FACTS & TRENDS

FEDERAL RESERVE BANK OF NEW YORK

Vol. 3, No. 2 ▸ October 2010

www.newyorkfed.org/regional

Small businesses typically create more jobs than larger firms do at the start of economic recoveries. However, recent contractions in borrowing have limited the ability of small businesses to play this critical role. A poll of small-business finances finds evidence of comparatively strong credit demand, but weakened applicant quality, with borrowers continuing to perceive restricted credit availability.

Access to Credit: Poll Evidence from Small Businesses

Small businesses are vital to supporting the economic recovery. Small firms employ nearly half of all Americans, account for about 60 percent of gross job creation, and historically have created more jobs than larger firms at the start of economic recoveries.[1,2] Yet recent contractions in business borrowing may be limiting the capacity of small businesses to play this critical role. As policymakers and stakeholders pursue measures to support sustainable lending to creditworthy firms, questions arise about how much of the credit decline may be attributed to weaker demand for loans; how much reflects weakened applicant quality; and how much is due to restricted credit availability. While all three dynamics undoubtedly contribute, further analysis could help stakeholders direct actions to meet credit gaps and remove barriers to borrowing.

To inform these discussions, the Federal Reserve Bank of New York's Community Affairs Office conducted a Small-Business Finances Poll in June-July 2010.[3] The intent was to hear directly from businesses about their credit needs, their economic health, and their experiences seeking credit (see box). This issue of *Facts & Trends* presents the poll's results.

The Community Affairs Office thanks the local government and nonprofit organizations that distributed the poll to their members. These include: Accion USA, Ben Franklin Technology Partners of Pennsylvania, the Bronx Overall Economic Development Corporation, the Brooklyn Chamber of Commerce, the Business Council of New York State, Community Development Corporation of Long Island, Community First Fund, Cooperative Business Assistance Corporation, the Entrepreneurs Forum of Greater Philadelphia, the Manhattan Chamber of Commerce, New Jersey Economic Development Authority, New York Business Development Corporation, the New York City Council, the New York City Department of Consumer Affairs, the New York State Small Business Development Centers, Queens Economic Development Corporation, the Staten Island Chamber of Commerce, the Staten Island Economic Development Corporation, and Working Today–Freelancers Union.

1. See, for example, Giuseppe Moscarini and Fabien Postel-Vinay, "Unemployment and Small Cap Returns: The Nexus," *American Economic Review* 100, no. 2, May 2010: 333-7.

2. Recent research shows the important role of start-ups and small businesses in both gross and net job creation in the United States. See John C. Haltiwanger, Ron S. Jarmin, and Javier Miranda, "Who Creates Jobs? Small vs. Large vs. Young," NBER Working Paper no. 16300, August 2010.

3. Small businesses are defined as domestic businesses that are privately owned and operated, with a small number of employees (500 or fewer) and a relatively low volume of sales (less than $25 million annually).

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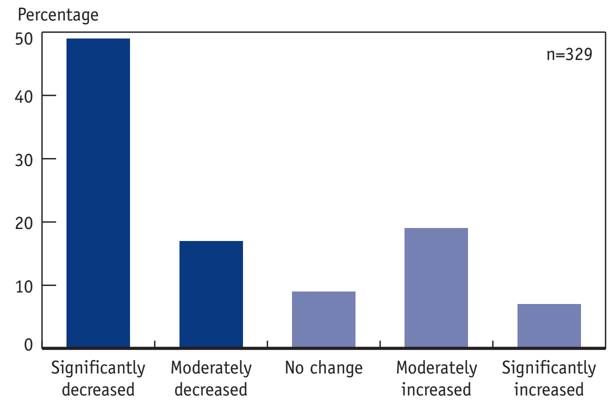
About the Numbers

In June-July 2010, the Federal Reserve Bank of New York's Office of Community Affairs polled 426 small-business owners on their recent business performance, financing choices, and borrowing experiences. The Small-Business Finances Poll was conducted online and distributed through a network of local government and nonprofit partners.

The charts present a breakdown of the poll results according to five important firm characteristics. To view the poll questions, visit http://www.newyorkfed.org/regional/2010_Facts_Trends_Vol_3_2_survey_questions.pdf.

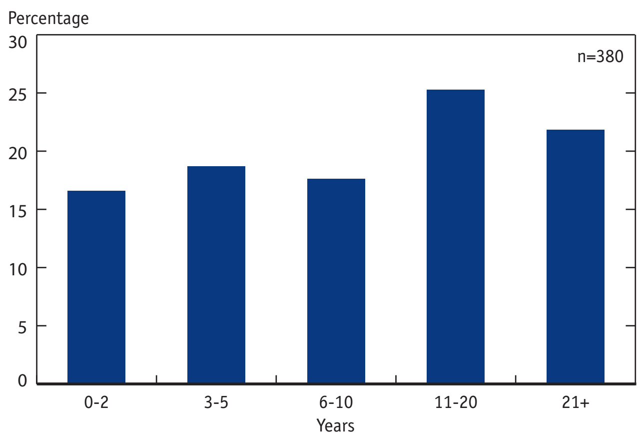
SALES GROWTH: More than 60 percent have seen their sales/revenues decline during and immediately after the recession.

Respondents, by change in sales/revenues (spring 2008-spring 2010)



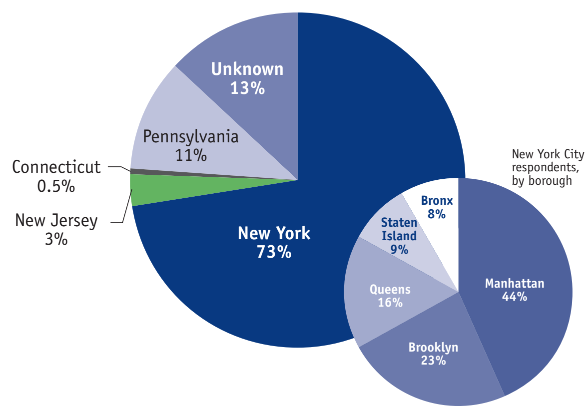
AGE: About half of the sample firms are ten years or younger, while half are older.

Respondents, by firm age



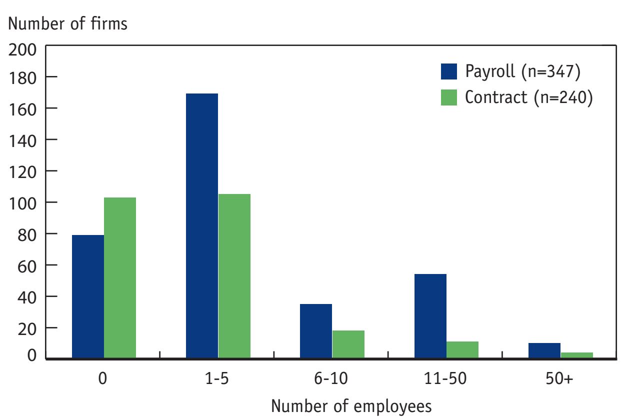
GEOGRAPHY: The New York City sample mirrors small-business density by borough.

Small-business respondents, by state n=426



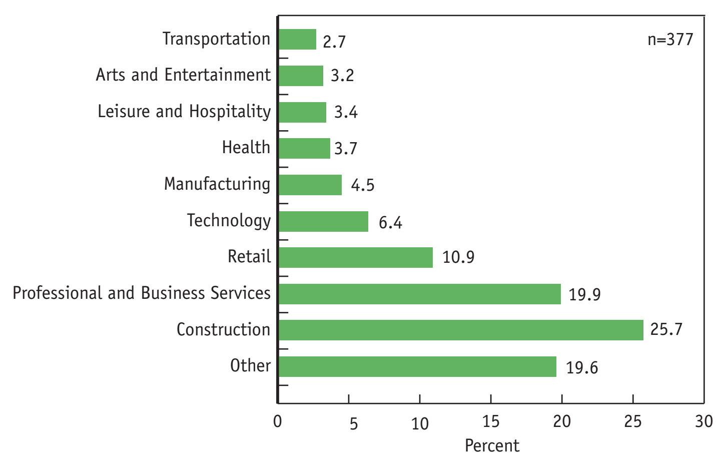
SIZE: Seventy percent employ fewer than five payroll workers, similar to the U.S. small-business population.

Respondents, by employment



INDUSTRY: Construction and retail are a larger share of the sample than their composition of local industry.

Respondents, by industry



Note: "Other" includes industries representing less than 3 percent of the sample, including education, finance, personal services, information, and wholesale.

We find:

- *Evidence of unabated demand for credit by small-business owners and widespread reports of unmet credit needs.* Fifty-nine percent of respondents applied for credit during the first half of 2010, compared with estimates of 40 percent from pre-recession national surveys. As to unmet credit demand, more than three-quarters of applicants received only "some" or "none" of the credit they wanted.
- *Indications of weakened financial performance during the recession.* Sixty-six percent of respondents reported sales/revenue declines over the last two years. Despite this result, neither strong nor weak financial performance was significantly correlated with a firm's application for credit.
- *Continued perceptions of restricted credit availability.* Of the 59 percent of respondents that applied for credit, only half received it despite previous borrowing success. However, some applicants denied credit could become viable borrowers, especially if given access to "second-look" programs (described later) and business support services. The impact of such programs and services could be meaningful, potentially reducing the pool of applicants denied credit by half.

The caveats associated with the poll's results are: potential selection bias, nonrepresentativeness of respondents, and difficulty benchmarking results because few comparable efforts exist.

Strength of Credit Demand: Credit Applications and Unmet Needs

One factor that could explain the decline in small-business borrowing is lack of demand for new or additional credit. In this section, we present evidence on the strength of small-business credit demand.

Credit Applications

We asked business owners about the number and types of credit applications they submitted, and if they obtained the credit they wanted or if unmet needs remained. Admittedly, these questions can provide evidence only on active credit seekers; they do not capture potential demand by discouraged borrowers that may have failed to apply because they anticipated denial of credit.

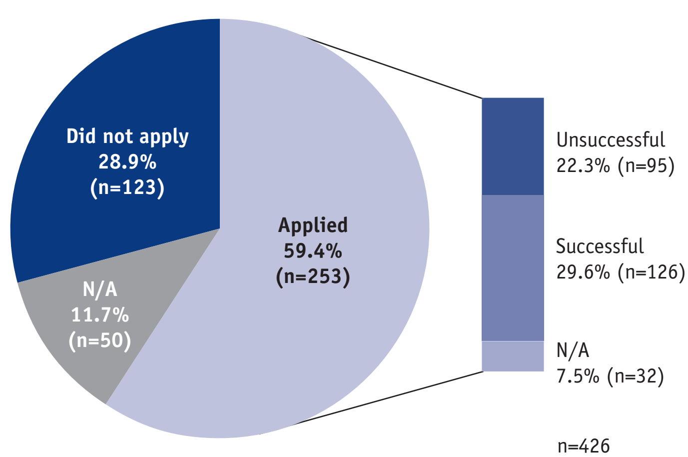
A direct measure of demand strength is the number of firms that applied for credit. Poll evidence suggests relatively strong demand: of the 426 respondents, 59 percent tried to borrow in the first half of 2010. To put this result into context, we note that the National Federation of Independent Business (NFIB), a small-business association that tracks business trends through regular surveys of its members, found that 55 percent of small firms had applied for credit in 2009.[4] Similarly, the 2003 Survey of Small Business Finances found that 40 percent of firms had applied for credit.[5]

Unmet Credit Demand

An indirect measure of demand strength is the number of applicants seeking credit but not receiving it (Chart 1). As noted above, of the 59 percent of respondents that applied for credit, about half were successful obtaining at least one credit product and thereby met at least some of their credit needs. However, more than a third of applicants failed to obtain even one credit product, and three out of four applicants received "none" or only "some" of the credit they sought.

To contextualize our result, we again turn to evidence from other surveys. The National Small Business Association's July 2010 survey also found evidence of

Chart 1
Credit Application and Success Rates



Note: Success is defined as being approved for at least one credit product.

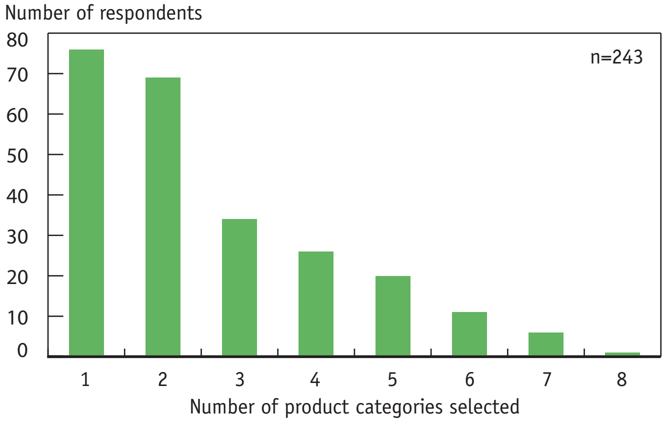
4. See William J. Dennis, Jr., "Small Business Credit in a Deep Recession," National Federation of Independent Business Research Foundation, February 2010.

5. The survey is conducted by the Board of Governors of the Federal Reserve System, with the help of the University of Chicago's National Opinion Research Center. See Rebel A. Cole, "Who Needs Credit and Who Gets Credit? Evidence from the Surveys of Small Business Finances." In *Small Business in Focus: Finance. A Compendium of Research by the Small Business Administration Office of Advocacy,* July 2009: 95-133 (available at http://www.sba.gov/ADVO/research/09finfocus.pdf).

Chart 2

Number of Products Sought per Applicant

Question: During the last six months, did you apply for one or more types of credit?



Note: Ten applicants did not specify the number of products they requested.

unmet demand. The survey reported that 41 percent of its sample was unable to access adequate financing, up from 22 percent two years ago.[6] Likewise, the NFIB's February 2010 survey found that 29 percent of respondents had unmet credit needs, compared with 10 percent in the early 2000s.[7]

To delve further into the nature of unmet demand, we asked respondents to identify the number and types of credit products they had applied for during the last six months (Chart 2).

While some respondents applied for up to eight types of credit, most applied for only one or two. Despite concerns that applicants were being denied because they might be applying somewhat indiscriminately for credit products, our poll results suggest that targeted applications were more common.

Another aspect of unmet credit needs is whether applicants, even successful ones, are receiving the type of credit product they seek. Poll evidence suggests the contrary: the most frequently requested credit product was a business line of credit, yet it had a denial rate of 63 percent. This result is similar to the NFIB's July 2010 finding of a 62 percent denial rate for a business line of credit. With the exception of vehicle or equipment financing, products that require collateral pledges seem harder for applicants to obtain in an environment of depressed asset and real estate values.

Chart 3 shows the self-reported approval rates for a range of credit products.

Applicant Quality

Having found evidence for both relative strength of credit demand and unmet credit needs among poll respondents, we now look for what the poll can tell us about whether weakened applicant quality may be contributing to a decline in bank lending. We follow a two-step approach. First, we examine self-reported firm characteristics to identify which traits best describe firms that applied for credit. Second, we determine which firm characteristics were associated with successful applications. By comparing unsuccessful credit applicants with successful ones, we infer firm characteristics that might reflect lender criteria for creditworthiness in the current economic climate.

Applicant Firm Characteristics

Poll respondents were characterized by their firm's size, age, and industry. Respondents also rated their firm's economic health, types of credit products sought, and prior financing sources, including bank loans and retained earnings.

Based on statistical correlations, the firm characteristics associated with a small business having applied for credit are:

- *Firm borrowing history*. Seven of ten firms that applied for credit in the first half of 2010 had also borrowed from financial institutions in 2008.
- *Industry sector*. The construction and retail sectors—industries that were particularly hard-hit during the recession—made up one-third of total applicants.[8]
- *Firm use of retained earnings as a funding source in 2008*. Firms with earnings on hand were less likely to seek credit.

6. See National Small Business Association, "2010 Mid-Year Economic Report."

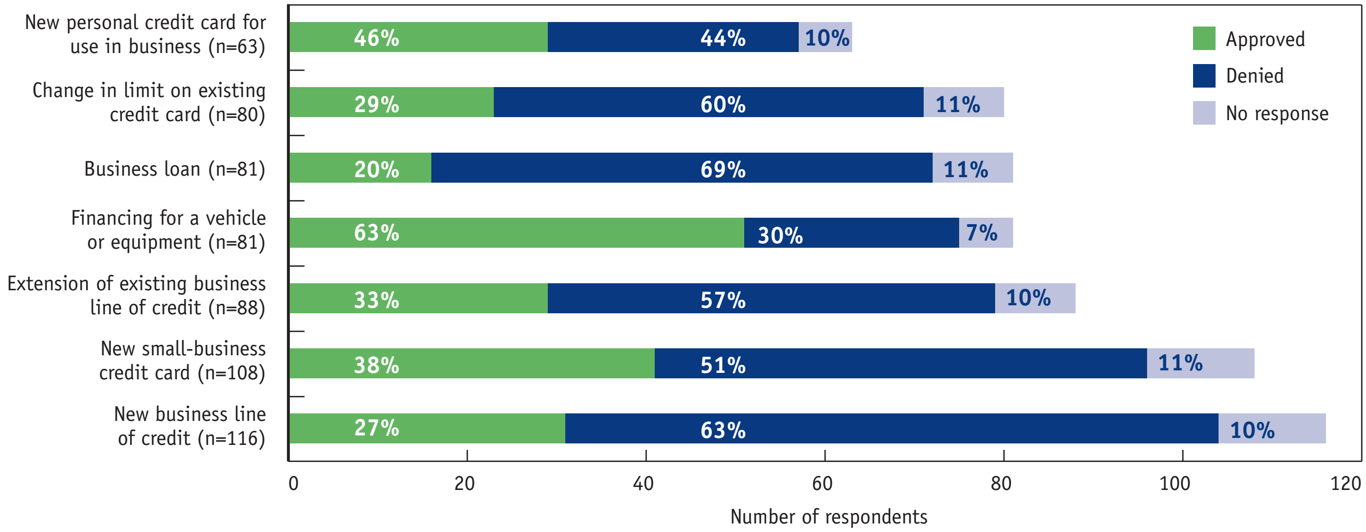
7. The NFIB and the Federal Reserve cite collateral depreciations and losses as major impediments to credit access. See "Small Business in a Deep Recession," National Federation of Independent Business, 2010, and Federal Reserve Chairman Ben S. Bernanke's testimony before the U.S. Senate's Committee on Banking, Housing, and Urban Affairs, Washington, D.C., July 21, 2010 (available at http://www.federalreserve.gov/newsevents/testimony/bernanke20100721a.htm).

8. Firms in these industries also represented one-third of the total sample. Although 59 percent of the total sample applied for credit, 68 percent of construction firms and 68.3 percent of retail firms submitted credit applications.

Chart 3

Credit Applications and Outcomes

Question: During the last six months, did you apply for the following types of credit and were you approved?



In contrast, other characteristics that we analyzed were not associated with applications. Neither the firm's age as measured by the date the firm was established, nor its size as measured by full-time employees, nor its reported performance as measured by sales/revenue and employment growth were significantly correlated with the firm's application for a credit product. This result casts doubt on suggestions that smaller, younger, financially weakened, or underperforming firms are drivers of credit demand in the current environment.

"Keys to Credit Success"—Implicit Creditworthiness Characteristics

We again used statistical correlations to identify which firm characteristics were associated with credit approval in today's market. We call these traits the "keys to credit success," but they may also be viewed as implicit creditworthiness standards.

Specifically, the three keys to credit success are:

- firm age, or years since establishment;
- positive financial performance (sales/revenue growth); and
- use of retained earnings as a financing source in 2008.

In other words, successful applicants were firms that had stood the test of time to demonstrate longevity of at least five years. Or, firms that had demonstrated the capacity to generate positive sales/revenue growth even during recessionary times. Or, firms that were sufficiently successful two years ago to be able to self-fund their needs through retained earnings and may even have brought forward a cushion from that period.

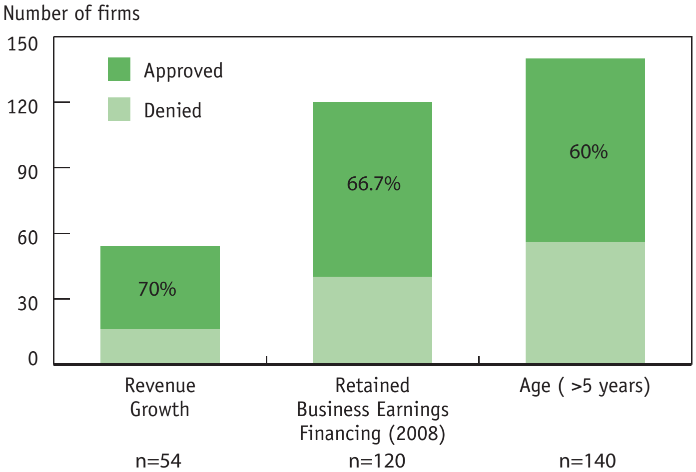
- Somewhat surprisingly, previous borrowing relationships did not appear to help applicants. Firms that used credit financing in 2008 were more likely to apply for credit in 2010; however, the existence of this prior banking relationship did not seem to help them obtain credit in 2010. While seven out of ten applicants for credit in the first half of 2010 had also borrowed from financial institutions in 2008, only half were approved—the same percentage as in the overall sample.[9]
- Although construction and retail firms applied for credit at a higher rate, they were neither more nor less likely to obtain credit than firms in other sectors. This result does not support perceptions of undue restrictions on certain sectors, particularly economically hard-hit ones such as construction and retail.

Chart 4 plots the population of firms with each creditworthiness factor and their success obtaining at least one credit product.

9. This calculation is based on the number of applicants who reported financing sources in 2008 (n=223).

Chart 4

"Keys to Credit Success" and Credit Approval



Note: Success is defined as obtaining at least one credit product.

Access to Credit

A third factor potentially contributing to the decline in borrowing is unduly restricted availability of credit. Reports from small-business owners of a credit gap have been both vocal and frequent. By defining the credit gap as small businesses that are potentially viable but currently not receiving credit, the poll results may help stakeholder efforts to ensure access to credit for viable firms.

Small-business owners were asked about their current borrowing outcomes as well as their ability to obtain credit in 2008. As reported earlier, while previous borrowers applied for credit more often in 2010, their prior borrowing relationship did not help them actually obtain credit. This group—nearly 70 percent of all applicants—is likely to be a source for those who feel that "credit was unfairly denied," despite their previous relationship with a banking institution.

Another source of potentially viable firms is the nearly seven of ten unsuccessful applicants that reported "declining" or "stagnant" sales/revenue growth. Many small businesses and their advocates argue that lender emphasis on twelve or more consecutive months of positive sales/revenue growth, while an indicator of a firm's immediate capacity to repay its debts, is too narrowly focused. They assert that by undervaluing prior banking relationships, strong repayment histories, and future profitability, lenders are likely overlooking credit applicants that are viable, or near-viable.

Bridging the Credit Gap: Unsuccessful Applicants

To make credit more available, some lenders have instituted a second-look program, whereby applicants denied credit are reevaluated, sometimes after receiving technical assistance with the credit application process and paperwork. Assuming that second-look programs may uncover potentially good customers, how large of an effect might they have, based on the poll data?

To assess this potential impact, we undertook a simple thought experiment using as filters the creditworthiness factors identified earlier. We asked how much might the 22 percent sample denial rate be reduced if credit were awarded to applicants that possessed one of the success criteria but had been denied credit.

For example, what if a second look were given to all applicants denied credit that reported sales/revenue growth to be nondeclining (either neutral or positive) in the recent period? This change would affect one out of five such applicants and, if they were accepted for credit, would lower the denial rate from 22 percent to 19 percent (see table).

Of the three keys to credit success we describe, providing a second look to firms established for more than five years would have the largest effect on easing credit availability. It would reach more than half of all applicants denied credit and reduce the overall denial rate by nearly 13 percentage points, to around 9 percent, approximately the value reported by the NFIB for the early 2000s.

Some caveats associated with this thought experiment are small sample sizes—there were often fewer than 100 respondents—and calculations that are suggestive of potential effects.

Bridging the Credit Gap: Nonapplicants for Credit

So far, our study has focused solely on applicants. However, small businesses that did *not* apply for credit are another potential source of credit demand. This group is sizable, representing 41 percent of all respondents.

The group may have several reasons for not applying for credit. Frequently heard explanations from small-business owners are that they already have financing, either from friends and family or retained business earnings, or that financing was obtained before the recession, when the credit climate was more expansive. Another explanation is that borrowers became

"Keys to Credit Success" and Candidates for Second-Look Programs
Percent

Keys to credit success	Share of unsuccessful applicants that would qualify for a second-look program	If eventually granted credit, the overall denial rate would decline from 22 percent to
Established firm (more than five years)	59	9
Retained earnings financing in 2008	42	13
Steady sales/ income growth	17	19

discouraged—that is, they did not apply because they thought they would not qualify or the application process and paperwork would be too daunting. Regardless of their reasons, with time, this group may also need and seek credit. What understanding can the poll evidence provide about nonapplicants?

In the poll, about 7 percent of all respondents (and nearly 20 percent of all nonapplicants) are small businesses with zero employees that relied solely on business earnings for financing in 2008. This group is unlikely to need credit unless and until the firms decide to expand. At that time, as new borrowers they would be strong candidates for "beginner loan" programs and would benefit from various forms of technical assistance and business support services.

Another untapped market segment is small businesses that may be characterized as start-ups, that is, firms with five or fewer employees that have been established for five years or less. These firms make up 8 percent of the respondent pool (and 20 percent of all nonapplicants), and they too rely mostly on retained business earnings as a source of financing. Yet many demonstrate the keys to credit success: about a quarter reported positive sales/revenue growth, and another quarter reported an expanded full-time-employee headcount during the last two years. If these firms did not seek bank credit because they were discouraged, then they too would make strong candidates for beginner loan programs and technical assistance services.

Conclusion

Recent contractions in small-business lending have sparked debate about the extent to which weak business demand, declining creditworthiness, and restricted credit availability are at play. Our study of small-business owners finds evidence of comparatively strong demand but weakened applicant quality and continued perceptions of restricted credit availability.

Poll evidence suggests that although experienced borrowers sought credit more often than borrowers without recent credit financing, experienced firms were no more likely to win credit approval. Rather, cash flows and cash reserves, as evidenced by strong sales and retained business earnings, were the keys to obtaining credit. Using these credit characteristics as proxies for creditworthiness, the poll further suggests that segments of applicants denied credit and nonapplicants could become viable borrowers if given access to second-look programs and business support services.

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Facts & Trends is published by the Community Affairs Office of the Federal Reserve Bank of New York.

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