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Infrastructure investing will never be the same

Traditionally staid and stable, infrastructure investing has been shaken up by revolutions in energy, mobility, and digitization. Here's how investors can stay ahead of the curve.

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Infrastructure investing has long offered investors the best of both worlds: low-maintenance investments with predictable risk profiles and strong, consistent returns, even through chaotic periods.

The past few months have been turbulent, with significant inflation, increases in interest rates, declining equity markets, and a looming threat of recession. This uncertain panorama comes on the heels of the deep disruptions caused by the COVID-19 pandemic. While infrastructure investments are seen as better able than other investments to withstand such pressures, investors in the asset class still have to deal with the impact of structural shifts in the economic environment.

Meanwhile, there are deeper, more gradual ways in which the asset class is changing—and investors need to change with it. Revolutions in energy, mobility, and digitization are introducing new dynamics to existing infrastructure investments that previously appeared almost impervious to change. At the same time, economic and social transformations are introducing new types of investments that represent opportunity for investors.

The infrastructure shake-up and the unpredictable pace at which the energy transition is unfolding require investors to scrutinize their existing portfolios and ensure that assets are correctly rated for risk/return. Some investments viewed as low-risk, low-return "super core" assets may carry more risk than is currently understood, particularly as entire fuel sources and related assets are phased out of the economy. On the other hand, maturing network technology, combined with large-scale social changes such as the acceptance of remote working, have moved some digital assets down the risk spectrum. Investors need to understand which categories assets belong to today and adjust their portfolios accordingly.

Exposure to new types of infrastructure assets demands that investors manage higher levels of risk. Many next-generation investments are self-evident, such as electric-vehicle (EV) charging networks, battery storage, hydrogen distribution, and smart motorway and rail technology, 5G telecom networks, and data centers. These assets offer many of the characteristics that infrastructure investors look for: real assets, protected market positions, and the potential to generate stable cash yields. However, to get exposure to these new asset classes, investors will have to accept a period of significant investment and negative cash flow, along with development, technology, and commercial risks.

Benefiting from emerging opportunities calls for more active investing. It can be hard to come by alternative-energy infrastructure deals that meet even the modest $200 million minimum ticket size for many investors. The few that do are often exorbitantly priced, with EBITDA multiples reaching the mid-20s in some cases. To participate in the energy transition, investors will need to source deals more creatively and be willing to build businesses. For decades, returns from infrastructure investing have been more stable than those in both public- and private-equity markets and have provided a comforting record of success. But hidden within the steady graph lines are pockets of value destruction that should serve as a warning against complacency. By being aware of the factors causing the sea change in infrastructure, and knowing what pivots to make in response, investors can best prepare for the future.

The infrastructure shake-up requires investors to scrutinize assets' risk/return profile

Traditional risk-based classifications are being challenged by fundamental drivers led by the energy transition, including sustainability targets, electric mobility, and digitization. These forces mean that investors should assess the risk/return profile of specific assets and potentially recategorize them to account for new sources of both risk and growth.

Infrastructure's traditional taxonomy
As the infrastructure investment sector matured over the last few decades, the asset class branched into funds in three categories: super core, core, and core-plus.

Super-core investments are the lowest risk and lowest return. Traditionally, super core has included assets such as regulated utilities—which have regulated tariffs and little volume variation—and availability-based public–private partnership projects.

Core investments are relatively low risk and low return. Traditional assets in this category have included nonregulated oil pipelines and demand-risk transport-related assets such as toll roads, highways, and airports. Some assets that were of little interest to infrastructure investors a few years back, such as fiber-optic technology and telecom towers, are now considered core infrastructure.

Core-plus investments carry more risks and can offer returns approaching those of private-equity investments, at 15 percent or more. Such assets mimic the characteristics of classic infrastructure investments (see sidebar, "What is a classic infrastructure investment?") but are not universally considered part of the asset class. Fish transport, holiday villages, and crematoria are examples of core-plus assets.

Reassessing risk and return
In the past, individual assets sometimes moved up or down the risk/return spectrum. But with changes in energy, mobility, and digitization, more assets need to be reassessed: assets that have long dwelled squarely within an asset subcategory may need to move to a different bucket today, and there may be big shifts from super core all the way to core-plus. Dramatic reshuffling is occurring because assets that were once seen as immutably stable, such as gas pipelines, are now exposed to significant energy transition risk.

What is a classic infrastructure investment?

Historically, infrastructure investors have looked for investments that have the following attributes:

- are real, capex-intensive assets (something you can touch; that is anchored in the ground)
- are essential services (such as energy provision or transport infrastructure)
- offer steady and stable returns (and are not exposed to volatile commodity price markets or demand uncertainties)
- are downside protected (meaning they will perform well irrespective of the economic cycle)
- provide cash yields (something that is operational, profitable, and has sufficient cash flow to pay back to the shareholders) driven by high EBITDA margins that provide risk protection, a cushion for up-front capital expenditures, and higher leverage
- have barriers to entry, either via a regulated monopoly or long-term contracts
- are typically within energy (such as electricity or power distribution, oil pipelines and storage terminals, and renewables with power-purchase agreements); telecom (such as mobile towers, fiber, and data centers); transport (including seaports, airports, roads, and rail); and certain healthcare and education assets

Examples of recent asset subclass migrations include the following:

— *Gas networks* carrying methane hydrocarbons, which in a net-zero transition would potentially need to be phased out in regions where gas is substituted for low-carbon alternatives: While hydrogen can utilize some of these assets, the general view is that gas distribution will be required less, and that additional money will need to be spent to repurpose the networks. These risks mean that gas distribution is moving from super core to core or even core-plus.

— *Motorway service areas (MSAs)* that distribute fuel for internal-combustion engines (ICEs): As the number of EVs increase, fuel consumption for ICEs will likely decrease, but the greater need for EV charging stations presents a significant business opportunity for MSAs. This potential demand means that MSAs could move from core-plus to core.

— *Digital infrastructure assets* (such as mobile towers and fiber networks) that have moved down the risk spectrum as network communications technology matures: Digital assets now show returns that have moved them all the way from the core-plus to the super-core range.

— *Power networks,* which typically have a regulated return and stable revenues, are seen as super core: However, growing investment demands create deployment and regulatory risks that need to be taken into account.

A new era demands that investors change their approach

Investors should be aware of a broader sea change in the risk/return profile across the whole asset class. Investors have become accustomed to thinking of infrastructure as a haven. A record of steady returns relative to most other alternative asset classes (Exhibit 1), as well as a reputation as an asset class that can offer a hedge against economic downturns, enabled infrastructure funds in 2021 to raise close to $130 billion, around 55 percent more than in 2016.

Exhibit 1

Returns from infrastructure investing have been stable, delivering higher returns than most other alternative asset classes.

Annualized quarterly TSR, %

Total return, index (100 = Dec 31, 2007)

Source: Preqin analysis of infrastructure funds expectations

However, today there are relatively few assets that promise the steady returns that infrastructure investors became accustomed to in recent decades, leading investors to lower their expectations for future returns (Exhibit 2).

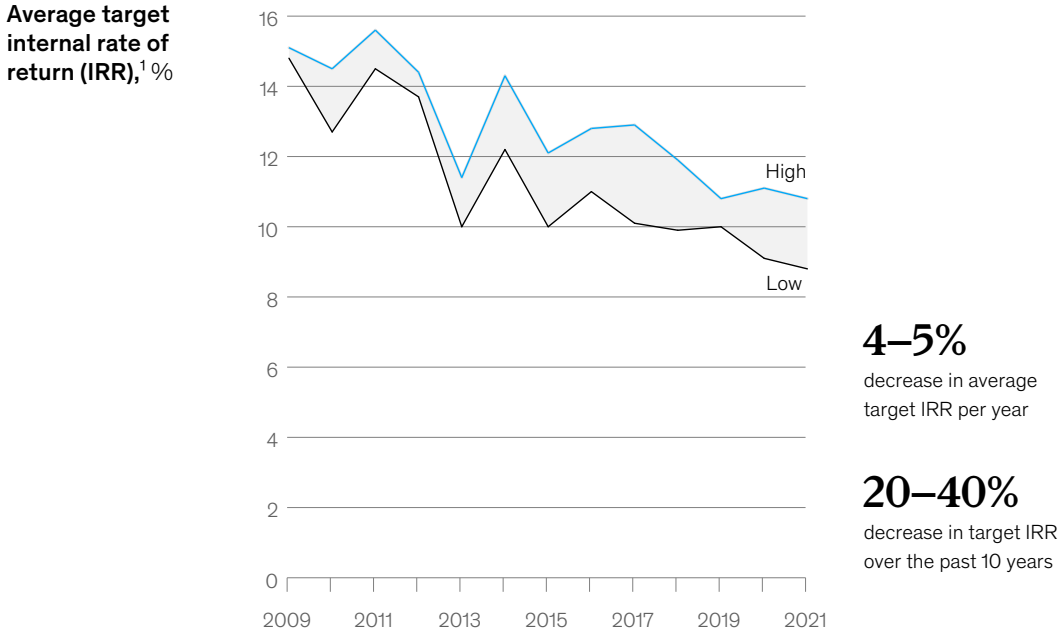
Moreover, infrastructure contains pockets of value destruction—most notably, downturns in telecom- and transport-related assets caused by the onset of the pandemic—that need to be managed wisely (Exhibit 3).

Investors should adopt a new approach to underwriting

To manage the new dynamics introduced by the energy transition and other structural changes, investors need to move beyond the historical underwriting approach that focused almost exclusively on relatively static technical assessments and financial models. Today, other factors need to be layered on for a full-picture understanding.

Exhibit 2

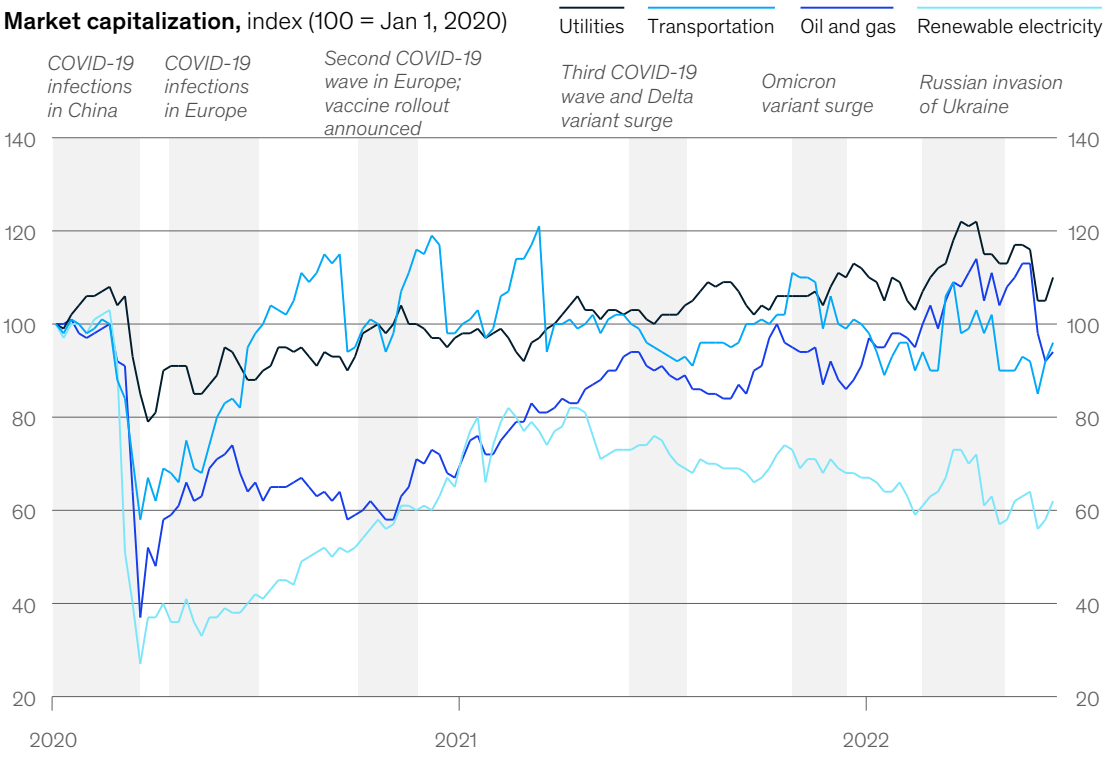
Expectations for returns from infrastructure investments have been declining.



[1]Low- and high-target IRRs across 20–40 funds per year. The returns are across all primary investment strategies (core, core plus, fund of funds, debt, opportunistic, and value added).
Source: Preqin analysis of infrastructure funds expectations

Exhibit 3

Most infrastructure sectors have recovered to pre-COVID-19 levels, except for renewables.



Note: As of July 1, 2022; predefined S&P sector indexes.
Source: Preqin analysis of infrastructure funds expectations

MSAs, for example, were traditionally evaluated based on traffic projections. While traffic is still important, the impact of EV charging means investors now need to understand factors including EV penetration, battery evolution, charging technology, and grid capacity.

Likewise, utilities' diligence has moved beyond technical and regulatory assessments to complex modeling of the impact of the energy transition (for example, how hydrogen could be a potential replacement for pipelines that currently carry natural gas). These changes require deal teams to have a different set of skills and capabilities (or a set of experts that can apply its skills during diligence), as well as a more proactive approach to developing an investment case.

Investors can use best-in-class asset management and technology to deliver superior returns

The days of sitting back and enjoying predictable, long-term yields have waned. The changing environment means that investors need to be more proactive about asset management, revisiting the risk/return dynamics of key asset classes to ensure that they have a current understanding of value drivers and trends.

Large investors should recognize that there have been enough developments over the past two years to trigger a complete reassessment of their portfolios and a fresh set of priority investment themes and theses. The speed and uncertainty of the energy transition, for example, can mean

that several critical assumptions underpinning an investment (such as EV penetration) move in unpredictable directions and at unforeseen speed. Appropriate and timely interventions may be required to preserve value. Investors need to actively manage a complex menu of strategic, operational, and digital initiatives to ensure that assets deliver according to the management plan.

Smaller investors with a minority stake also need to be cognizant of, and respond suitably to, changing risk/return equations. In some cases, that could include exiting assets if they lack sufficient leverage over management to enforce a strategic shift, or if the new risk/return profile no longer matches their ingoing assessment.

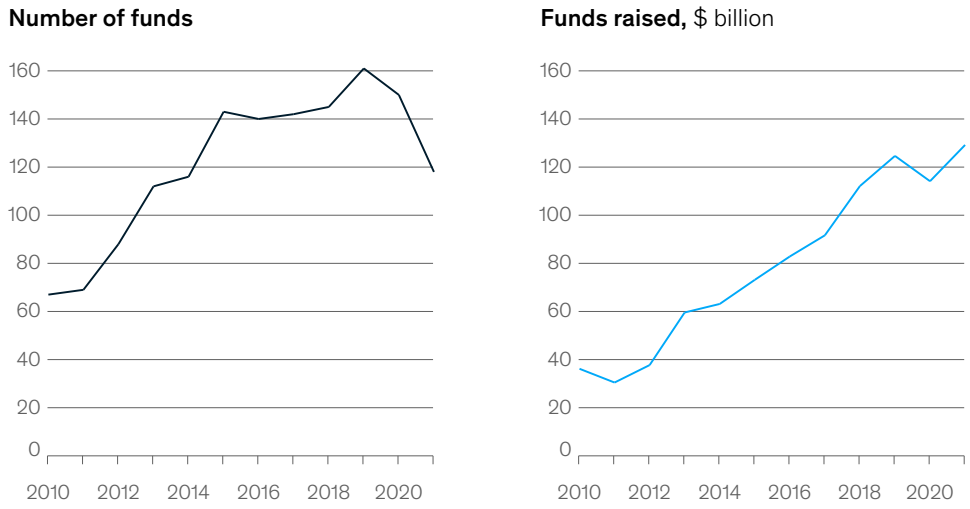
Investors also need to use operational and digital levers to create buffers for inevitable downturns, and to correct course when fundamentals shift. Our experience suggests that investors can use digital interventions and analytics to achieve improvements in a range of situations including reducing airport congestion, enhancing predictive maintenance, reducing procurement spending, reducing hospital waiting times, and improving telecom network performance, among others.

Benefiting from emerging opportunities calls for more active investing

Strong fundraising is likely to increase competition for assets. At the same time, fundraising is more concentrated, which means minimum equity investments need to be large. These concentrated funds are increasingly vying with one another to raise larger funds and maximize the size of assets under management (Exhibit 4). The upshot is intense competition for suitable infrastructure targets—in a higher interest rate environment.

Exhibit 4

Infrastructure fundraising has increased at a faster pace than the number of funds, resulting in larger fund sizes.



Source: Infra Investor, May 2022; Preqin

The energy transition is a prime example of a large-scale opportunity that could potentially be a recipient of these funds. The global economy needs an estimated $9.2 trillion in annual average investment in physical assets to achieve net-zero emissions by 2050.[1] Yet this sector is growing fast from a small base, and there are still few investable targets at scale.

Investors can look for deals in niche markets, through integrations and carve outs

Investors who want to participate in the energy transition could get left behind if they sit back and wait for competition to die down, climate tech developers to scale, or emerging markets to mature. Instead, they can consider more active investing styles that put them in the driver's seat.

One approach to sourcing proprietary deals is though detailed insights into niche markets versus reactive responses to competitive processes. For example, some investors in energy services have developed a proprietary view on creating value by scaling up and consolidating national champions in the nascent energy services space, helping them emerge successful in highly competitive auction processes for scarce assets in the sector.

Employing roll-up and bolt-on strategies can be critical to scaling up smaller investments in segments in which larger companies simply do not exist. In some cases, investors may set up their own management teams and build businesses from scratch. For example, a consortium of pension funds established a platform for project investments in renewable-generation assets. The platform now comprises more than 150 projects across the world with a total generating capacity of more than three gigawatts.

Building relationships with utilities to go after carve-out opportunities can be a way to build scale quickly in many areas where credible at-scale investments are hard to find.

In addition, some funds are setting up separate funds with a different investment profile (typically, higher risk and smaller ticket size) to go after the energy transition opportunity in its early stages. The intention is eventually to migrate these assets to their infrastructure funds when they mature, or to sell them to other infrastructure funds.

There are, of course, opportunities outside of the energy transition. For example, several investors have recently bought large-scale telecommunications companies to get access to fiber and towers, and have proceeded to scale these acquisitions or integrations.

Strong evidence suggests that despite pressures from the flood of capital and the potential consequences of a widely feared recession, infrastructure remains an attractive long-term investment avenue for institutional investors.[2] To stay in the race, investors will need to push the boundaries of investable assets, while also adhering to the investment objectives underlying infrastructure as an asset class—and of their limited partners.

[1] "The net-zero transition: What it would cost, what it could bring," McKinsey Global Institute, January 2022.
[2] In 2021, infrastructure and natural resources set all-time highs for fundraising, AUM, and deal volume. For more, see "McKinsey's Private Markets Annual Review," McKinsey, March 24, 2022.

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