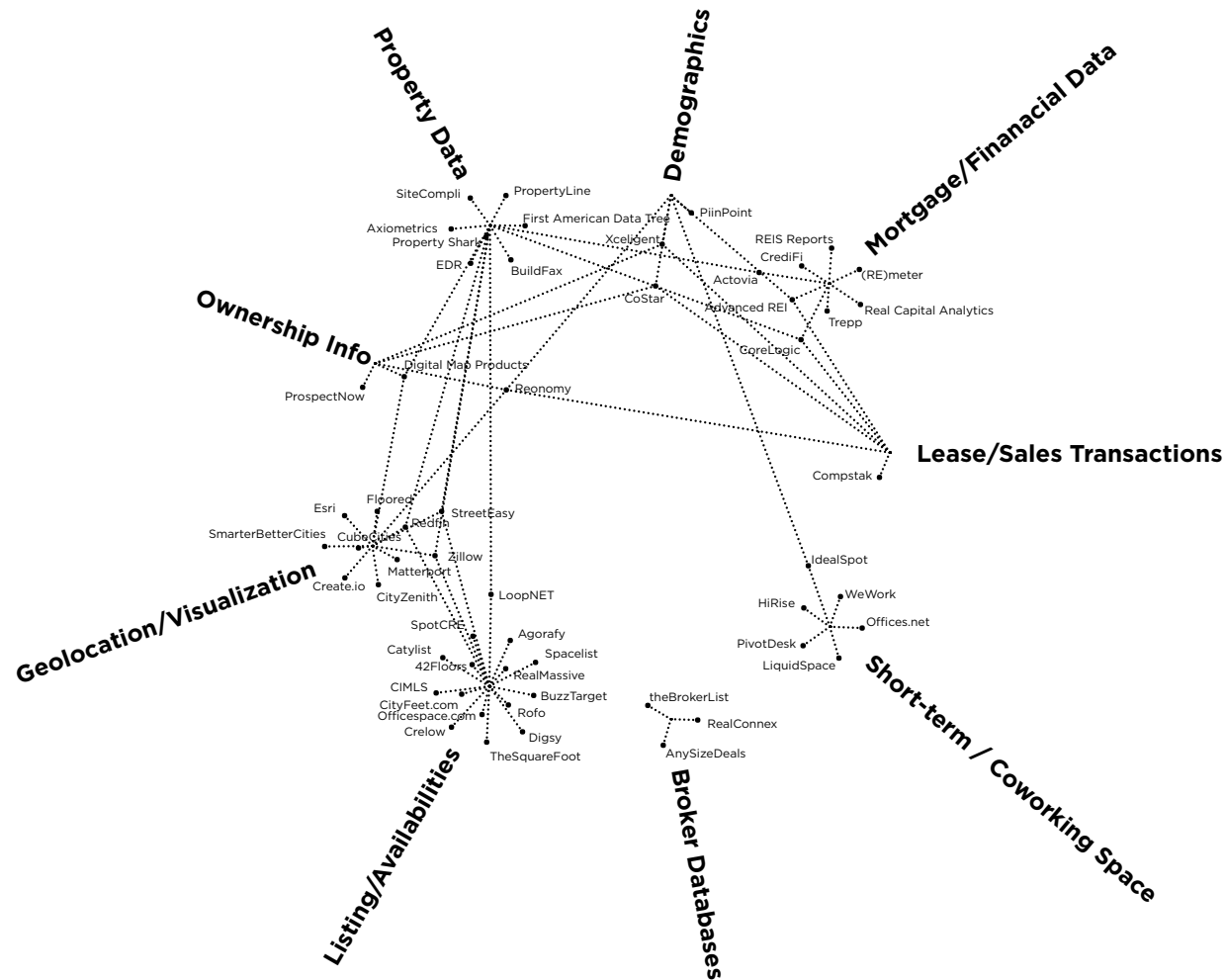
- MIT RE Tech Hub - 800+ startups:
 - * Residential, Multifamily, or B-to-C (~100+)
 - * Property/Portfolio Management (~50+)
 - * Real Estate crowd funding (~75+)
- Generally new, early stage, or spinoff ventures (<48 months)





DATABASE CLUSTERING

UNDERSTANDING THE NEW DATA LANDSCAPE





THE RISE OF URBAN TECHNOLOGY FIRMS

CREATING MULTI-DISCIPLINARY SYNERGIES FOR THE BUILT ENVIRONMENT

1573

NUMBER OF
FIRMS

505

LOCATED
CITIES

\$5.5BLN

AT LEAST
CAPITAL RAISED

ARCHITECTURE & DESIGN

11

NUMBER OF
FIRMS

CONSTRUCTION

32

NUMBER OF
FIRMS

CROWD FUNDS & SOURCE

119

NUMBER OF
FIRMS

DATA SERVICES

235

NUMBER OF
FIRMS

SPACE SHARING

17

NUMBER OF
FIRMS

LISTINGS

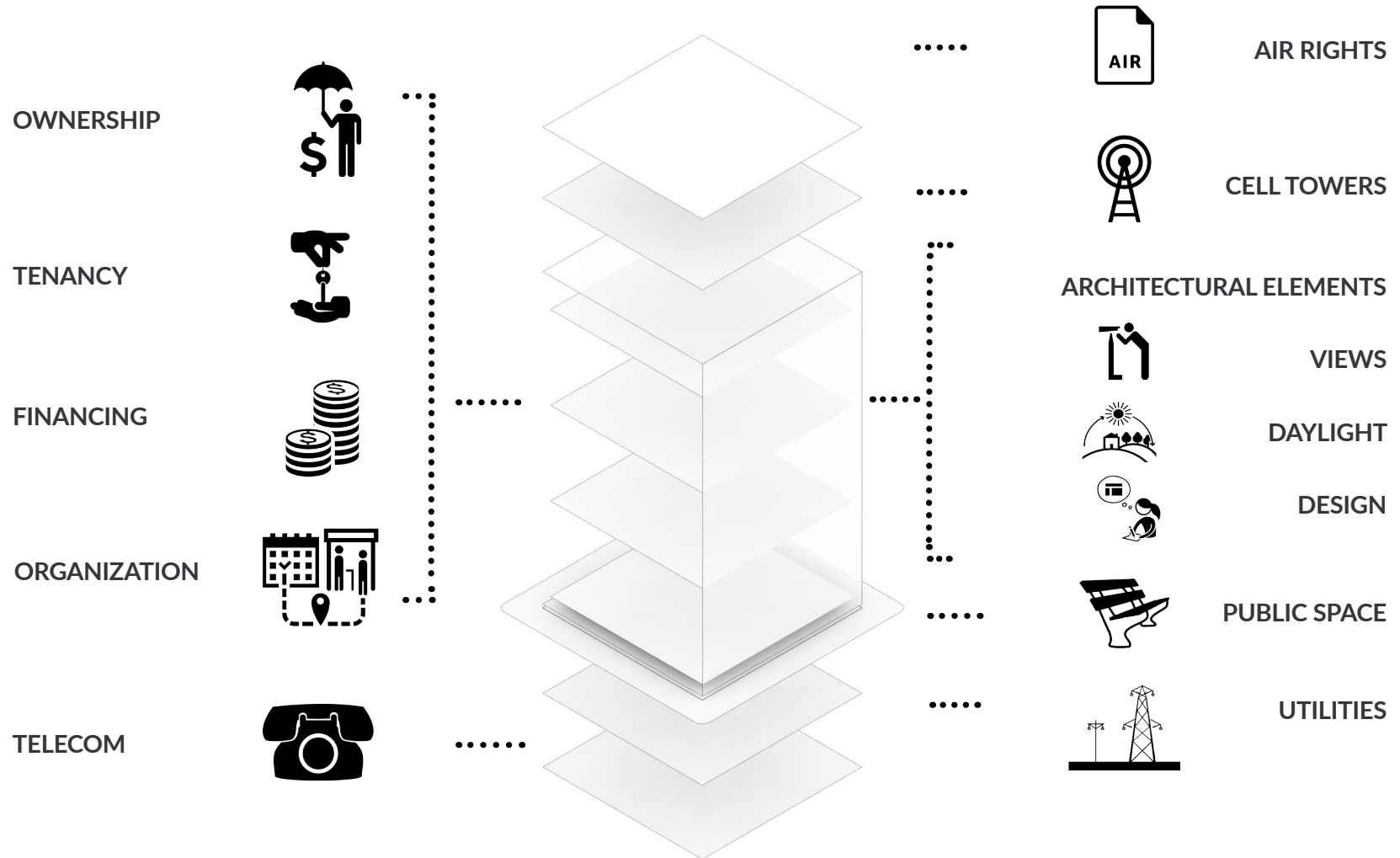
18

NUMBER OF
FIRMS



THE CRETECH DATABASE

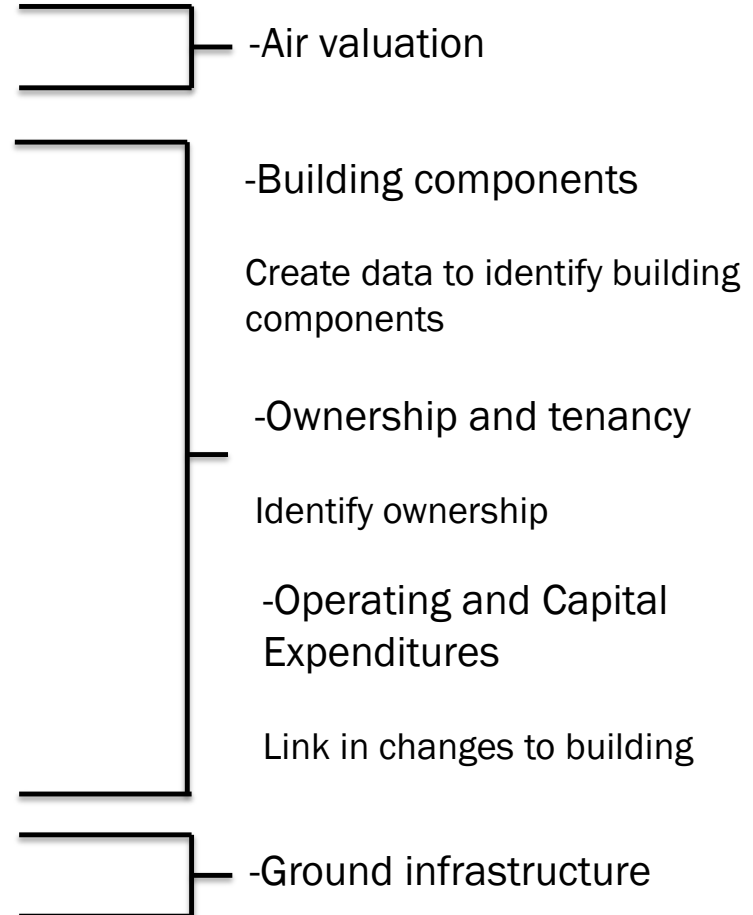
COMPREHENSIVE REAL ESTATE DATA





DECOMPOSING VALUE WITH DATA

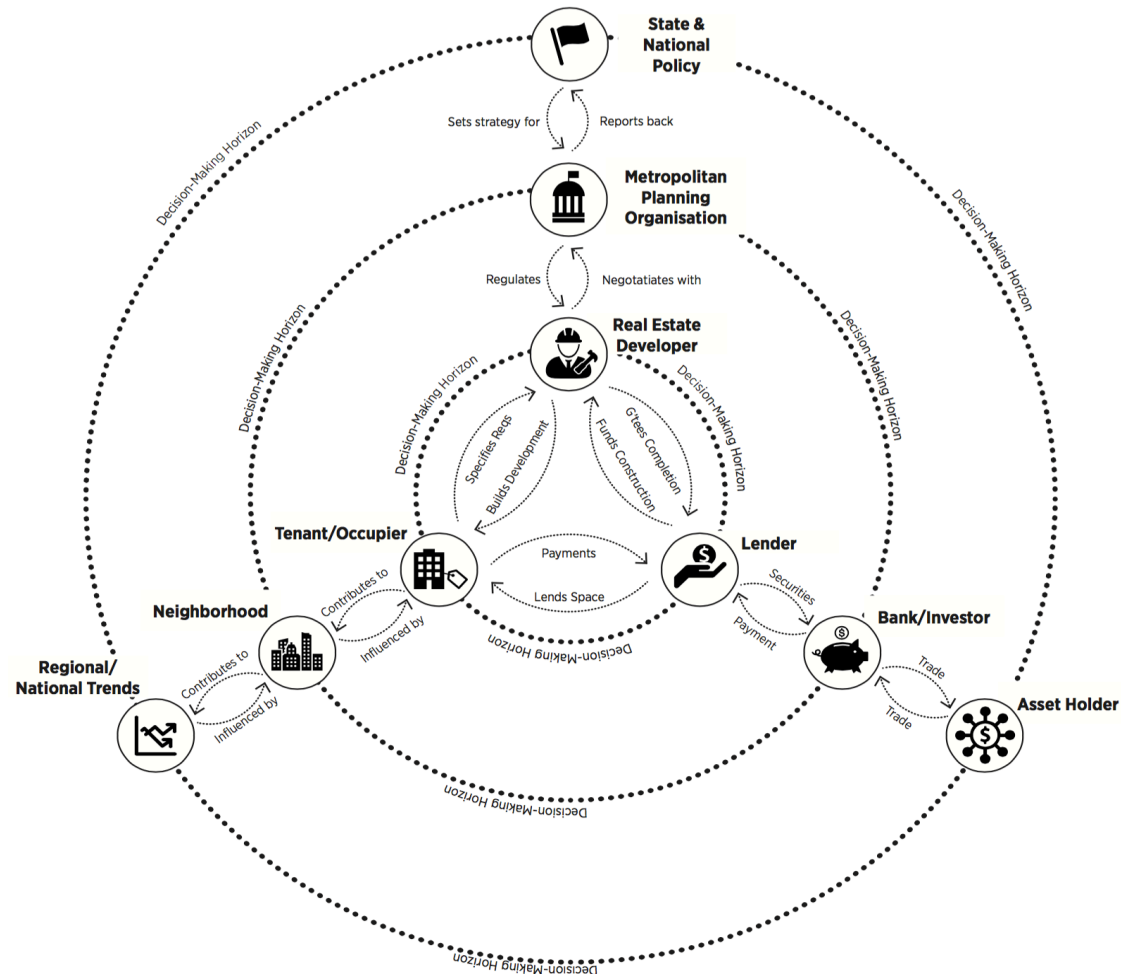
NEW AND OLD DATA SOURCES ENABLE GREATER BUILDING DESCRIPTIVES





MAKING NEW DISCIPLINARY CONNECTIONS

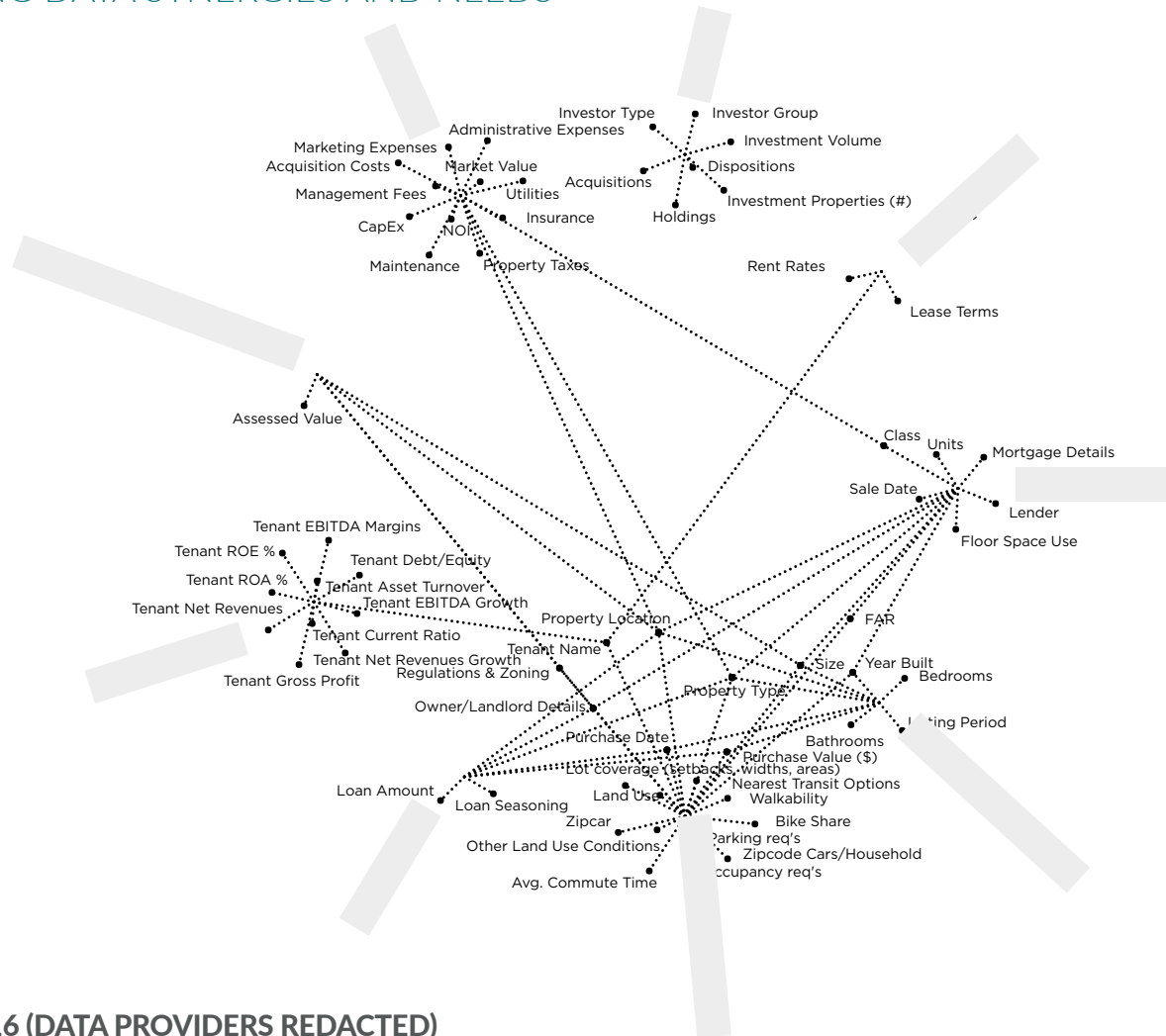
LINKING DATA ACROSS ABSTRACT BARRIERS AND FIELDS





PLAYING IN THE DATA SANDBOX

UNDERSTANDING DATA SYNERGIES AND NEEDS



CHEGUT & FINK, 2016 (DATA PROVIDERS REDACTED)



USING DATA TO TRANSFORM CITIES

TAKE DIFFERENT DATA SETS AND CREATE NEW KNOWLEDGE OF OUR EXPERIENCE

USE DATA TO UNDERSTAND
THE EXPANSE OF OUR
CURRENT KNOWLEDGE

METADATA IS DATA ITSELF
TO HACK AN
URBAN PROBLEM

LOOK ACROSS PLATFORMS
AND OUTSIDE URBAN
INNOVATION FOR
SOLUTIONS

URBAN INNOVATION STARTUP DATA

Urban data workbook for new products, processes and technologies for the built environment. The first is real estate data and it highlights fields that are commonly in databases from urban data companies. The second is a list of Boston startups in the urban data sector. The third is a list of limited list urban innovation startups from the School of Architecture + Planning. The fourth is a list of unicorn startups. Combined they make up some of the most interesting insights into new products, services and data bases that have ever been unleashed on the built environment. What could be very fun is to use these databases in new ways to create new and unique insights about the built environment and how these distinct digital approaches made by these firms can be synthesized to create something that has impact and solves urban problems.