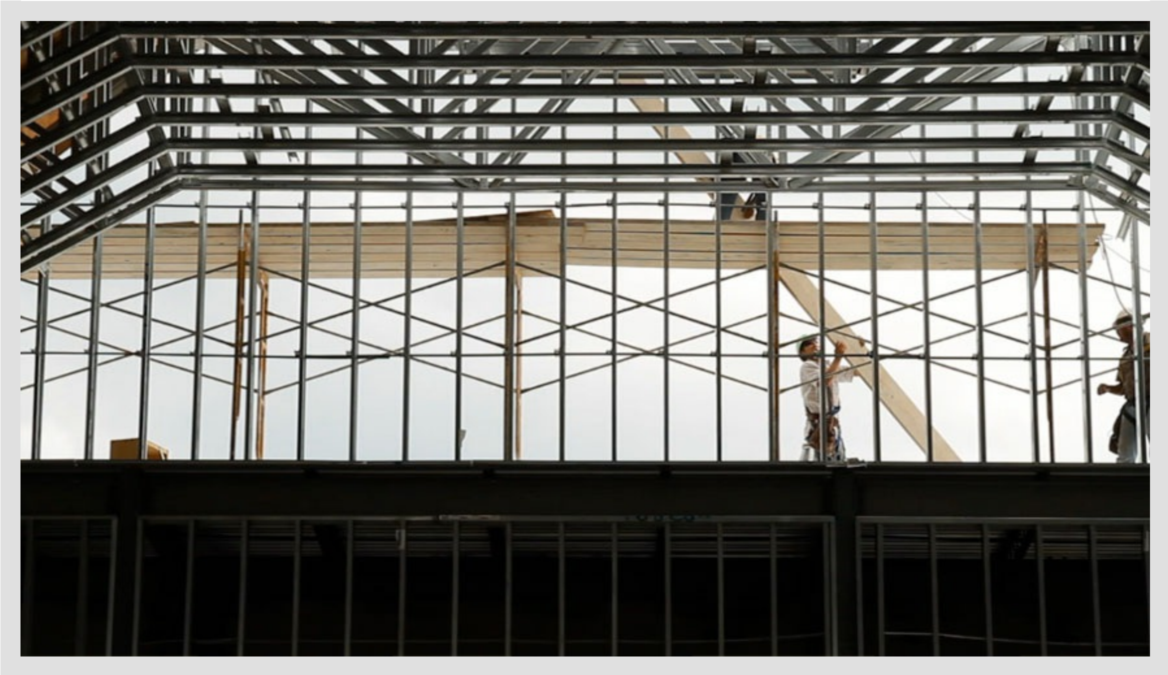


Commercial Building Contractors

NAICS: 2362
SIC: 1541, 1542

prepared September 12th, 2018

Table of Contents

Industry Forecast and Structure

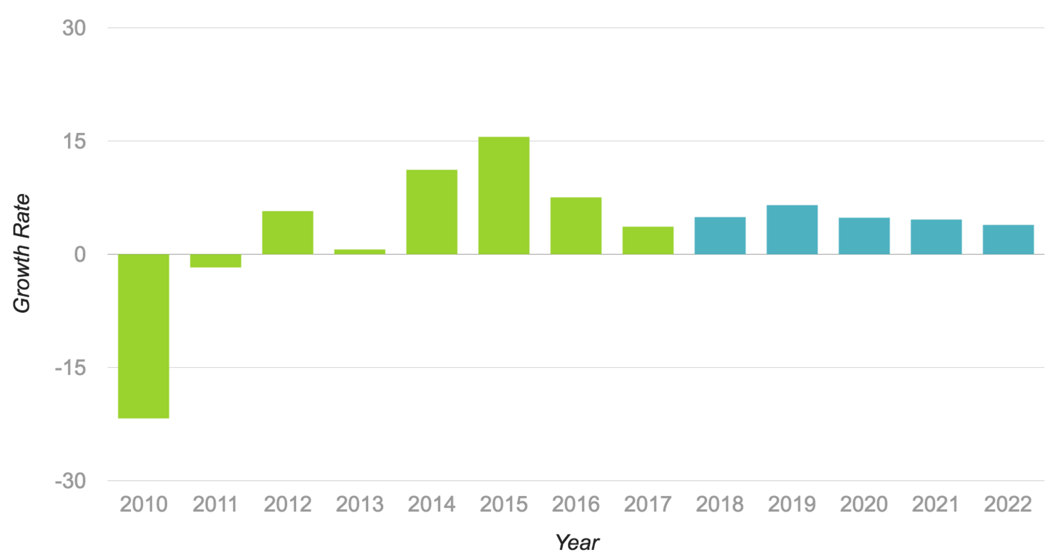
Industry Forecast

Sales for the US commercial building contractors industry are forecast to grow at a 4.74% compounded annual rate from 2016 to 2022, faster than the growth of the overall economy.

Vertical IQ forecasts are based on the Inforum inter-industry economic model of the US economy. Inforum forecasts were prepared by the Interindustry Economic Research Fund, Inc.

Last Update: August 2018

Commercial Building Contractors Industry Growth



Industry Size and Structure

A typical commercial building contractor employs about 18 workers and generates $5-6 million annually.

- The commercial building contracting industry consists of almost 130,000 companies that employ over 764,000 workers and generate $712 billion annually.
- About 60% of contractors are sole proprietors or entities without workers on payroll. Most commercial building contractors rely heavily on subcontractors.
- Large companies include Turner Corporation, Tutor Perini, Jacobs Engineering, and Gilbane Building Company.
- The business structure of commercial building contractor firms is 21% corporations, 60% S-corporations, 9% individual proprietorships, and 10% partnerships.
- 9% of commercial building contractor firms are female-owned and 24% are minority-owned.


NEW ENTRANTS
Low Barriers to Entry
Must Pass Licensing Exam
SUPPLIERS
Building Supply Distributors
Subcontractors
Equipment Suppliers
Architectural Services
Information Technology
Commercial Building Contractors
130,000 companies
BUYERS
Real Estate Developers
Manufacturers
Commercial Businesses
State Governments
Local Governments
SUBSTITUTES
Development Companies Own Staff

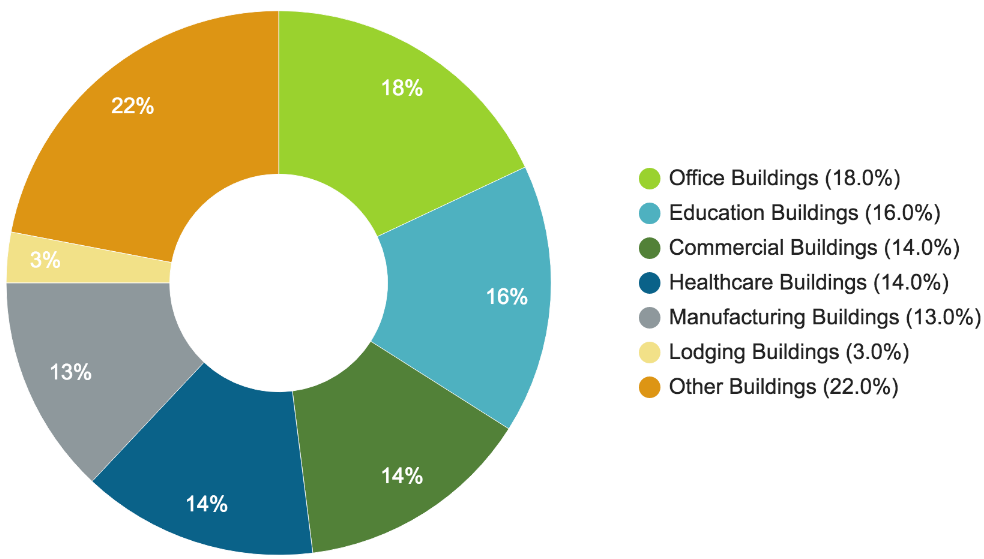
How Firms Operate

Products and Operations

Commercial building contractors coordinate resources and manage the building process for industrial, commercial, and institutional projects. Clients include organizations in the public and private sector.

- Major categories for which contractors provide services include power providers (electricity, gas, oil), manufacturing (computers/electronics, transportation equipment, food/beverage/tobacco, chemical, fabricated metal), commercial (automotive, restaurants, retail, warehouses), office, health care (hospitals, medical buildings), lodging, communication, and education.
- Other categories include transportation (passenger terminals, docks, marinas), amusement/recreational, religious, sewage and waste disposal, water supply, and public safety.

Commercial Building Contractors Revenue

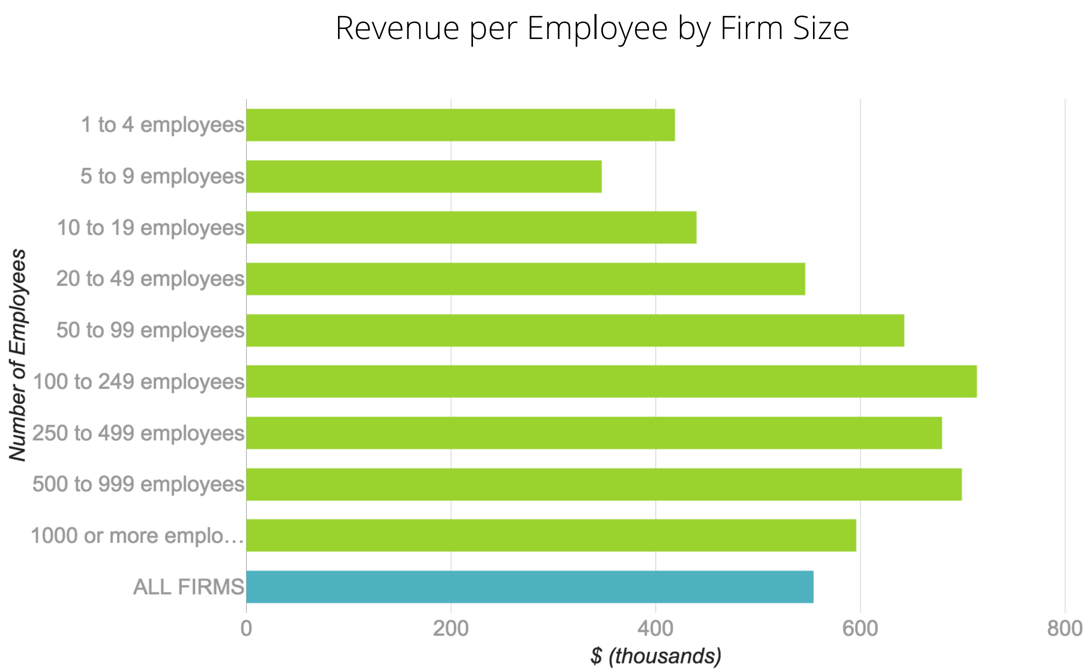


Most contractors submit bids for jobs based on a client's request for proposal (RFP). A potential client may require pre-qualification to limit bidders to those who have the financial and operational characteristics necessary to complete a job. Contractors may work off "final" design documents or partially completed designs to create bids and set prices accordingly.

Creating bids involves scheduling and estimating the cost and availability of materials, equipment, labor, and subcontractors. Estimating costs and timing is a critical process and must be closely managed – errors can cause a project to miss deadlines or incur extra expenses. Bids for government organizations are often awarded to the lowest bidder. Contractors try to maintain a healthy backlog of contracts.

Most projects, particularly large ones, are completed in phases. Commercial construction contractors manage the building process by obtaining necessary permits, procuring and coordinating the delivery of materials, scheduling and overseeing labor and equipment, and ensuring work adheres to codes and regulations. If a client requests additional work, contractors typically implement a change order, which outlines costs and timing. Whether extra work is included in the scope of a project can be controversial.

Key staff include estimators (who create bids) and project managers (who oversee the construction process). Commercial contractors may employ construction workers or outsource labor through subcontractors. Contractors that provide design services employ architects and engineers.



Profit Drivers

Winning Project Bids

Commercial contractors compete for new business by submitting bids for construction projects. They spend resources and money preparing bids and need a high enough win rate to operate at capacity and maintain a project backlog. When commercial construction activity falls due to economic conditions, competition for new projects intensifies and contractors often cut prices to win the business. Projects may become marginally profitable or even unprofitable, but firms want to keep staff and subcontractors busy and cover at least some of their overhead. Successful firms focus on specific types of projects and develop expertise and a strong reputation for results to avoid competing strictly on price.

Accurate Cost Estimation

Profitable projects begin by accurately estimating the time and cost to complete the work and adding in sufficient markup to meet profit goals. Contractors typically employ cost estimators and use cost estimating software to prepare detailed bids. They often build in extra margin to cover unexpected costs or uncertainties in project scope. Successful firms use project-based accounting systems to analyze the costs for completed projects and refine their cost estimating assumptions based on the actual results.

Effective Project Management

Commercial construction projects can be complex and require strong project management skills to keep them on time and on budget. Firms employ experienced project managers and typically invest in project management software to develop the project schedule and monitor progress. Coordinating the work of numerous contractors and dealing with weather delays and changes in specifications can make it difficult to stay on schedule and projects may have penalties for missing deadlines. Firms need clearly defined specifications and a formal change management process to deal with expansion of the project scope by the client.

Managing Material Costs

Prices for construction materials, such as lumber, concrete and steel, vary with market conditions. Since materials make up a large portion of the cost of a typical project, contractors need to time their purchases of materials to avoid cost overruns and maintain project margins. At the same time, they need to order materials far enough in advance and maintain sufficient inventories to avoid project delays.

Working Capital

Sell and invoice

Commercial (or non-residential) building contractors generate revenue by providing services to a variety of clients, including developers or owners of commercial, institutional, or industrial properties; federal, state, and local governments; manufacturers; and hotel operators.

Fees for commercial building contractors depend on the type of contract the contractor and client use. The first type, Cost Plus Contracts, reimburses contractors for costs and includes an added fee. Guaranteed Maximum Price (GMP) contracts are cost plus fee arrangements up to a maximum price. Fixed Price Contracts commit a contractor to a set amount and are generally used for government projects. Contractors may also enter agreements where they provide design and construction services (design-build) or management services only. Each type of contract has inherent risk/reward potential. Contracts may include penalties for late completion or incentives for achieving specific performance goals. GMP contracts or Fixed Price Contracts are used for the majority of construction contracts.

Collect

Collection periods range from 37 to 38 days and receivables account for about 26-27% of total assets. Timely collection requires general contractors and project managers to initiate billing when milestones are achieved, but time pressures may result in delays in submitting required paperwork.

Manage Cash

Cash flow is irregular because contracts often specify a scheduled payment plan based on the completion of different phases of construction. Scheduling issues, supply problems, or bad weather can affect timelines and result in completion and payment delays. A contract may require retainage, which is a percentage of the total cost of the job that the client withholds from the contractor until the job is complete.

Pay

Margins are thin and the cost of sales accounts for about 82-83% of total sales. Expenses include construction materials, labor, subcontractor fees, and equipment rental. Because of the risky nature of construction jobs, commercial building contractors carry liability and worker's compensation insurance. Contractors may also need to provide surety bonds, which secure performance, for certain jobs.

Report

Operating margins average 4-5% of sales. Estimation errors can result in financial losses. As a result of narrow margins and inherent logistical challenges, commercial building contractors have a higher failure rate than most businesses. Besides monitoring project milestones and costs versus plan, contractors track their project backlog as a predictor of future cash flow.

Cash Management Challenges

Cash Shortfalls Due To Project Delays

Commercial building projects are subject to delays due to bad weather, unexpected site problems, changes to specs, and building materials availability. The complexity of scheduling and coordinating work by multiple subcontractors can also lead to project delays. Delays in completing projects or achieving milestones can create cash flow issues, since expenses are often incurred prior to receiving payment from customers.

Timely Collections

Commercial builders often face challenges in collecting payment from developers and building owners and collection periods average 37 to 38 days. Tight credit markets can create financial problems for developers and cause delays in paying contractors. Project managers are often busy dealing with issues during the construction process and fail to submit paperwork on-time to initiate billing when milestones are achieved. Contracts may allow clients to withhold a percentage of the job cost until the project is complete.

Variability In Materials Cost

The cost and availability of building materials, such as lumber, steel, and concrete, can vary with market conditions. Sudden increases create unexpected expenses for builders, which can lead to short-term cash shortfalls. Given the terms of their sales contract, builders may not be able to pass on higher materials costs to clients and will suffer from lower profit margins.

Capital Financing

Commercial building contractors typically have minimal capital needs. While construction projects require heavy equipment, contractors may lease machines or vehicles to minimize capital investment. Typical equipment includes backhoes, bulldozers, cranes, excavators, loaders, and trucks.

Other major capital assets may include buildings, property, and information systems. Contractors may rely on commercial lines of credit to help bridge cash flow gaps during the first phase of construction – typically the first 60 to 90 days. Contractors may also "bill in excess of costs" or ahead of work done in order to finance their business. To evaluate credit-worthiness, lenders consider contract backlog, cash, profitability, and track record. Lenders may also examine the financial health of the contractor’s client(s) to assess project viability.

Examples of Equipment Purchases

Pickup Truck

$20,000 - 30,000

Truck used to carry people, tools and materials to job site.

Construction Management Software

$1,000 Set Up Fee Plus $150 â 500 per month

Web-based software that combines project scheduling, project management, customer management, document management and cost estimating capabilities. Web-based solutions allow collaboration with subcontractors and clients.

Risks to Watch Out For

Business Failure and Merger Rate

Commercial Building Contractors Fail or Merge more frequently

The business failure and merger rate for commercial building contractors from the end of 2016 to the end of 2017 was 16.51%, higher than than the average for all US businesses, according to data from Bizminer. "Business failures and mergers" include those firms that ceased operations during the time period, as well as firms that ceased being independent entities due to merger or acquisition.

Industry Risks

Dependence on the Economy

Demand for commercial building services is highly dependent on economic health. Most contractors serve a limited area and are vulnerable to downturns in local markets. The public sector typically deals with smaller budgets during difficult economic times, forcing state and local governments to reduce new building and expansion projects. Businesses cut back when the economy stagnates, resulting in decreased demand for commercial building. Low employment reduces the need for office space. Weak consumer spending affects the hospitality and retail sectors.

Reliance on Client Credit

In a tight credit market, developers struggle to secure funds for construction projects. Lack of access to capital can result in clients delaying or cancelling projects, which can affect cash flow for contractors. In addition, a client who runs into financing problems may have difficulty paying contractors on a timely basis for work in progress. Clients with credit issues may have difficulty renewing or extending credit lines. The recent mortgage crisis has led to considerably stricter lending requirements and some banks are questioning appraisals for loans made years earlier. Contractors can become unintended creditors to owners of poorly conceived or financed projects.

Volatile Materials Costs

Most commercial building contractors operate with tight margins, where the cost of sales is about 82-83% of total sales. As a result, variability in materials costs can greatly affect profitability. The cost and availability of materials can vary significantly from year to year, depending on demand, capacity, and market conditions for commodities. Typical materials include structural steel, concrete, lumber, brick, tile, drywall, asphalt, and diesel fuel.

Dependence on Subcontractors

Commercial building contractors are dependent on subcontractors for specialized activities, such as electrical, plumbing, or mechanical work. Any subcontractor's failure to perform can result in increased costs and delayed schedules. Commercial contractors are ultimately responsible for subcontractor performance and must deal with the consequences of substandard or incomplete work. Contractors need to know that subcontractors can perform the work and are sound financially. Some commercial contractors make subs provide a bond guaranteeing performance. Government agencies often require contractors to pursue subcontractors belonging to disadvantaged groups.

Competitive Pricing Environment

Most commercial construction jobs are competitive bidding situations, and price is a major deciding factor in which commercial contractor obtains the job. Contractors struggle to balance submitting a reasonable bid while maintaining an acceptable profit margin. Temptation to underbid has resulted in industry-wide problems where cost overruns have become common. When business is slow, competition for available jobs intensifies, forcing many contractors to bid lower than they would like.

Company Risks

Cost Overruns

Contractors must deal with a wide variety of factors that can create cost overruns. Errors in the original bid, scope changes, unexpected site conditions, weather delays, and subcontractor or equipment scheduling problems can all result in higher costs. Depending on the contract terms, a contractor may have to absorb the excess costs, resulting in lower profits. Cost overruns can result in client conflict and contractors may have to resort to litigation or arbitration to recover funds. Contractors use experience to develop bids and may build in a margin for error.

Problems with Subcontractors

Because work can be cyclical, most contractors rely on subcontractors to avoid overstaffing. Scheduling changes are challenging since subcontractors work multiple jobs. The best subcontractors are in high demand and charge premium prices, which affects how low a contractor can bid. Shoddy work and unreliability cause problems with quality and timing of the building project.

Industry Trends

Improved Recovery

Oversupply, weak demand, declines in commercial property values, and tight credit caused uncertainty in the commercial construction market after the recession. An unfavorable bond market is problematic for local governments looking to build new schools and hospitals. The post-stimulus trough in federal spending resulted in stabilization of institutional projects and the office building market is experiencing significant employment growth. Improving economic conditions are driving the recovery of the non-residential construction market. In 2012, the sector posted its first annual growth since 2008. Nonresidential construction spending in 2013 was comparable to 2012 levels. Spending grew by about 9% in 2014, 7% in 2015, and 4% in 2016.

Technology Improves Productivity

Narrow margins and an increasingly competitive environment have led more contractors to implement technology that improves their productivity and enables them to provide cost estimates with greater accuracy. An increasing percentage of contractors are using Building Information Modeling (BIM) software, which integrates the design process with costing. BIM systems are dynamic and allow designers, contractors, and developers to access building information, make changes, and calculate the associated costs. Some programs link to estimating systems and generate work schedules for subcontractors as well as purchase orders for materials.

Financing Available For Key Sectors

While overall construction financing is still scarce, markets with better growth prospects have improved chances of obtaining credit. Projects in the health care, public works, education, state/local government, and institutional sectors are receiving funding due to market need or higher owner equity. As a result, competition for public sector projects is increasing as more private sector contractors attempt to diversify revenue streams. Financing for speculative projects is still extremely difficult.

Green Buildings

Despite the recession, demand for environmentally-friendly buildings continues to grow at a rapid pace. Presently, about 45% of all new commercial and institutional construction is considered green, up from 2% in 2005, according to the U.S. Green Building Council. Increased government regulation, market differentiation, growing awareness for LEED standards, and attractive financials are driving developers to implement more eco-friendly features. Green buildings typically have lower operating costs, higher values, and better ROIs than traditional buildings. Contractors that specialize in green construction can realize a distinct advantage.

Office Environments Shrinking

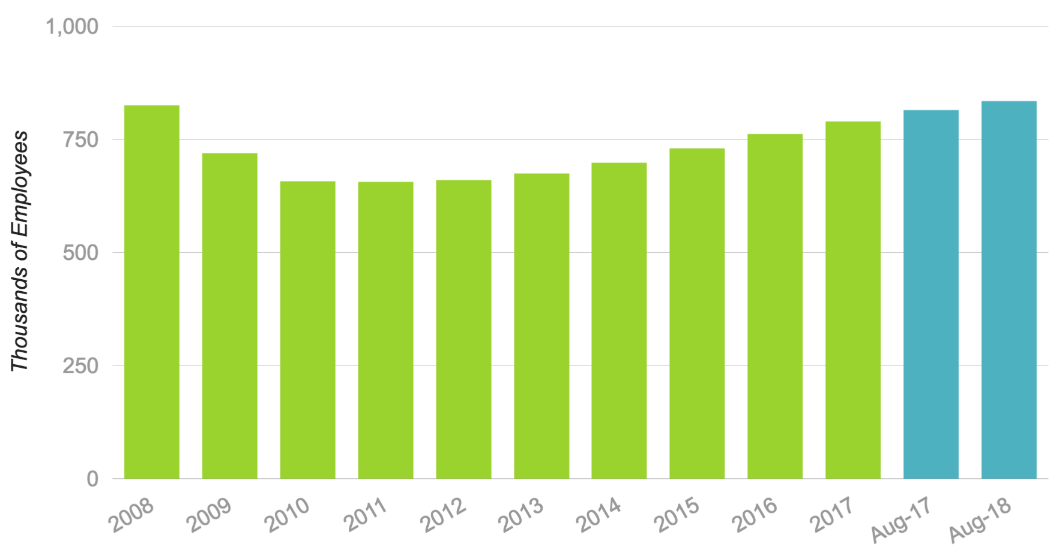
Although the recent recession resulted in reduced demand for office space, the amount of square footage per worker has been shrinking for several decades. Space allocation per worker declined from 500 square feet in 1975 to about 200 square feet in 2010, according to Jones Lang LaSalle, and is projected to decrease to 100 square feet by 2017. Younger workers are eschewing the traditional office layout in favor of communal spaces. Technology, such as laptops and cell phones, has also helped reduce space requirements. Many office tenants renewing leases are cutting space.

Employment and Wage Trends

Employment by commercial building contractors increases

Overall employment by commercial building contractors changed 2.4% in August compared to a year ago, according to the latest data from the Bureau of Labor Statistics.

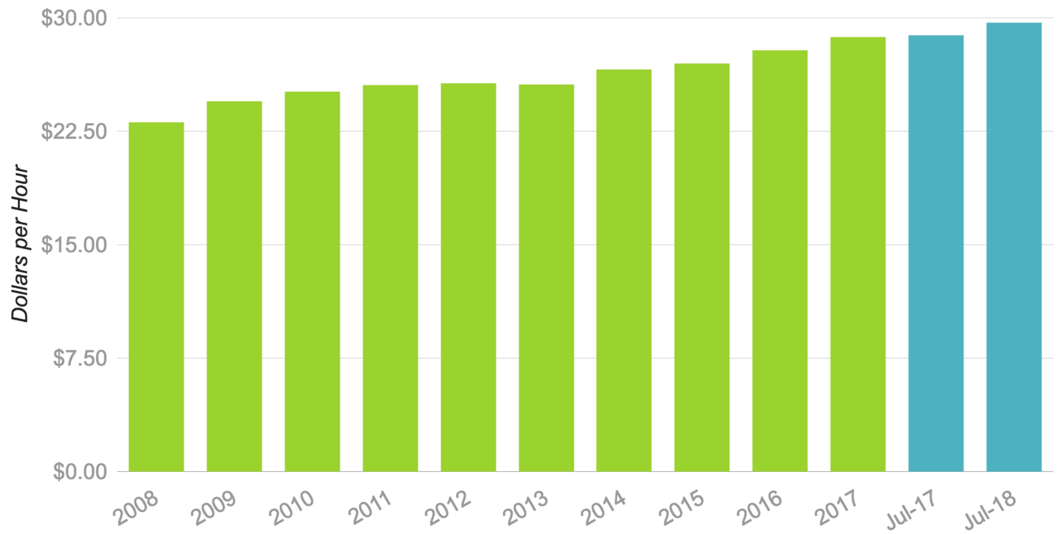
Commercial Building Contractors Employment



Wages at commercial building contractors rise

Average wages for nonsupervisory employees at commercial building contractors were $29.70 per hour in July, a 3.0% change compared to a year ago.

Average Wages for Nonsupervisory Employees


$30.00
$22.50
$15.00
$7.50
$0.00
Dollars per Hour
2008
2009
2010
2011
2012
2013
2014
2015
2016
2017
Jul-17
Jul-18

Quarterly Insight

Third Quarter 2018

Equipment Investment Factors

Commercial construction requires a variety of heavy equipment, and investing in new machinery is a major decision. Factors for investment include the equipment's construction quality, technology, performance, fuel efficiency, and cost, as well as access to a reputable dealer and servicer, and their own knowledge of how to use the equipment. Modern and well-maintained equipment can improve the image of the construction firm. Access to a range of heavy equipment also expands the firm's abilities on the jobsite and speed. Firms may also weigh the investment, maintenance and storage costs against usage to determine if renting is more practical than buying.

Second Quarter 2018

More Effectively Handling Delays and Disruptions

Public and private construction projects encounter progress delays and disruptions that raise stress levels and cost money to settle. Contractors can mitigate claims by maintaining a good working relationship with project owners to quickly and effectively resolve issues and by compiling relevant and useful cost, schedule and other project data, according to a task force formed by the Associated General Contractors of America to address the issue. Contractors can protect themselves and improve resolution by using best practices when drafting contract terms and conditions that include equitable adjustments when clients make changes to the project, providing notices when an issue arises, and tracking or estimating costs of delays.

First Quarter 2018

Owner Concerns for 2018

Interviews of industry professionals by Construction Business Owner reveal what risks are top of mind for the industry in 2018. These include labor shortages, the need to hire less skilled workers to meet demand, and the higher risk of injury and cost of rework due to lower skill; the opioid epidemic in the construction sector as workers become addicted trying to manage pain; concern that new tax policies will result in less revenue for the federal government and postponed infrastructure projects; fear of being under-insured; and incorporating technologies (jobsite analytics, BIM, drones, 3D printing, virtual design and construction - VDC) that keep the firm competitive.

Fourth Quarter 2017

LABOR REMAINS TOP CONCERN

A shortage of labor continues to plague the industry in 2017 and is getting worse. Commercial construction firms are forced to turn down building opportunities due to lack of staff. Many workers left the industry during the last recession when construction plummeted and they never returned. That trend, coupled with an aging workforce that is nearing retirement, compounds the issue. Many young people are not interested in the industry, are unskilled, or want high wages and flexible schedules that are difficult to offer. Construction firms can hire temporary workers from staffing agencies, but that option raises training and employment costs. Pressure to meet tight deadlines often pushes contractors to overwork their understaffed crews, which drives up injury risk and job burnout.

Third Quarter 2017

JOBSITE AUTOMATION

Commercial building contractors are making greater use of automation and technology on the jobsite to improve safety, reduce costs, and ease worker shortages. Technology includes drones (surveying and engineering inspection),robots (painting, bricklaying, pipe fitting, underwater welding), and 3D printing (concrete and metal). Drones allow for safe inspection of dangerous terrain and high structures. Robots work in tight spaces or difficult conditions and efficiently perform repetitive work. 3D construction printing is just emerging in the U.S. and building codes and equipment scale may be holding back greater adoption. The industry sees potential in 3D printed construction components such as concrete slabs.

Second Quarter 2017

MAJOR CHANGES IN LEED V4

Commercial building contractors that want their projects certified under the new LEED v4 standards are adapting to the significant changes from LEED v3 or experiencing challenges. Previous version updates included only minor changes but the latest version added and redefined categories, changed how credits are earned, and made some activities prerequisites to earn credits instead of earning credits themselves. Builders that collaborate with project stakeholders before the project begins and throughout the project are more likely to anticipate challenges and meet the new LEED requirements. LEED v4 took effect in late 2016.

First Quarter 2017

USING MOBILE NATURAL GAS GENERATORS

Commercial building contractors may face the challenges of powering heavy equipment and tools off the grid. This typically occurs in remote areas with no access to a power grid or in new developments that haven't been connected yet. Contractors can rent large, mobile generators that run on diesel or natural gas. With a greater focus on sustainability, contractors may choose natural gas generators that tend to be quieter, burn fuel more efficiently, and cost less to operate than diesel equipment. Projects may also have environmental emissions limitations that require natural gas generators.

Fourth Quarter 2016

SAVINGS VIA TOOL TRACKING TECHNOLOGY

Commercial building contractors supply a wide variety of tools and equipment for workers and their job sites but managing that inventory can be challenging. Contractors can improve worker productivity and reduce losses by using an automated tool and equipment management and tracking system. Tools and equipment are checked in an out, so workers and managers know where on the jobsite(s) tools are being used and by whom. Time is saved by not searching for misplaced or lost tools and inventory can be reconciled daily.

Third Quarter 2016

NEED FOR PROFESSIONAL LIABILITY INSURANCE

Commercial contractors are beginning to require subcontractors to carry professional liability insurance (PLI) as a supplement to a commercial general liability (CGL) policy. Aspects of construction are falling into grey areas between contracting work and professional services and courts are interpreting liability differently from jurisdiction to jurisdiction. Grey areas include construction management services, bid preparation, and safety recommendations. Digital modeling such as BIM can require inputs from a broad range of participants including architects, engineers, general contractors, and subcontractors. This collaboration blurs the lines of responsibility. CGL typically requires injury or property damage to trigger coverage. PLI policies are broader and often triggered by a breach of service.

Second Quarter 2016

Construction Levels Drop in First Quarter

The industry experienced a slow start in 2016, but construction levels rose significantly in March. The value of nonresidential starts jumped 23% in March compared to one month earlier. Growth was strongest in the following segments: transportation terminals (up 339%), public construction (55%), healthcare facilities (53%), hotels (47%), institutional construction (44%), and amusement and recreation (38%). Segments posting the largest declines in construction value in March included churches (down 54%) and offices (-27%). The strong showing in March was not enough to pull the nonresidential construction segment out of negative territory in the first quarter, which was down 9% compared to a year ago.

First Quarter 2016

2016 Construction Outlook

Nonresidential construction spending is forecast to grow 5% in 2016, slower than the 9% posted in 2015. The industry is expected to see declines in power, water and public safety projects. Labor shortages are preventing contractors from expanding their workforces and lining up a backlog of projects. Low oil prices and tougher coal regulations are slashing investment by the energy sector in new construction and infrastructure. Growth in mixed use construction projects is a bright spot for the industry. In 2015, construction spending was up 44% in manufacturing, 31% in lodging, 24% in amusement and recreation, and 22% in office buildings.

Fourth Quarter 2015

Panama Canal and Port Expansion

As completion of the expanded Panama Canal nears, ports across the nation are undergoing massive renovation and construction projects to handle the influx of cargo from larger ships. Commercial building contractors are seeing huge opportunities to construct more and larger warehouses and terminal facilities to house larger shipments at ports. Some of the new mega ships crossing the Pacific Ocean are even too large for the expanded Panama Canal, so West Coast ports will have to build larger facilities to handle the loads.

Third Quarter 2015

Work-In-Progress Reports Support Profitability

Keeping track of expenses and maintaining progress toward a deadline can protect profits and cash flow for commercial building contractors. Cost overruns often occur when field progress is not accurately monitored, up-front billing by subcontractors is aggressive, or the company fails to maintain an accurate work-in-progress (WIP) report. Tracking spending along the way allows contractors to catch cost overruns early and manage billing to stave off negative cash situations. WIP report data is also important because it's used for line items in construction tax accounting on the balance sheet and income statements.

Second Quarter 2015

Managing Worker Shortages

The industry is suffering from a shortage of workers as construction levels rise. A recent survey by the Associated General Contractors of America found that over 80% of construction firms struggle to find enough workers and 60% have difficulty finding qualified construction professionals. To deal with the shortage, almost half of construction firms are using more subcontractors, nearly 40% are working more closely with staffing firms, and about 19% have invested in labor-saving equipment, tools, and machinery. Firms are also raising salaries, benefits and overtime to keep and attract new workers. A vast majority of firms don't see the situation improving in 2015.

First Quarter 2015

2015 Construction Forecast

Improved availability of credit is expected to support investor interest in commercial real estate in

2015, according to Deloitte. As property values increase, owners are also expected to invest in renovations to better compete with new construction. Smart building technology will be incorporated into more new construction and renovations to make buildings operate more efficiently by reducing energy and maintenance costs. Spending on automated building systems is forecast to grow about 8% annually through 2017.

Fourth Quarter 2014

Environmental Construction Risk

Commercial building contractors, as well as architects and engineers, are at increased liability risk if projects billed with a particular environmental standard don't reach that level of sustainability. The industry is in a grey area when it comes to green construction and liability. Typically, professional liability insurance covers contractors from negligent wrongful acts, errors, and omissions if a contractor is found guilty in a court of law. The issue lies in a project owner billing a property at a particular LEED certification, for example Platinum level, and then the building only achieving a Gold level after construction. The project owner or contracted tenants could sue the project owner, contractors, architects, engineers and others involved. Also, many green products are brought to market quickly with varying degrees of testing. This leaves contractors vulnerable if they use a product that claims to meet standards, but fails. Some insurers are extending their policies to include protection for contractors against product or material failure.

Third Quarter 2014

Student Housing Boom

Commercial building contractors are seeing more interest from real estate developers in upscale campus housing. Universities with constrained budgets are now allowing private investors to build student housing on campus. Many universities feature dorms that were built when Baby Boomers were attending college 40 years ago and are in need of replacement to better meet the requirements of current and future students. Growth in the number of foreign students is also driving demand for on-campus housing as well as more Baby Boomers retiring in college towns and moving into off-campus apartments originally intended for students. New student housing developments often include private suites with full kitchens and bathrooms, as opposed to double occupancy dorm rooms with communal baths, kitchens, and living spaces.

Second Quarter 2014

Return to Contractor-Controlled Insurance

As the commercial construction market improves, general contractors are again considering Contractor Controlled Insurance Programs (CCIP) to manage risk. The primary benefit of CCIP is greater control over the cost of projects, since employees and subcontractors across all projects can be covered under one plan. Under the individual plan approach, subcontractors carry their own coverage and add the cost to their bids, which raises the project cost for general contractors and can lead to issues about whose insurance to bill if an accident occurs, as well as delays in claims payouts. Use of CCIP often leads to a centralized safety plan that requires all employees and subcontractors to adhere to and gives general contractors control over that plan. General contractors are also seeing greater pressure from regulators to improve safety on the jobsite and from project owners to protect their letters of credit via better insurance coverage.

First Quarter 2014

2014 Commercial Construction Outlook

Commercial contractors are expected to see growth in 2014, although improvement may not be dispersed evenly among all segments. Construction in the power, lodging, warehouse, and manufacturing segments are each forecast to grow by double-digits this year. Growth in office and retail construction is expected to grow by single-digits and remain well below pre-recession levels. Construction will continue to be weakest in the private hospital and education segments. In the first 11 months of 2013, nonresidential construction spending was down 1.1% from a year earlier, despite 23.5% growth in lodging, 7.2% in manufacturing, and 5.3% in commercial, according to the Census Bureau.

Fourth Quarter 2013

Industry Boasts Strong Optimism

American construction contractors are the most confident in the world about growth in their industry. About 90% of American construction contractors expect margins to increase in 2013. Successful efforts to improve efficiency and cost management are behind the confidence in the U.S. Primary drivers of optimism are growth in public-private partnerships, access to new energy sources, such as natural gas and renewables, and government infrastructure plans, according to a recent KPMG International survey. About 28% of U.S. and Canadian construction companies are also looking to expand their operations into foreign countries.

Third Quarter 2013

Push for Alternative Financing

Commercial construction firms are joining forces to develop alternative financing opportunities through public-private partnerships (PPP). The newly-formed Association for the Improvement of American Infrastructure (AIAI) reports that the PPP push is due to a lack in availability of traditional financing coupled with the need to speed projects, better manage staged costs, and build relationships between the private and public sectors. AIAI is seeking architects, engineers, construction contractors, and professionals from finance, equity, the public sector, academia, and others to foster cooperation and legislation that enables PPP.

Second Quarter 2013

UAVs Aid Project Management

Commercial construction companies are beginning to use unmanned aerial vehicles (UAV) to monitor and inspect jobsites. UAVs are economical because they allow managers to inspect high elevations, hard to access spots, and entire jobsites without having to manipulate large expensive equipment or risk physically accessing spaces. UAVs are easy to use and typically operated via a tablet, computer, or handheld controller. They are small and can be taken from jobsite to jobsite with little to no expense. Currently, if a UAV is flown below 400 ft and weighs less than 4.4 pounds, it's considered a hobby craft and not subject to FAA permitting for U.S. airspace.

First Quarter 2013

Challenging Year Forecasted

Construction industry economists agree that in 2013 nonresidential construction will decline and credit will remain tight for builders and buyers. Nonresidential construction spending is forecast to decrease almost 7% compared to 2012 levels, but begin to see improvement in 2014. Projects are likely to come from the private sector in power and energy, manufacturing, colleges and universities, and hotels. Public construction spending is expected to slow as federal, state, and local governments battle budget woes. Due to fewer projects, commercial contractors must glean maximum profit from each job. One way to achieve this is to significantly reduce costly rework, which includes labor, materials, equipment, and subcontractors and can be as high as 20% of a project's value. To reduce rework, contractors are increasingly using building information modeling (BIM) and lean construction techniques to scope out possible defects and correct them virtually.

Web Links

Constructor

News, trends and statistics from the Associated General Contractors of America magazine.

Construction Business Owner

News and trends for construction business owners.

Dodge Data & Analytics

News, trends, and statistics.

Associated General Contractors of America

News, trends, and regulatory issues from industry trade association.

Associated Builders and Contractors

Government affairs, legislative issues.

Business Valuation

This data on business valuations is supplied by Pratt's Stats, an online database with the most complete financial details on over 27,000 acquired private companies. The graphs show the distribution of transactions for various values of each of the following metrics:

- Selling Price to Sales
- Selling Price to Gross Profits
- Selling Price to EBITDA
- Selling Price to EBIT

At the bottom of each graph, the number of transactions, minimum value, maximum value, mean value, and median value are displayed. Click on the metric below to display the corresponding graph:

- Price to Sales
- Price to Gross Profits
- Price to EBITDA
- Price to EBIT

Count: 23	**Min:** 0.07	**Max:** 193.54	**Mean:** 9.08	**Median:** 0.49

Price to Sales = Selling Price/Net Sales
Date range: 06/20/2007 - 12/15/2016

Count: 23	**Min:** 0.3	**Max:** 193.5	**Mean:** 10.33	**Median:** 1.1

Price to Gross Profit = Selling Price/Gross Profit
Date range: 06/20/2007 - 12/15/2016

Count: 18	**Min:** 1.0	**Max:** 99.3	**Mean:** 10.62	**Median:** 3.8

Price to EBITDA = Selling Price/Operating Profit + Depreciation & Amortization
Date range: 06/20/2007 - 12/15/2016

Count: 22	**Min:** 1.0	**Max:** 383.0	**Mean:** 29.8	**Median:** 3.95

Price to EBIT = Selling Price/Operating Profit
Date range: 06/20/2007 - 12/15/2016

Selling Price, also known as MVIC (Market Value of Invested Capital) is the total consideration paid to the seller and includes any cash, notes and/or securities that were used as a form of payment plus any interest-bearing liabilities assumed by the buyer. The MVIC price includes the noncompete value and the assumption of interest-bearing liabilities and excludes (1) the real estate value and (2) any earnouts (because they have not yet been earned, and they may not be earned) and (3) the employment/consulting agreement values. In an Asset Sale, the assumption is that all or substantially all operating assets are transferred in the sale. In an Asset Sale, the MVIC may or may not include all current assets, non-current assets and current liabilities (liabilities are typically not transferred in an asset sale).

Source: *Pratt's Stats* 2017 (Portland, OR; Business Valuation Resources LLC). Used with permission.

Pratt's Stats is available at http://www.bvresources.com/prattsstats

Just the Numbers

Financial Summary

- Cash Intensity
- Inventory Intensity
- Labor Intensity
- Profitability
- Capital Intensity

Cash Intensity

18.9% Cash to Total Assets (%)

1st quartile

Inventory Intensity

25.75 Days Inventory

3rd quartile

Labor Intensity

3.38% Salaries/Wages to Sales (%)

4th quartile

Profitability

4.95% Operating Income to Sales (%)

3rd quartile

Capital Intensity

13.11% Net Fixed Assets to Total Assets (%)

4th quartile

Industry Financial Benchmarks

Here are typical financial statements for commercial building contractors.

This data is supplied by BizMiner, a leading supplier of industry analytical statistics to the financial sector, accounting and business valuation communities. BizMiner content includes financial and market reports on more than 9000 industry segments at national and local levels. Learn more about BizMiner products or review BizMiner data sources.

Need more detailed financial benchmark data for your client or prospect? BizMiner can break down this industry data by specific industry segments, size of business, or geographic market. These more detailed reports are available for as little as $79. To learn more or order a report, click here.

Show data for: Industry-wide

Commercial Building Contractors Financial Ratios
Size: industry-wide

MEASURE	2015	2016	2017
Current Ratio	1.66	1.67	1.71
Quick Ratio	1.01	1.02	1.07
Days Inventory	25.22	25.27	25.75
Days Receivables	37.15	37.58	45.19
Days Payables	36.70	36.68	39.82
Pre-tax Return on Revenue	5.63%	5.50%	5.31%
Pre-tax Return on Assets	14.49%	14.14%	11.50%
Pre-tax Return on Net Worth	41.09%	39.76%	28.57%
Interest Coverage	15.86	14.80	14.16
Current Liabilities to Net Worth	1.31	1.29	1.06
Long Term Liabilities to Net Worth	0.53	0.52	0.42
Total Liabilities to Net Worth	1.84	1.81	1.48
Number of Firms Analyzed	35,537	32,343	30,194

Commercial Building Contractors Income Statement
Size: industry-wide

ITEM	2015	2016	2017
Revenue	100%	100%	100%
Cost of Sales	82.34%	82.53%	83.72%
Gross Margin	17.66%	17.47%	16.28%
Officers Compensation	2.11%	2.13%	1.90%
Salaries-Wages	3.26%	3.30%	3.38%
Rent	0.90%	0.90%	0.81%
Taxes Paid	1.04%	1.05%	0.96%
Advertising	0.07%	0.07%	0.08%
Benefits-Pensions	0.95%	0.95%	0.94%
Repairs	0.20%	0.21%	0.19%
Bad Debt	0.08%	0.08%	0.07%
Other SG&A Expenses	3.58%	3.49%	3.00%
EBITDA	5.47%	5.29%	4.95%
Amortization-Depreciation	0.35%	0.34%	0.32%
Operating Expenses	12.54%	12.52%	11.65%
Operating Income	5.12%	4.95%	4.63%
Interest Income	0.03%	0.03%	0.04%
Interest Expense	0.34%	0.36%	0.35%
Other Income	0.83%	0.89%	0.99%
Pre-tax Net Profit	5.64%	5.51%	5.31%
Income Tax	1.77%	1.74%	1.75%
After Tax Net Profit	3.87%	3.77%	3.56%
Number of Firms Analyzed	35,537	32,343	30,194

Commercial Building Contractors Balance Sheet
Size: industry-wide

ASSETS	2015	2016	2017
Cash	20.04%	20.06%	18.90%
Receivables	26.21%	26.45%	26.78%
Inventory	14.65%	14.68%	12.78%
Other Current Assets	15.44%	15.53%	14.52%
Total Current Assets	76.34%	76.72%	72.98%
Net Fixed Assets	13.32%	13.11%	13.39%
Other Non-Current Assets	10.34%	10.17%	13.63%
Total Assets	100.00%	100.00%	100.00%
Liabilities			
Accounts Payable	21.32%	21.31%	19.76%
Loans/Notes Payable	8.90%	8.78%	6.86%
Other Current Liabilities	15.80%	15.72%	16.12%
Total Current Liabilities	46.02%	45.81%	42.74%
Total Long Term Liabilities	18.72%	18.63%	17.02%
Total Liabilities	64.74%	64.44%	59.76%
Net Worth	35.26%	35.56%	40.24%
Total Liabilities & Net Worth	100%	100%	100%
Number of Firms Analyzed	35,537	32,343	30,194