TABLE OF CONTENTS

04 Global Market Overview
06 The Impact of COVID-19
08 Forward Projections
09 Regional Market Overviews

10 North America
12 Europe
14 Asia-Pacific
Data center investment interest remained robust in the first half of 2020 with many new capital sources expressing interest in the growing asset class. Overall demand for data centers continues to increase at exponential rates due to the rise in the need for data storage, compute and networking driven by consumer and business internet connectivity and the emergence of new technologies such as 5G, artificial intelligence, autonomous vehicles and the Internet of Things (IoT). Understanding that 90% of all data was created in the past two years, the long-term growth potential remains particularly attractive for current and new investors targeting the data center space [1].

As the overall need for data storage, compute and network increases, enterprises are largely adopting outsourced models, often leasing data center power capacity and square feet direct from data center providers and increasingly outsourcing to 3rd party public cloud service providers such as Amazon AWS, Google Cloud and Microsoft Azure. These large hyperscale cloud service providers both own and lease, in the form of colocation, their data center real estate. Often in the form of large-scale built to suits, the hyperscale cloud service providers account for a growing percentage of the overall leased market from the large public operators, such as Equinix and Digital Realty, as well as many private and more regionally based groups.

Historically, investors have been attracted to data centers due to their enhanced yields when compared to more traditional asset classes, such as industrial or multi-family. Largely dominated by private equity in years past, data centers now benefit from diverse global capital sources including pension fund advisors, insurance companies, sovereign wealth investors, and infrastructure funds. As a result of the increasingly expanded investor base, overall returns have compressed over time.

As new and existing data center investors look to increase their allocations to the growing asset class, they are targeting direct investments and joint ventures, recapitalizations, and the outright purchase of data center operating companies. There have never been more creative solutions to capitalize data center transactions than there are today.

THE IMPACT OF COVID-19

Data centers have been one of the highest performing assets in the Global REIT market this year, providing returns of 17.6% as of June 30th 2020 [2]. Deemed an essential business in the U.S., and benefiting from already minimal staffing levels, when contrasted with other asset types, data centers have continued operations with limited to no disruption since the start of the global pandemic. As internet usage has surged globally, so has the need for access to remote data, as hundreds of millions of professionals moved to work from home models. Illustrating overall resiliency, investor interest has strengthened since the COVID-19 outbreak. As a representation of heightened interest in the asset class, CBRE’s 2020 Asia Pacific Investor Intentions Survey found that 50% of investors polled after the Wuhan quarantine on January 23, 2020, expressed an interest in data centers compared to 27% prior to the outbreak [3].

Investors’ interest for assets providing stable income streams in uncertain economic times has resulted in a flight to quality assets leased to high credit tenants. As hyperscale cloud service providers are seen to largely benefit from the tailwinds of work from home models and expedited cloud outsourcing strategies, new investor interest is largely focused on this segment of the market. For direct investments, powered shell operating models are largely preferred as they typically require no maintenance capital expenditures or operations by the investor. At the same time where there is an on-going operational obligation, more commonly found in the turnkey or colocation segment of the market, investors are eager to form partnerships with experienced operators or form new management teams. Overall increased allocations and new entrants have contributed to recent trades at returns that are at or below pre-COVID levels for core product offerings.

Constrained debt markets contributed to a pausing and outright removal of select, more difficult to finance opportunities largely in the core plus and value add segments of the market. Select opportunities continue to move forward at pre-COVID levels, with others experiencing some price discovery.

As of the end of the H1 2020, the overall pandemic has benefited the data center investor market by highlighting the resiliency, generating greater investor interest and further contributing to the institutionalization of this fast growing, yet still emerging, asset class.

[2] Index derived using S&P Global Market Intelligence data and includes the following REITs: COR, CONE, DLR, EQIX and QTS.
FORWARD PROJECTIONS

With limited opportunities for direct investment and heightened investor interest, CBRE anticipates returns will continue to compress in the data center investment market globally. Hyperscale tenants looking to benefit from new and more aggressive sources of capital are likely to force the hand of many operators to structure new joint ventures for build to suit deployments as they continue large scale expansion plans amidst the COVID landscape. As traditional industrial/logistics operators and investors look to expand into data centers, powered shell returns and providers will blur the lines of the two product types. Heightened demand and compressed yields will lead to greater liquidity and increased investment activity. Strategic operators, searching for growth and benefiting from public and private capital investment will continue to make strategic acquisitions of companies and network centric assets as they look to differentiate long-term in the market, creating higher yield growth opportunities.
REGIONAL MARKET OVERVIEWS
The first half of 2020 saw an increase in overall asset level investment activity, in less overall transactions, when compared to H1 2019. Despite extended transaction timelines and withdrawn processes for many opportunities as a result of constrained debt markets and COVID-19, investor interest remained strong across the region with several billion in total investment volume. Foreign based investors accounted for roughly half of the overall activity, illustrating the growing global capital interest to invest in the North American data center market.

As work from home orders began to be enforced and overall travel limited, many existing processes were paused or outright withdrawn from the market. The core segments of the market, largely driven by hyperscale demand and still benefiting from available financing, continued to move forward, albeit at a slower pace. A foreign private equity investor acquired a hyperscale leased turnkey asset from a U.S. based operator mid-March for approximately $100M, at terms agreed to prior to the pandemic but held true through closing by all parties, including the lender. Select other smaller transactions closed throughout this period.

As travel and markets started to open for many North American locations near the end of the second quarter, processes previously withdrawn or paused began to re-enter the market. Greater investment activity is anticipated in the second half of the year, catalyzed by the Equinix announced plans to acquire 13 Bell Canada data centers for $750M and Mapletree acquisition of the remaining 60% of 14 data center assets for $494M, among other large on-market processes. While the COVID-19 situation remains fluid, and could delay future closings, overall investor interest remains at an all-time high.

SELECT H1 2020 ACTIVITY FOR THE NORTH AMERICA REGION INCLUDED:

- Mapletree acquired a 10-property powered shell portfolio from Digital Realty for US$557M.
- Digital Realty closed on an acquisition of 49% of the Westin Building Exchange in Seattle, Washington for US$368M.
- TierPoint raised US$320M of preferred equity through a consortium of new and existing investors to restructure existing debt and provide growth capital.
- DataBank announced a US$185M equity investment from Digital Colony through the purchase of secondary equity interests from existing investors Edgewater Funds and Allstate to fund future growth.
- Equinix completed the acquisition of three Axtel data centers in Mexico for US$175M.
- Landmark Dividend acquired PayPal’s 184,000 square foot Phoenix Data Center for US$122M on a leaseback basis.
Data center capital markets in Europe have remained extremely buoyant despite the COVID-19 pandemic.

A number of M&A transactions closed in H1 2020, a reflection of both the weight of new capital looking to enter the sector and continued consolidation by existing operators. The size of individual requirements continues to get larger, resulting in more and more build-to-suit solutions, leased on both a triple net and turnkey basis. Whilst the FLAP markets (Frankfurt, London, Amsterdam & Paris) remain Europe’s prime, Tier I markets, there has been an increase in hyperscale activity in Tier II markets such as Milan, Madrid, Zurich and Warsaw.

While data center investment sales remain a much sought-after commodity, the overall transaction volume remains limited. Market activity predominantly consists at the fund level. This is due to limited volume of leased data centers in existence, coupled with a lack of appetite for owners to sell their leased data center holdings.

### SELECT H1 2020 ACTIVITY FOR THE EUROPEAN REGION INCLUDED:

- Digital Realty Trust closed on the acquisition of European colocation provider Interxion, valued at US$8.4B, the largest ever data center M&A globally.
- Vantage Data Centers, backed by digital infrastructure investor Digital Colony, acquired Etix Everywhere, a colocation operator with facilities across secondary and tertiary markets in Europe, Africa and Latin America.
- AXA IM announced a successful minority position sale in their €1B (US$1.14B) pan-European Data4 platform to two institutional investors.
- Vantage Data Centers signed a definitive agreement with InfraVia Capital Partners, along with the two founders of the business, to acquire Next Generation Data (NGD).
- Keppel DC REIT acquired a Lufthansa data center in Frankfurt, managed by IBM, from KGAL KmbH for €81.8M (US$93.6M).
- DWS infrastructure fund, acting as owner of the tenant, NorthC, acquired the freehold interest in a 185,000 square foot powered shell data center in the Schiphol, Amsterdam area for US$32M from Bain Capital.
- Avignon Capital acquired a 80,000 square foot powered shell data center in Amsterdam for €11.55M (US$13.2M) from Somerset Capital Partners.
CBRE’s 2020 Asia Pacific Investor Intentions Survey found that 30% of investors in the region are considering purchasing data centers this year, a substantial increase on the 18% recorded in 2019.

Despite rising investor interest in Asia Pacific data centers, direct investment remains limited due to a lack of investable stock and relatively tight regulatory restrictions. Data centers accounted for just 1.5% of total Asia Pacific industrial real estate investment volumes between 2015 and 2019. Indirect equity investment remains the preferred route into the sector.

Investors can also form partnerships with experienced operators and developers to gain exposure to the sector. This approach enables investors to leverage their partner’s expertise on matters such as site selection, operations and regulatory compliance.

Other potential entry routes include co-mingled funds. While there are still only a handful of data center focused real estate funds in the region, CBRE is aware of several investors that have already raised capital for such dedicated funds, and others intending to do so.

**SELECT H1 2020 ACTIVITY FOR THE ASIA-PACIFIC REGION INCLUDED:**

- Hong Kong based Gaw Capital Partners announced a US$2.2B capital raise targeting alternative sectors including data centers.
- A consortium led by Macquarie Asia Infrastructure Fund 2 purchased an 88% stake in AirTrunk, a hyperscale data center company based in Sydney. The investment valued AirTrunk at more than AU$3B (US$1.8B).
- Equinix and GIC announced a US$1B joint venture to develop and operate three hyperscale data centers in Japan. This followed a similar JV between the same parties in Europe in 2019.
- The Dr. Peng data center portfolio in China was acquired by Pins International Financial Holding Limited (Backed by Viena Insurance Group AG), for a price of RMB 2.3B (US$322M).
- Blackstone invested US$150M into a Chinese data center company 21Vianet (NASDAQ: VNET) through a private placement, to help support the company’s rapid growth in wholesale and enterprise data center markets. Blackstone will be one of the company’s largest institutional stockholders.
The CBRE Data Center Capital Markets team combines data center real estate sales, advisory, financing and investment banking into a single, unparalled global offering. Supported by the world’s largest data center facilities operating and leasing platform, CBRE Data Center Capital Markets provides investors with acquisition, disposition and debt & equity recapitalization strategies, assists data center operators with strategic capital planning and advises enterprises in the disposition and structuring of sale leasebacks.