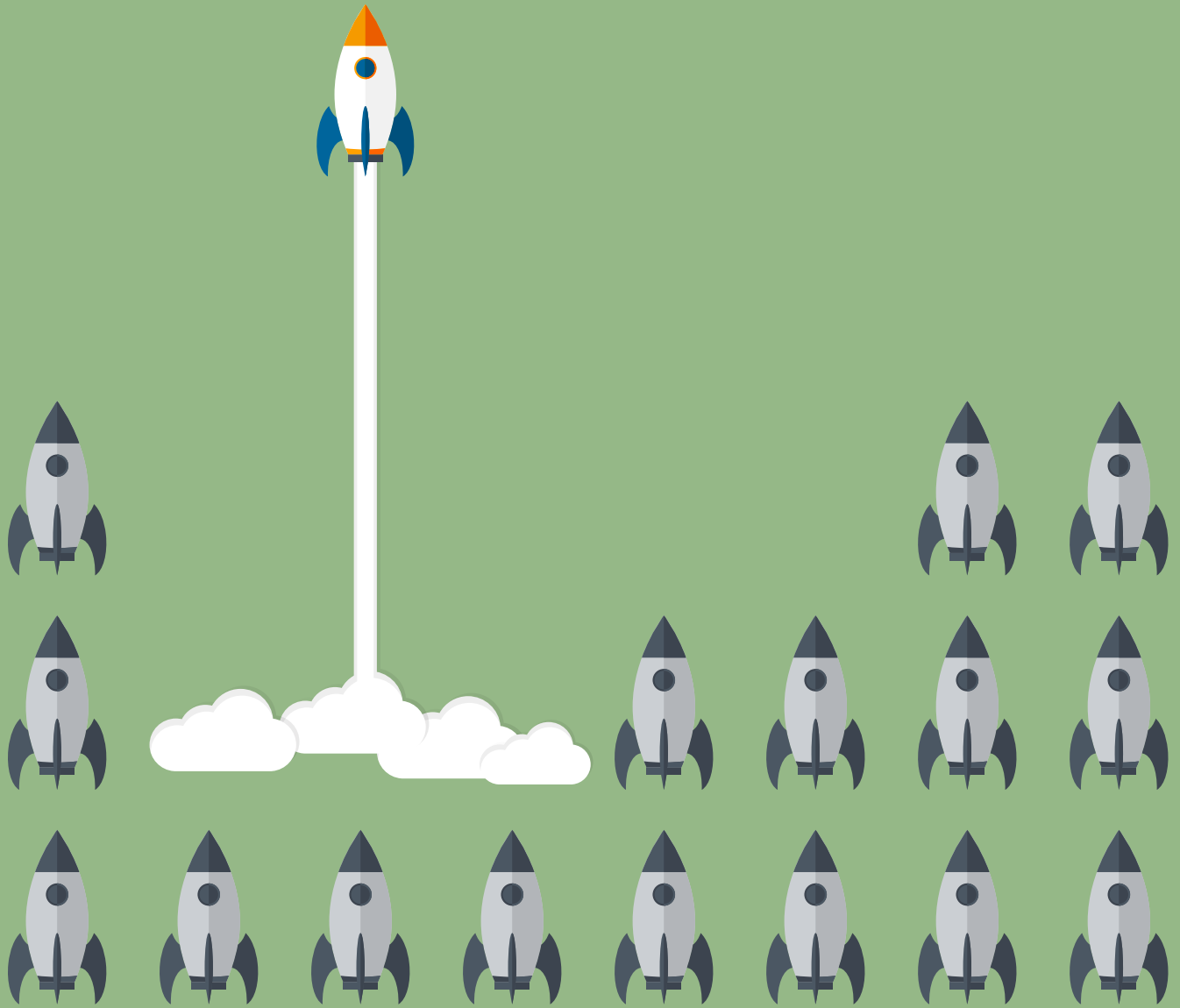
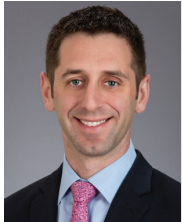


Alternative Data for Alpha

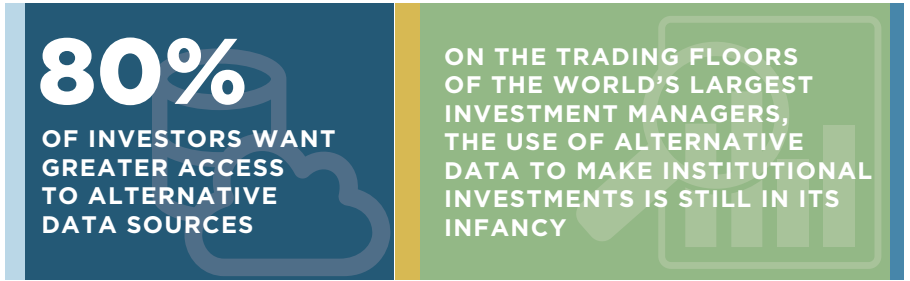


CONTENTS

- 2 Executive Summary
- 3 Introduction
- 4 Alternative Data is More than Just Twitter
- 6 Extracting Value from Alternative Data
- 8 What's Stopping You?
- 9 Integration
- 11 Alternative Won't be Alternative for Long



Kevin McPartland is the Head of Research for Market Structure and Technology at Greenwich Associates.



Executive Summary

The buy side today has access to data and information that would have been unheard of 20 years ago. Whereas in the past they relied primarily on research and information from their sell-side trading counterparties, today they have as much, if not more, real-time access to news and information than their dealers do.

The downside to this change, however, is that finding an edge in investing is harder than ever. With data access so ubiquitous, finding the needle in a haystack that no one else has found often feels impossible. This is where alternative data enters the picture.

Crowdsourced research and social media sentiment analysis fit that bill and have captured the interest of investors and fintech providers around the world. But confining your view of alternative data to a Twitter stream limits the potential alpha. Private company business performance, logistics data and satellite imagery can and already do create alpha for investment strategies that need insights beyond what the most commonly analyzed data can provide.

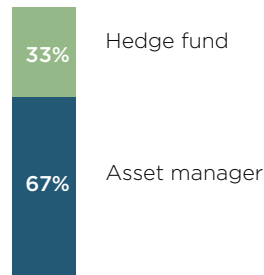
But roadblocks to alternative data access remain. Concerns over cost, data completeness and integration are holding back investors from what, in theory, seems to be an obvious step forward. For those that can solve these issues first, however, utilizing unique data sources such as private company performance information, social media sentiment or satellite imagery, investors can once again find an edge on their competition with the resulting alpha the prize.

METHODOLOGY

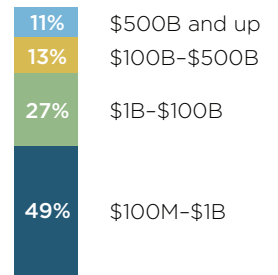
Between October and November 2016, Greenwich Associates interviewed 69 U.S.- and European-based chief investment officers, portfolio managers and traders at investment managers with between \$100 million and \$1 trillion assets under management. Interview topics included, but were not limited to, current and planned use of alternative data sources, roadblocks to utilizing new data sources, and platforms used to access and analyze alternative data.

RESPONDENTS

By FirmType



By AUM

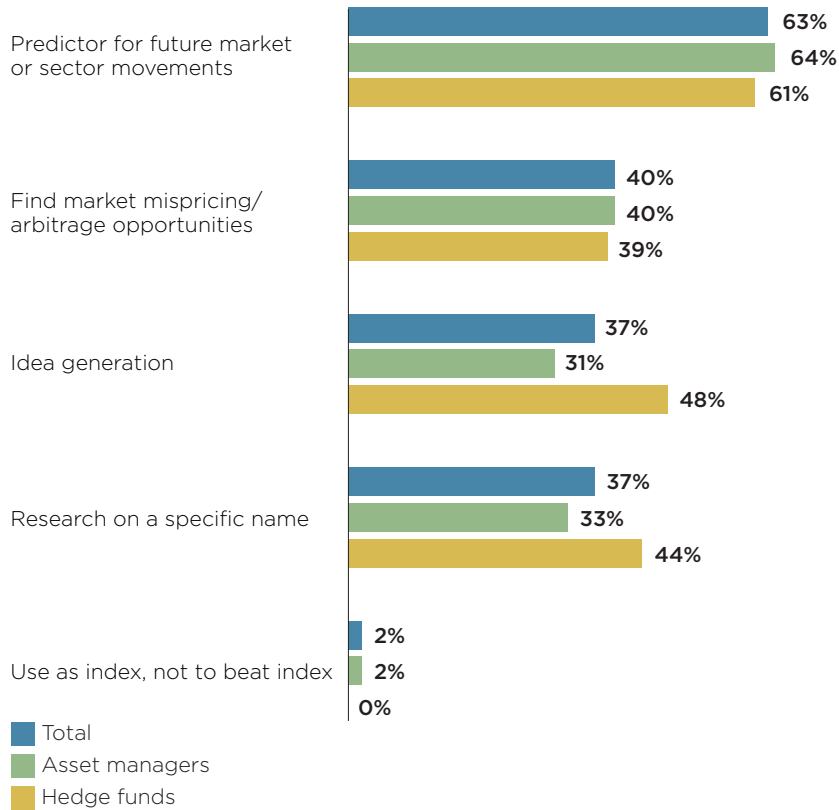


Note: Based on responses from 46 asset managers and 23 hedge funds.
Source: Greenwich Associates 2016 Alternative Data for Alpha Study

Introduction

Investing is all about data. Even when portfolio managers are guided by good old fashioned experience and “gut feel,” those instincts are driven by what the data is telling them. Similarly, it is often assumed that data drives the investment decisions of only quantitative investors, with fundamental investors relying on public company earnings statements. While this might have been true 20 years ago, today active long-only mutual funds rely just as much on data as does a global-macro hedge fund. Their strategies might be light years apart, but they are both chasing the same thing—alpha.

DATA USAGE TO BEAT AN INDEX OR TO GENERATE ALPHA



Note: Based on responses from 45 asset managers and 23 hedge funds.
Source: Greenwich Associates 2016 Alternative Data for Alpha Study

Nearly two-thirds of the investors we interviewed for this research said they use data to predict the future. By examining historical data and its movement over time, they hope to gain a degree of confidence regarding what the market is likely to do next. This result isn't particularly surprising, given the goal of most institutional investors is to divine the market's direction and act accordingly. Asset managers and hedge funds were similar in their views here.

The difference between quantitative and fundamental investors can be seen in their use of data for idea generation. Nearly half of hedge funds look to data to generate trading ideas, compared to just over 30% of asset managers, who generally make investment decisions utilizing corporate access and sell-side research rather than making data-driven predictions. In a similar vein, more hedge funds utilize data to research a specific name than do asset managers.

Nearly 70% of investors believe that real-time market data provides them an edge. But with everyone using the same data to make decisions, determining how that shared resource can be used to gain an advantage is challenging. Portfolio managers are then thrust into the game of who is smarter than whom, which in a world of highly educated investment professionals is a tough game to play. Increasingly, therefore, investment managers need access to unique or alternative data to find that alpha.

Alternative Data is More than Just Twitter

Within fintech circles, alternative data includes social media sentiment analysis and crowdsourced research, such as that produced by Estimize and StockTwits. The impact these data sets and platforms will have on the market over time is not to be trivialized. Beyond the confines of traditional Wall Street research, utilizing technology to harness this unfound intelligence is fascinating and prudent for the capital markets.

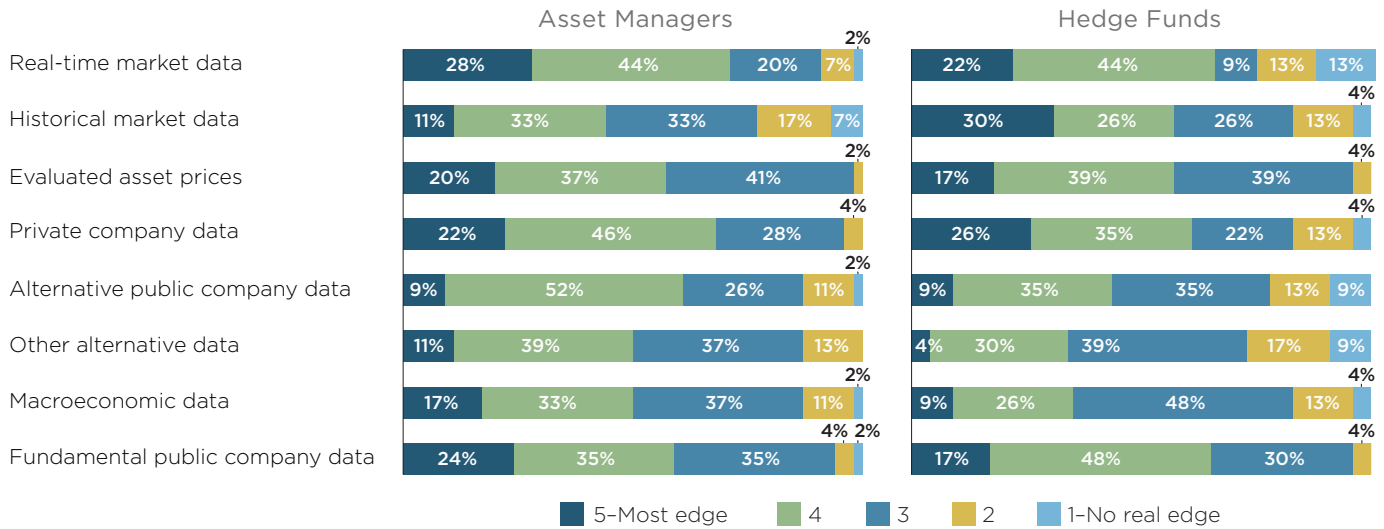
But on the trading floors of the world's largest investment managers, the use of such data to make institutional investments is still in its infancy. While the data and related analytics are intriguing, historical performance results are still limited, leaving the hands of portfolio managers somewhat tied.

Alternative public company data (i.e., credit scores and payment history) and private company data are seen as providing a huge edge in today's market. Over 60% of asset managers participating in our study believe alternative public company data provides the most edge, while nearly

WHAT IS ALTERNATIVE DATA?

- Business performance information that shows public companies' payment experience (i.e., how they pay their creditors).
- Business performance of private companies and how it influences and predicts that of public companies.
- Corporate linkage providing a clear picture of total risk and opportunity across related businesses.

DATA TYPES PROVIDING THE MOST EDGE



Note: May not total 100% due to rounding. Based on responses from 46 asset managers and 23 hedge funds.
 Source: Greenwich Associates 2016 Alternative Data for Alpha Study

70% favor private company data. Hedge funds find edge in both of these data sets but are more focused on private company data, as it suits their generally more creative investment strategies.

While alternative public and private company data are similar in nature, their use cases are more distinct. The former is primarily used by investors in public companies who want to understand their financial health in a way that public statements don't allow. Alternative private company data, on the other hand, is generally used by either investors in corporate bonds who need to understand credit quality in more detail, or by public company investors who look to private companies as a leading indicator of public company performance.

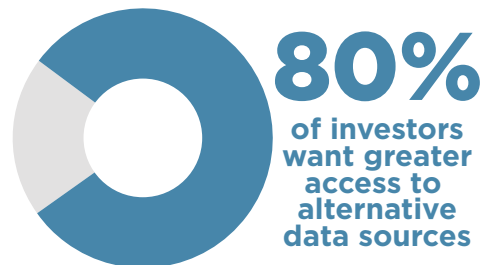
Understanding the supply chain of a public company represents one specific use case for alternative company data. For instance, let's assume a large, public technology provider plans to release a new mobile phone that should dramatically impact earnings. That release will be hugely dependent on the delivery of various components from small, private suppliers all around the world.

For investors in that public technology company, the ability to weed out details on a single supplier that may be under financial stress could have a dramatic impact on their investment strategy. To do this, the investor can look at shipping logistics data, court filings, the payment history of that private company to its suppliers, the company's credit rating, and the size of its accounts payable, among other similar factors. Such data on a single company is interesting and can be useful, but across the entire supply chain of every company in a sector can create meaningful alpha.

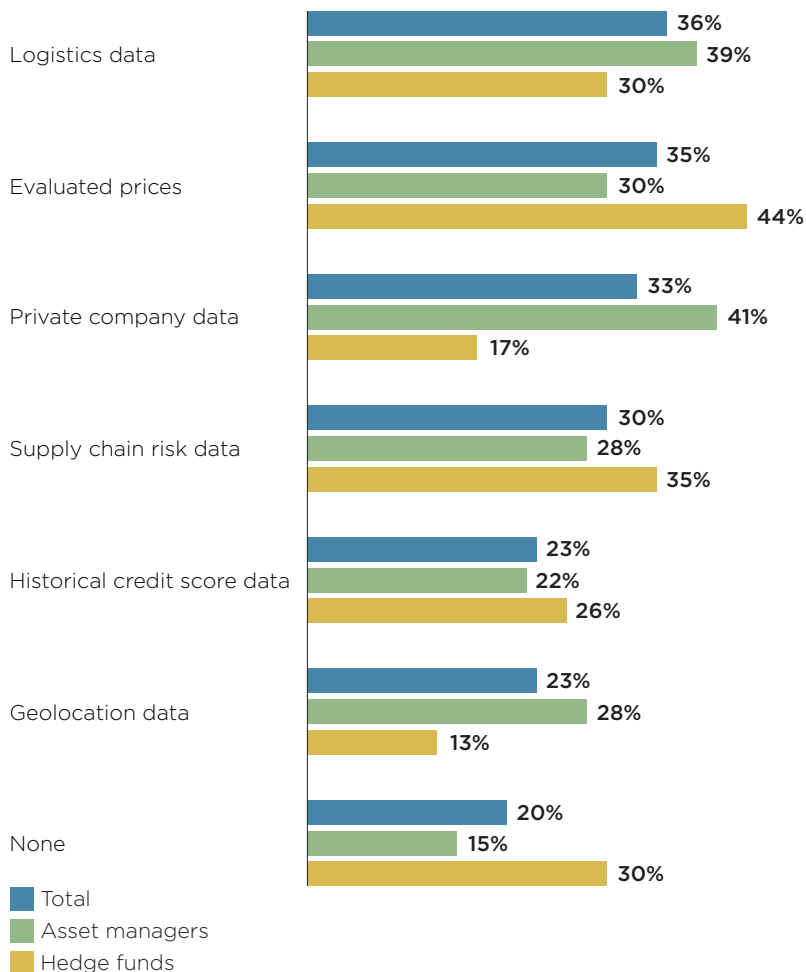
Extracting Value from Alternative Data

Asset managers are starting to recognize this value and cite private company data as the top item on their alternative data wish list for its alpha potential. A number of factors keep private company data from meeting this demand, including perceived high costs and firm-specific operational obstacles that we will discuss in more detail below. Nevertheless, this presents a huge opportunity for those able to deliver this data to the asset management community in an efficient and easy-to-consume way.

Including hedge funds as well, 80% of investors want greater access to alternative data sources in general, with logistics data, evaluated pricing and private company data topping the list. The wants of asset managers and hedge funds are as diverse as their investment strategies. Whereas



ALTERNATIVE DATA WISH LIST

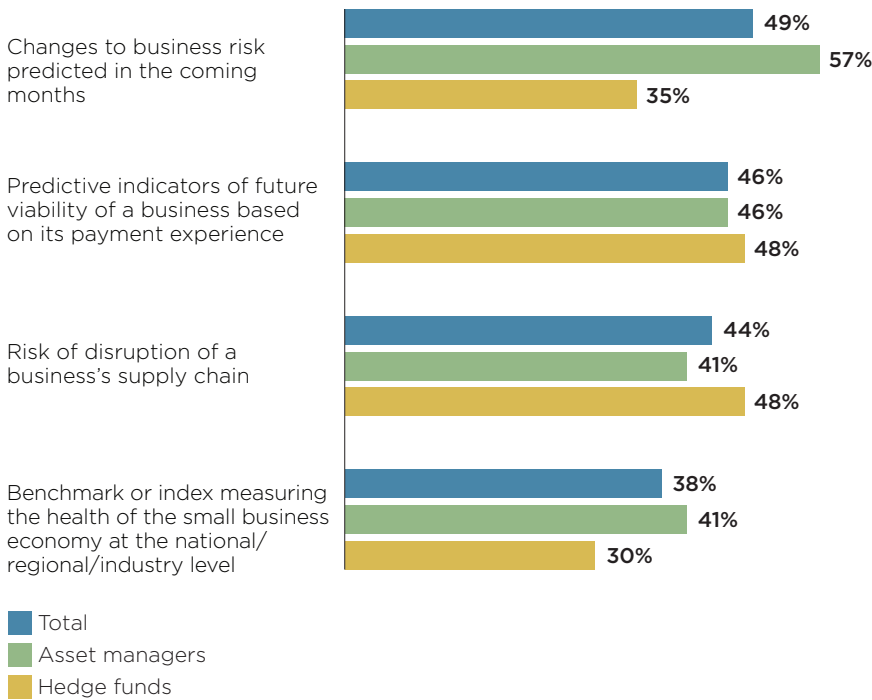


Note: Based on responses from 46 asset managers and 23 hedge funds.
Source: Greenwich Associates 2016 Alternative Data for Alpha Study

asset managers find private company data the most compelling, hedge funds are primarily interested in evaluated prices, likely due to their use of harder-to-price financial instruments.

Conversely, investors agree on which alternative data metrics are most beneficial, with an unsurprising interest in predicting the future. A variety of alternative data sources can be used independently or in concert with one another to unearth business risks not apparent in public filings—such as a slow but steady increase in accounts payable, supply chain disruptions and even macroeconomic changes impacting the entire sector. For instance, a combination of the private company supply-chain credit-risk data asset managers are looking for satellite imagery depicting store traffic and Twitter sentiment analysis could create signals portfolio managers focused only on traditional sources would miss.

BENEFICIAL METRICS OR DATA SOURCES

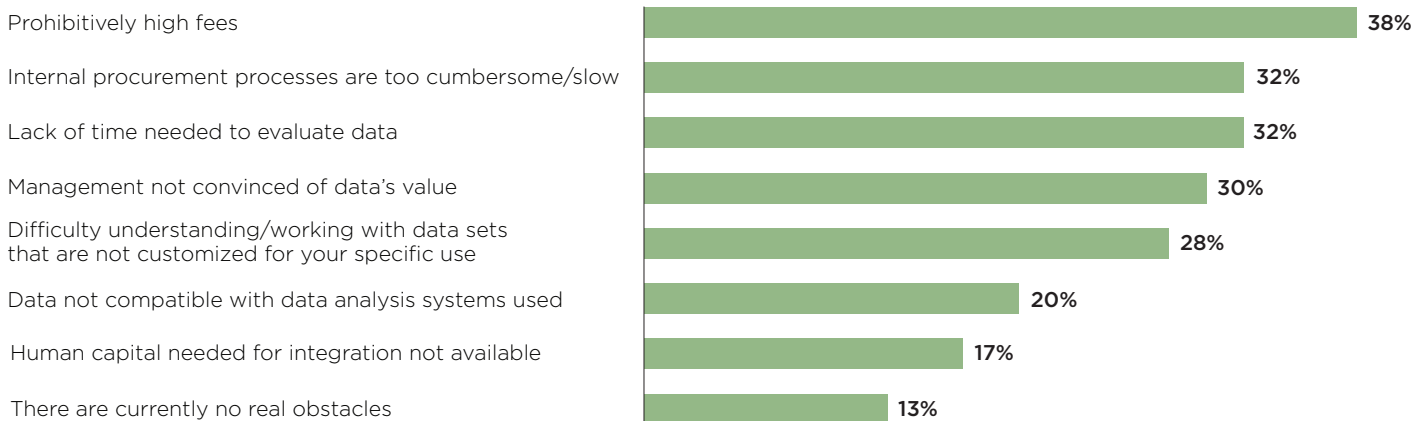


Note: Based on responses from 46 asset managers and 23 hedge funds.
 Source: Greenwich Associates 2016 Alternative Data for Alpha Study

What's Stopping You?

The buy side sees edge in alternative data, and a large percentage want access to alternative data they don't currently have, hoping to capture that advantage. This misalignment of value and actual usage tells us that roadblocks, whether real or perceived, exist for investors seeking unique alternative data sets.

OBSTACLES TO USE OF ALTERNATIVE DATA



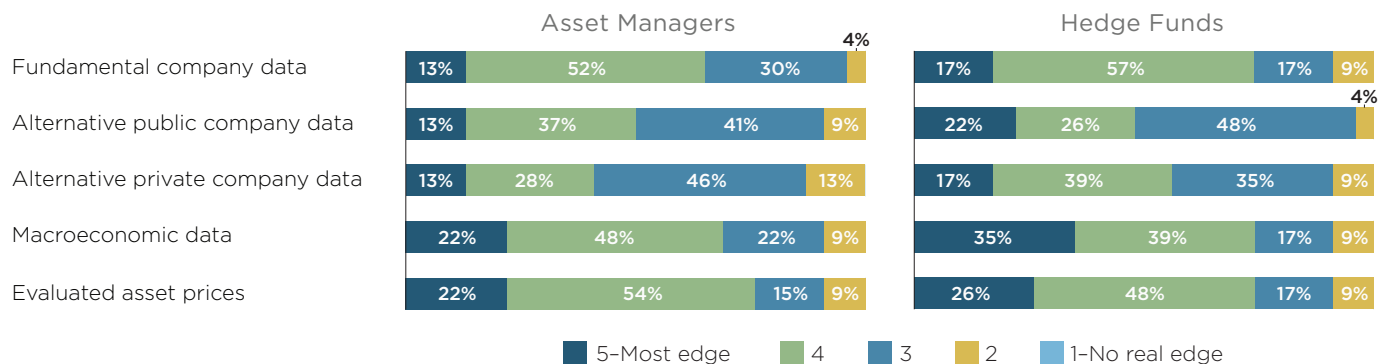
Note: Based on responses from 46 asset managers and 23 hedge funds.
Source: Greenwich Associates 2016 Alternative Data for Alpha Study

Firm-level constraints top the list of obstacles, with cost and internal procurement procedures limiting adoption of new data sources. In a similar vein, when management is not convinced of the value, alternative data can remain out of reach. Providers of these data sets, therefore, need to demonstrate the potential value/alpha created when the data is applied to given trading strategies. This enables the trading desk to present a clear path to recoup the time and costs associated with onboarding new data, giving management less reason to prevent the transaction.

Management is also concerned that the data sets available today, while valuable, are not complete. In this regard, investors unsurprisingly were mostly happy with their traditional data sources—fundamental company data and macroeconomic data. Less than half, however, felt that the alternative company data sets available to them were incomplete.

Perception in this case is reality, and a belief that some of the pieces are missing will leave portfolio managers skeptical about making decisions based on data perceived to be incomplete. This means that alternative data sets that are, in fact, complete are particularly valuable to portfolio managers. As such, providers that can demonstrate their data quality are well-positioned for growth, given asset manager demand.

COMPLETENESS OF DATA TYPES



Note: May not total 100% due to rounding. Based on responses from 46 asset managers and 23 hedge funds.
Source: Greenwich Associates 2016 Alternative Data for Alpha Study

This, again, presents another opportunity to data providers. Those that provide metrics to potential and existing users demonstrating the quality and completeness of the data set can expect to see quick adoption, given the natural demand from, and the value seen by, the buy side.

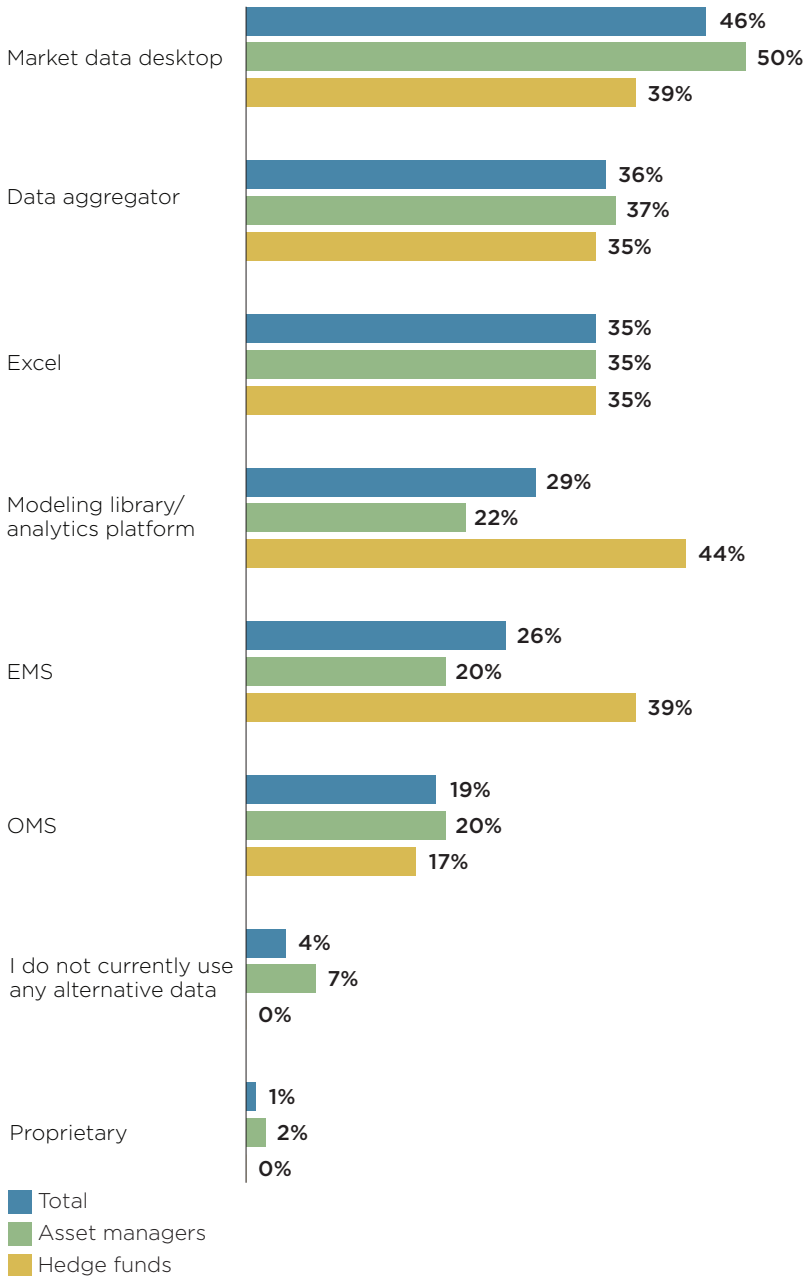
Integration

The ability to quickly integrate the desired data into the trading and analytics technology already on the desk can also ease adoption. Market data desktops such as those provided by Bloomberg, Thomson Reuters and Factset are the most commonly used applications to access alternative data. Analytics platforms and data aggregators are also frequently offered by firms such as Numerix, Quandl and 1010data. And, of course, Excel is still the primary choice of more than one-third of the investors we interviewed.

Interestingly, OMSs and EMSs were not often used, as these platforms are commonly leveraged to implement and manage investment strategies, rather than to research and look for “edge.” That said, nearly 40% of hedge funds we spoke with take alternative data into their EMS, using it to generate trading signals throughout the day. This demonstrates an opportunity both for OMS and EMS providers to integrate more data into their platforms and further integrate portfolio analytics into the system, allowing an investment firm to move from idea generation to strategy execution within a single environment.

For each of these platform categories, improving access to alternative data is beneficial to all involved. Given that asset managers have a particular interest in private company data, enhanced access will keep the distribution platforms sticky, the buy side happy and allow the data providers to focus on data-set expansion and quality.

APPLICATIONS USED TO ACCESS ALTERNATIVE DATA



Note: Based on responses from 46 asset managers and 23 hedge funds.
 Source: Greenwich Associates 2016 Alternative Data for Alpha Study

Ultimately, integration with existing technology further breaks down the roadblocks to adoption, reducing costs, easing procurement headaches and allowing management and portfolio managers alike an easy way to assess, consume and action new alternative data sources.

MARKET DATA DESKTOP

Market Data Desktop	OMS	EMS	Modeling Library/ Analytics Platform	Data Aggregation
Bloomberg	Bloomberg	Bloomberg	Bloomberg	Bloomberg
Factset	Charles River	Flextrade	FINCAD	Factset
Thomson Reuters	EZE Castle	Portware	In-house	Quandl
		Redi	Numerix	S&P
			Quantifi	1010data
				Thomson Reuters

Source: Greenwich Associates 2016

Alternative Won't be Alternative for Long

The most forward-looking providers of alternative data are working tirelessly to tackle the buy side's concerns. Data quality, completeness, cost, and accessibility are already improving. In many cases, further adoption requires both the potential consumers and those providing the data to create greater awareness of what's out there and what you can do with it. This, though, is a double-edged sword.

Alternative data will only be alternative for so long—eventually becoming a core part of any portfolio manager's toolkit once the aforementioned roadblocks are taken down. Just as cloud computing is on its way to being called simply "computing," private company, social media, and satellite data, among others, will also soon lose their alternative label. That said, each of the data sets and others will also evolve, constantly improving in an effort to provide edge to those willing, able and informed enough to utilize the information.

Nevertheless, now is the time to utilize these new data sources to gain an edge. Ultra-low latency market access provided tremendous edge to trading firms in 2010, whereas today it's simply viewed as table stakes, with the playing field now largely leveled. Edge can only be found via information that only one or very few firms have. Therefore, once private company payment histories are a ubiquitous element of the fundamental company data sets used by investment managers, the edge will start to slip away.

Alternative data will only be alternative for so long—eventually becoming a core part of any portfolio manager's toolkit once the aforementioned roadblocks are taken down.

Cover Photo: © iStockphoto/Madedee

The data reported in this document reflect solely the views reported to Greenwich Associates by the research participants. Interviewees may be asked about their use of and demand for financial products and services and about investment practices in relevant financial markets. Greenwich Associates compiles the data received, conducts statistical analysis and reviews for presentation purposes in order to produce the final results. Unless otherwise indicated, any opinions or market observations made are strictly our own.

© 2017 Greenwich Associates, LLC. Javelin Strategy & Research is a division of Greenwich Associates. All rights reserved. No portion of these materials may be copied, reproduced, distributed or transmitted, electronically or otherwise, to external parties or publicly without the permission of Greenwich Associates, LLC. Greenwich Associates®, Competitive Challenges®, Greenwich Quality Index®, Greenwich ACCESS™, Greenwich AIM™ and Greenwich Reports® are registered marks of Greenwich Associates, LLC. Greenwich Associates may also have rights in certain other marks used in these materials.

