

# **Business Valuation Report**

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## **Sample, Inc.**

101 Drive  
Alleyton, Texas 78935

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**As of: December 31, 2018**

Prepared by:  
James Lynsard, MBA, MAcc, Certified Appraiser

Business Matter Valuation

302 Washington St

# 150-1234

San Diego, CA 92103

Dear Mr John Smith,

The enclosed valuation report has been developed for the exclusive and confidential use of Mr John Smith. The report has been prepared by Business Matter Valuation dated February 1, 2019 and was made by and/or under the direct supervision of the undersigned. The purpose of the valuation is to render an opinion as to the fair market value of 100% interest of Sample, Inc. as of December 31, 2018 .

In preparing my business valuation report, I have relied upon historical financial information provided to me. This financial information has not been audited, reviewed, or compiled by me and accordingly I do not express an opinion or any form of assurance on this financial information.

My report is based on historical and prospective financial information provided to me by management and other third parties. Users of this valuation report should be aware that business valuations are based on future earnings potential that may or may not materialize. Therefore, the actual results achieved during the projection period will vary from the projections used in this valuation, and the variations may be material. The accompanying report discusses all the assumptions and limiting conditions that apply to this opinion of value and are integral to the understanding of the opinion.

Based upon my study and analytical review procedures, I have concluded that a reasonable estimate of the fair market value of a 100% interest of Sample, Inc. as of December 31, 2018 is \$525,000 .

This engagement was not contingent upon developing or reporting predetermined results. My compensation for completing this assignment is not contingent upon the development or reporting of a predetermined value or direction in value that favors the cause of the client, the amount of the value opinion, the attainment of a stipulated result, or the occurrence of a subsequent event directly related to the intended use of this appraisal. My analyses, opinions, and conclusions were developed, and this report has been prepared, in conformity with the *Uniform Standards of Professional Appraisal Practice*.

Sincerely yours,

James Lynsard, MBA, MAcc, Certified Appraiser  
Business Matter Valuation

A handwritten signature in black ink, appearing to be 'JL', written over a light blue horizontal line.



## **Executive Summary**

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Governing Standard:	USPAP
Purpose:	Financial Reporting
Standard of Value:	fair market value
Premise of Value:	Controlling Interest
Client Name:	Mr John Smith
Business Name:	Sample, Inc.
Type of Entity:	corporation
Business Interest Valued:	100%
Valuation Date:	December 31, 2018
Report Date:	February 1, 2019
Appraiser Name:	James Lynsard, MBA, MAcc, Certified Appraiser
Appraiser Firm:	Business Matter Valuation
Conclusion of Value:	\$525,000

# Introduction

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## Specifics

Business Matter Valuation has been retained by Mr John Smith to estimate the fair market value of Sample, Inc.. Sample, Inc. operates a machine shop. Furthermore, an interest of 100% is being valued as of December 31, 2018.

The appraisal will be used by Mr John Smith for the sole purpose of Financial Reporting. The distribution of this report is restricted to the Mr John Smith, legal and tax professionals advising Mr John Smith and any regulatory agencies whereby reporting is required. Any other use of this report is unauthorized and the information included in the report should not be relied upon.

## Definitions

Appendix F has a glossary of terms that is applicable to this engagement.

## Standard of Value

The standard of value for this report is fair market value.

## Premise of Value

Although valuation is a range concept, current valuation theory suggests that there are three basic “levels” of value applicable to a business or business interest. The levels of value are respectively:

**Controlling interest:** the value of the enterprise as a whole.

**As if freely tradable minority interest:** the value of a minority interest, lacking control, but enjoying the benefit of market liquidity.

**Non-marketable minority interest:** the value of a minority interest, lacking both control and market liquidity.

This valuation is prepared on a Controlling Interest basis.

## **Sources of Information**

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The primary sources of information were research on the economy, industry and company, analysis of financial statement.

# Approach

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Business valuation theory promulgates three basic approaches to value.

**Asset Based Approach:** A general way of determining a value indication of a business's assets and/or equity using one or more methods based directly on the value of the assets of the business less liabilities.

**Income Approach:** A general way of determining a value indication of a business's assets and/or equity using one or more methods wherein a value is determined by converting anticipated benefits.

**Market Approach:** A general way of determining a value indication of a business's assets and/or equity using one or more methods that compare the subject to similar investments that have been sold.

The various methods of valuation that appraisers use in practice are typically considered as subdivisions of these broad approaches. Valuation methods under the Market and Income approaches generally contain common characteristics such as measures of benefit streams, discount rates and/or capitalization rates and multiples.

## Assumptions

There are several key assumptions that this report relies on.

This valuation report has been prepared in accordance with the *Uniform Standards of Professional Appraisal Practice*. In accordance with these standards, a Statement of Contingent and Limiting Conditions is provided as Appendix B.

## Scope Limitation

The scope of this valuation engagement report was limited. I was engaged to perform a valuation for Sample, Inc. with the intent of ascertaining an opinion of value. However, I was limited to the information that was provided as of December 31, 2018. I have accepted the Unaudited financial statements without testing their accuracy or completeness. The accuracy of the financial statements is the sole responsibility of the management.

I assume no responsibility for the accuracy of the information provided to me by the business's management.

This valuation report is based upon facts and conditions existing as of the date of valuation. I have not considered subsequent events. Unless specifically requested by the client and agreed upon by us, I have no obligation to update my report for such events and conditions.

Accordingly, my level of assurance on the estimate of value is reduced. This report is not intended to serve as a basis for expert testimony in a court of law or other governmental agency without further analysis and resulting documentation.

## General Economic Overview

### Gross Domestic Product

According to advance estimates released by the Department of Commerce's Bureau of Economic Analysis (the "BEA"), Real Gross Domestic Product ("GDP"), the output of goods and services produced by labor and property located in the United States, increased at an annualized rate of 3.5% during the third quarter of 2018. GDP growth in the third quarter was down from growth of 4.2% in the second quarter of 2018 and represents the seventeenth straight quarter of growth. While the growth rate of 3.5% slipped somewhat from the growth seen in the second quarter of 2018, it was still greater than levels seen for much of the expansion in the U.S. economy since 2009, which was closer to 2%. Annualized GDP growth of 3.5% during the third quarter of 2018 compares favorably to economists' projections of 3.3% and 3.4% (*Bloomberg Survey* and *Wall Street Journal Survey*, respectively). Annualized GDP growth in the first quarter of 2018 and second quarter of 2018 measured 2.2% and 4.2%, respectively. The following table summarizes the change in individual components of GDP during the third quarter of 2018.

Real Gross Domestic Product		
Quarterly Change: Third Quarter 2018		
Increase Attributable to Gains in:	Unchanged	Increase Offset by Decreases in:
Personal Consumption Expenditures	None	Exports
Private Inventory Investment		Residential Fixed Investment
State and Local Government Spending		Imports (Increased, subtracted from the national income and product accounts)
Federal Government Spending		
Nonresidential Fixed Investment		

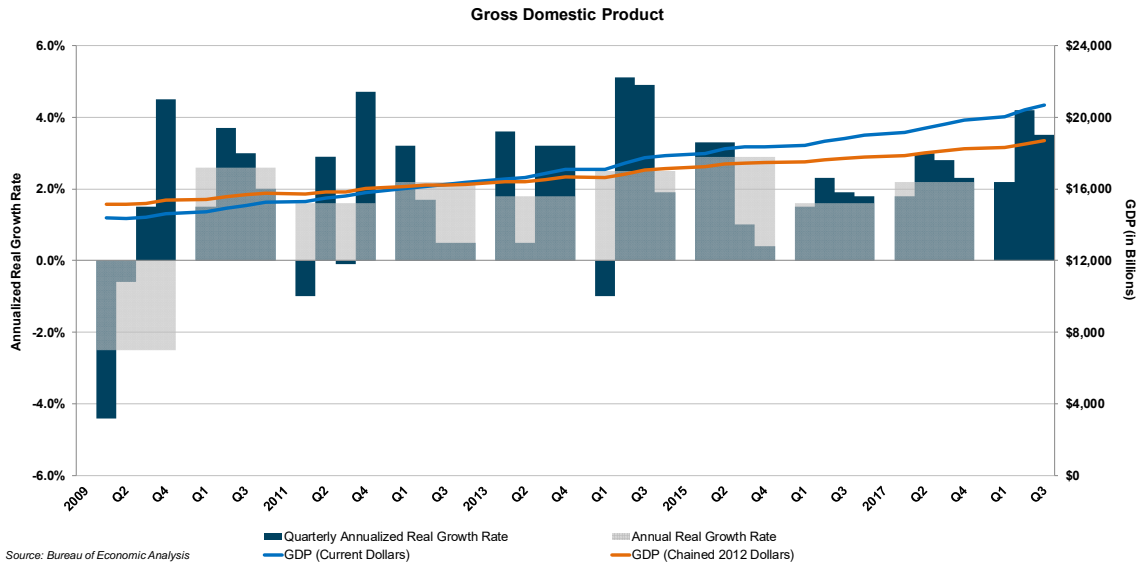
Real GDP grew 2.2% during 2017, compared to growth of 2.9% in 2015 and 1.6% in 2016.

Exports decreased 3.5% in the third quarter, compared to increases of 3.6% and 9.3% in the first and second quarter of 2018, respectively. Durable goods expenditures grew at an annualized rate of 6.9% over the quarter, following a decrease of 2.0% in the first quarter of 2018 and an increase of 8.6% in the second quarter, respectively.

Economists expect GDP growth to continue to slow in future quarters. A survey of economists conducted by *The Wall Street Journal* reflects an average GDP forecast of 2.9% annualized growth in the fourth quarter of 2018.



After the 2017 tax cuts spurred business investment and GDP growth in the first and second quarters of 2018, third quarter GDP growth slowed somewhat among ongoing uncertainty surrounding the outlook for global trade, specifically the possibility of further tariffs. These concerns are expected to weigh on GDP and business investment growth going forward, as businesses must choose whether or not to make capital investments in plant and equipment.



## Economic Indicators

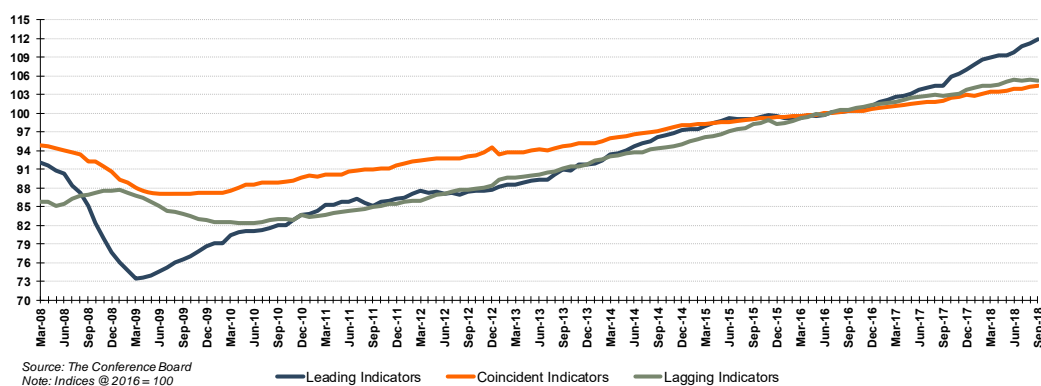
The Conference Board (“TCB”) reported that the Leading Economic Index (“LEI”), the government’s primary forecasting gauge, increased in September 2018. Over the six month period ended September 2018, the LEI increased 2.8%, which is slower than the 4.1% growth observed over the previous six months. The following table summarizes changes during the third quarter to the economic indices tracked by TCB.

### Conference Board Economic Indicators

	July 2018	August 2018	September 2018	Six Months Ending June 2018	Six Months Ending September 2018
<b>Leading Economic Index</b>	0.7%	0.4%	0.5%	2.7%	2.8%
<b>Coincident Economic Index</b>	0.1%	0.3%	0.1%	1.0%	1.1%
<b>Lagging Economic Index</b>	-0.2%	0.2%	-0.1%	1.5%	1.1%

Traditionally, the LEI is thought to gauge economic activity six to nine months in advance. Consecutive moves in the same direction are thought to be indicative of the general direction of the economy.

Trends in Leading, Coincident, and Lagging Economic Indicators



Overall, TCB economists view the LEI’s recent movements as a sign of continuing growth but see the decelerating pace of said growth to be a sign of an economy facing potential headwinds. According to the Director of Business Cycles and Growth Research at TCB, Ataman Ozyildirim, “The U.S. LEI improved further in September, suggesting the US business cycle remains on a strong growth trajectory headed into 2019. However, the LEI’s growth has slowed somewhat in recent months, suggesting the economy may be facing capacity constraints and increasingly tight labor markets.” He added, “Economic growth could exceed 3.5 percent in the second half of 2018, but, unless the momentum in housing, orders and stock prices accelerates, that pace is unlikely to be sustained in 2019.” Eight of the LEI’s ten leading economic indicators increased during September 2018, and two decreased. The following table shows the changes among the indicators sorted by the greatest contributors to the monthly change.

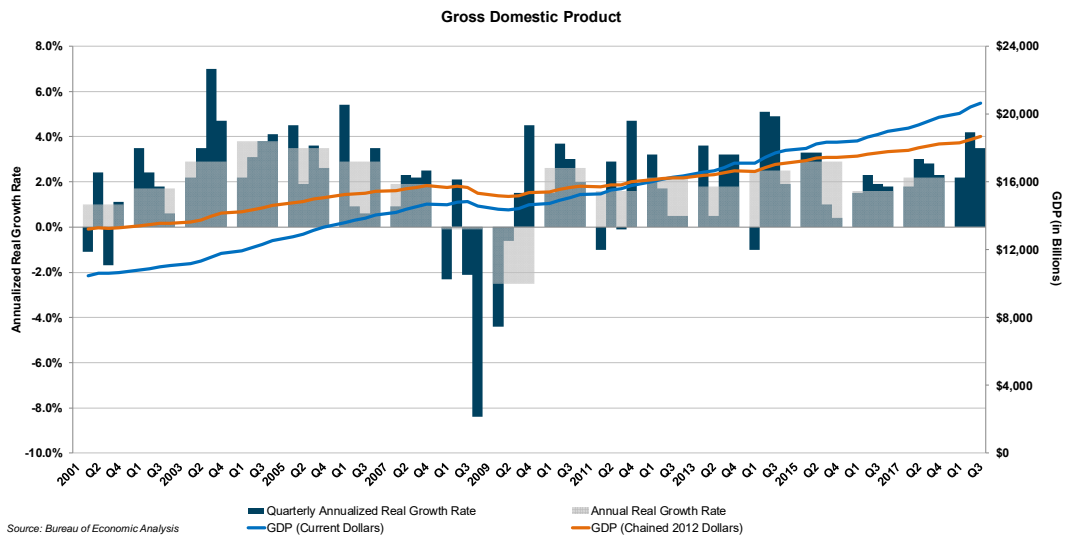
Leading Economic Indicators		
Monthly Change - September 2018		
Increased	Unchanged	Decreased
Average Consumer Expectations for Business Conditions	None	Average Weekly Manufacturing Hours
ISM® New Orders Index		Building Permits
Interest Rate Spread		
Leading Credit Index™ (Inverted)		
Stock Prices		
Average Weekly Initial Claims for Unemployment Insurance (Inverted)		
Manufacturers' New Orders for Nondefense Capital Goods Excluding Aircraft		
Manufacturers' New Orders for Consumer Goods and Materials		

## Historical Business Cycles and Fiscal Policy Overview

In September 2010, the Business Cycle Dating Committee of the National Bureau of Economic Research (“NBER”) determined that the Great Recession, which began in December 2007, had ended by June 2009. The following table provides perspective concerning NBER business cycles dating from the Great Depression to the present. (The contraction period measures from the peak to the trough. The expansion period measures from the previous trough to the peak.) September 2018 marks 111 months (nine years and three months) of expansion since the June 2009 trough. No economic expansion in U.S. history has lasted longer than ten years. In May of 2018, the current expansion surpassed the 106 month expansion of the 1960s to become the second-longest running expansion in U.S. history.

**NBER Business Cycle Reference Dates (1929 - June 2009)**

Month & Year of Economic		Duration in Months of	
Peak	Trough	Contraction	Prior Expansion
August 1929	March 1933	43	21
May 1937	June 1938	13	50
February 1945	October 1945	8	80
November 1948	October 1949	11	37
July 1953	May 1954	10	45
August 1957	April 1958	8	39
April 1960	February 1961	10	24
December 1969	November 1970	11	106
November 1973	March 1975	16	36
January 1980	July 1980	6	58
July 1981	November 1982	16	12
July 1990	March 1991	8	92
March 2001	November 2001	8	120
December 2007	June 2009	18	73



In December 2017, President Trump signed into law an extensive tax-code overhaul, known as the Tax Cuts and Jobs Act (the “TCJA”). The tax bill has different implications for households and corporations.

- The corporate tax rate was reduced from 35% to 21%. The tax bill also allows companies to write-off investments at a faster rate while limiting their abilities to deduct interest expenses.
- The tax bill introduced new rules for profits earned overseas – corporations will pay a one-time 15.5% tax on profits accrued abroad, while international income earned in future periods will not be subject to U.S. taxes.
- The tax bill reduced taxes for pass-through businesses such as partnerships, S corporations, and sole proprietorships.
- The top individual tax rate was reduced to 37% from 39.6%, and the tax bill reduced the number of households impacted by the alternative minimum tax. The bill also increased the standard deduction, capped state and local tax deductions, and increased the child tax credit.
- Over 80% of households are expected to experience a tax cut in 2018, and 5% are expected to experience tax increases according to the Tax Policy Center. The Joint Committee on Taxation expects the overall tax burden to shift slightly to households in the \$100,000 to \$200,000 bracket and households in excess of \$1 million by 2019. The household tax changes are not permanent and expire in 2025.
- The plan also eliminated the federal tax penalty for not having health insurance.

The Congressional Budget Office (the “CBO”) announced a \$782 billion budget deficit for fiscal year 2018 (period ended September 2018). This deficit was \$116 billion more than the deficit in fiscal 2017. According to CBO estimates, revenue were approximately the same as the prior year, and outlays were 3% higher in 2018 than in the previous fiscal year. According to the CBO’s projections in its Budget and Economic Outlook, real GDP is expected to grow by 3.1% in 2018, excess demand in the economy will put upward pressure on prices, wages and interest rates over the next few years, and the long term outlook for real GDP growth (from 2023-2028) predicts growth of approximately 1.7% per year.

In the aforementioned Budget and Economic Outlook as published by the CBO, the committee concedes that its current set of projections are somewhat capricious given the present uncertainty surrounding the international trade situation in the U.S. Fulfilling a campaign promise, President Trump formally withdrew from the Trans-Pacific Partnership (the “TPP”) in January 2017. While the U.S. maintains trade treaties with several countries that were involved with the TPP, further deals are likely needed to boost imports to the region. While President Trump had largely backed away from campaign promises to rewrite or eliminate the North American Free Trade Agreement (also known as “NAFTA”) through the first half of 2018, the U.S. and Mexico announced a new, bilateral trade agreement in August 2018.

The agreement included several important provisions that had held up previous NAFTA negotiations between the U.S. and Mexico. First, the agreement stipulated that 75% of the content used in the production of automobiles must be sourced in North America in order to qualify for tariff-free treatment, up from 62.5% under NAFTA. Further, certain key inputs in auto manufacturing, such as steel and aluminum, must be sourced in North America. Intellectual property was a point of ongoing contention in previous negotiations, but the agreement resolved this dispute by stating that copyright holders will have full copyright protections in the markets of all member countries. Under the original NAFTA system, a system of international tribunals considered disputes between a company and the member country's government. The Trump administration has historically opposed these tribunals, despite support from U.S. industry groups. As part of the new agreement, the tribunals will remain in place for certain industries, but not others. Finally, the U.S. and Mexico agreed not to impose tariffs on each other's agricultural goods and to not use export subsidies. This provision could bring relief to both U.S. and Mexican farmers who have been impacted by rounds of retaliatory tariffs.

While the U.S. and Mexico were able to agree to the terms of a new, bilateral trade agreement, U.S.-Canada trade negotiations appeared much more tenuous over the course of the third quarter. However, the trade delegations from the U.S. and Canada were able to come to an agreement in late September, allowing Canada to join the agreement made by the U.S. and Mexico in August. The new trade agreement between the three neighboring countries will be known as the U.S.-Mexico-Canada Agreement (the "USMCA") and makes significant revisions to NAFTA, which was signed into existence in 1994. Canada and the U.S. both made significant concessions to come to an accord. Canada pledged to curb protection for its dairy industry, which President Trump had criticized as being unfair to American producers. In return, the U.S. pledged to drop demands to do away with the aforementioned NAFTA tribunals used to resolve disputes among member countries.

In response to the steel and aluminum tariffs imposed in the first quarter of 2018, China announced tariffs on U.S. agricultural goods, including soybeans and hogs. Soybean and hog futures declined as markets began to anticipate excess supply that would fail to be exported. In April 2018, President Trump also announced 25% tariffs on a variety of Chinese imports ranging from medicines to machine tools to consumer goods. The tariffs were expected to generate \$50 billion in revenue. None of the tariffs took effect immediately. By mid-June 2018, most of the U.S.'s planned tariffs had been implemented. As a result of these tariffs, various U.S. industries were disrupted by rising input costs or inability to import parts. However, the imports covered by tariffs are a small portion of total imports. The main effect of the tariffs announced through mid-June was an increase in total tariff revenue as a percentage of imports from 1.5% to 2.0%.

In July 2018, the White House announced that it would assess 10% tariffs on a further \$200 billion in Chinese goods. This new round of tariffs were not expected to take effect for at least two months and would be imposed upon a variety of products, including a wide range of consumer goods. China in turn announced its own set of tariffs on \$34 billion of U.S. farm goods, aircraft and other items. Talks between the U.S. and China in response to the new rounds of tariffs occurred in August with little sign of visible progress in terms of resolving the ongoing trade dispute. One hindrance to any tangible progress in these talks was a set of U.S. demands that would shift Chinese industrial policy toward a more accommodative stance to U.S. technology firms operating in China, who currently are subject to pressure and interference from the Chinese government. During these trade talks, the U.S. and China imposed a further \$16 billion in 25% tariffs on one another. However, in September, the Trump administration began to explore the possibility of lowering this rate to 10% amid concerns about striking a balance between pressuring the Chinese and harming American consumers.

# Consumer Spending and Inflation

## Inflation

According to the Bureau of Labor Statistics (“BLS”), the Consumer Price Index (“CPI”) increased 0.1% in September 2018 (on a seasonally adjusted basis), following increases of 0.2% in both July and August. The unadjusted CPI stood at 252.4 (CPI-U all urban consumers, 1982-1984 = 100), an increase of 2.3% over the previous twelve months. The Core CPI, which excludes food and energy prices, increased 0.1% in September, and Core CPI increased 2.2% on an unadjusted basis over the previous twelve months.

The Producer Price Index (“PPI”) is generally recognized as predictive of near-term consumer inflation. The PPI for total final demand (seasonally adjusted) increased 0.2% in September 2018, following no change in the index in July and a decline of 0.1% in August. The PPI for final demand excluding food, energy, and trade increased 0.4% in September, which is the largest increase since a rise of 0.5% in January 2018. On an unadjusted basis, the twelve-month change in the total final demand PPI was an increase of 2.6% through September 2018. The unadjusted PPI for final demand excluding food, energy, and trade increased 2.9% in the last twelve months. The increase in PPI was in line with projections made by economists surveyed by *The Wall Street Journal* and *Reuters*.

## Oil and Gasoline

During a November 2016 meeting, the Organization of Petroleum Exporting Countries (“OPEC”) instituted production cuts for the first time in eight years. OPEC and eleven other oil-producing countries (including Russia) ultimately reduced output by 1.8 million barrels a day. OPEC’s stated goals were to keep the price of oil above \$50 per barrel and to bring inventories down to 2.7 billion barrels. By June 2017, however, the price of crude oil had fallen to pre-agreement levels. Libya and Nigeria, exempt from cuts, had increased crude production, and Russia appeared unlikely to maintain production cuts in future months. Additionally, the reduced production of OPEC countries had been largely offset by North American shale oil production. By September 2017, crude inventories had fallen, even though several member countries were producing at higher-than-agreed-upon levels. Oil prices rallied during the fourth quarter of 2017, reaching the highest prices since 2015 and exceeding the floor desired by OPEC. The rally continued through the first half of 2018, as oil prices reached over \$70 per barrel in May for the first time since 2014 and inventories continued to fall.

In June, OPEC members agreed to boost crude output by approximately 600,000 barrels per day, alleviating some of the supply concerns driving the increase in oil prices seen in the first half of the year. This increase in output was less than the 1,000,000 barrels per day expected by analysts. As a result, the potential downward price effects of the increased production were less than expected. In August, the U.S. announced a new round of sanctions on OPEC member Iran. While these sanctions did not include oil exports, it did raise concerns that the U.S. will eventually place sanctions on Iranian oil exports, which could result in global supply losses. However, going against the overall trend seen in the third quarter, oil prices dropped briefly in mid-September, as OPEC continued to ramp up production, evidenced by the 420,000 barrels per day increase seen in August. According to the International Energy Agency, total OPEC production in August, which was primarily driven by Libya, Iraq, Nigeria and Saudi Arabia, “far outweighed losses from Iran ahead of U.S. sanctions”. Crude oil prices rose to \$80 by the end of September, up from \$79 per barrel at the end of the second quarter, as OPEC members expressed fear of a further oil glut, citing weaker demand for the cartel’s oil given increasing economic uncertainty and rising U.S. shale production. This marks the fifth straight quarter of price increases and a new multiyear high.

Exploration and production activities have recovered significantly from their low in May 2016, although the Baker Hughes North American (U.S.) total oil rig count increased by 1% during the third quarter of 2018. The total rig count is up 12% over the last twelve months. For comparison, total rig count increased 7% during the first quarter of 2018 and 4% during the second quarter of 2018. Brent crude oil, which is the global benchmark for oil prices, traded for an average of \$79 per barrel in September, up \$6 dollars per barrel from August measures. The U.S. Energy Information Administration (“EIA”) expects crude prices to fall slightly through the balance of the year and remain steady around \$75 per barrel into 2019. EIA also estimates that U.S. crude oil production averaged 11.1 million barrels per day in September, which is slightly above August levels. Further, EIA estimates that U.S. crude oil production in 2018 will average 10.7 million barrels per day, with production rising in 2019 to 11.8 million barrels per day.

## **Retail Sales and Personal Consumption**

According to the Census Bureau of the U.S. Department of Commerce, the advance estimates of U.S. retail and food service sales (adjusted for seasonal, holiday, and trading-day differences) for September 2018 increased 0.1% from the previous month and increased 4.7% relative to September 2017.<sup>1</sup> Core retail and food service sales (which exclude motor vehicles & parts) decreased 0.1% relative to the previous month and increased 5.7% relative to September 2017. In the third quarter of 2018, retail and food service sales increased 1.3% relative to second quarter of 2018 and were 5.9% above the level observed in the third quarter of 2017.

Personal consumption spending represents approximately 70% of total economic activity and is a primary component of overall economic growth. Real personal consumption spending increased 4.0% in the third quarter of 2018, following increases of 0.5% and 3.8% in the first quarter and second quarter of 2018, respectively. According to the Bureau of Economic Analysis, durable goods purchases increased 6.9% in the third quarter of 2018, following an increase of 8.6% in the second quarter of 2018 and a decrease of 2.0% in the first quarter.

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<sup>1</sup> The Census Bureau revised monthly sales estimates to reflect new samples, seasonal factors, and the results of the 2016 Annual Retail Trade Survey. Current results may not reconcile directly to earlier editions of the *National Economic Review*.

## Business and Manufacturing Productivity

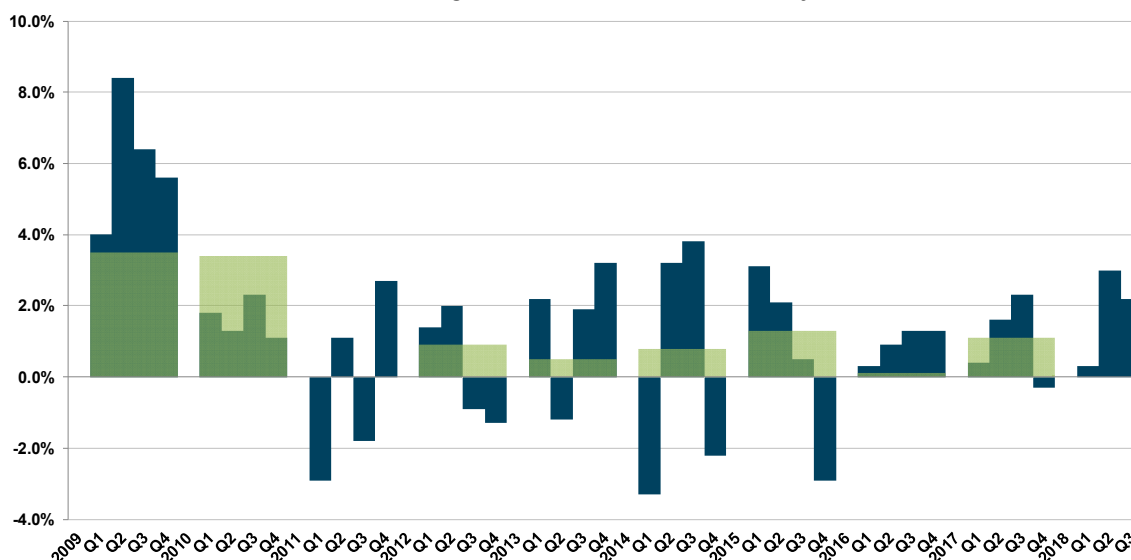
According to the BLS, seasonally adjusted nonfarm business productivity (as measured by the hourly output of all persons) increased at an annual rate of 2.2% in the third quarter of 2018. The productivity increase in the third quarter follows an increase of 3.0% in the second quarter. Productivity increased 1.3% relative to the third quarter of 2017. The following table summarizes the changes in individual components of productivity during the third quarter of 2018.

<b>Nonfarm Business Labor Productivity</b>		
<b>Quarterly Change: Third Quarter 2018</b>		
<b>Increase Attributable to Gains in:</b>	<b>Unchanged</b>	<b>Increase Offset by Decreases in:</b>
Hourly Compensation	None	None
Output		
Real Hourly Compensation		
Hours Worked		
Unit Labor Costs		

Business sector productivity (inclusive of farming activity) increased 1.9% in the third quarter of 2018, while manufacturing productivity increased 0.5% during the quarter.



**Change in Nonfarm Business Productivity**



Source: Bureau of Labor Statistics

■ Annualized Quarterly Change    ■ Annual Change

## Industrial Production and Capacity Utilization

According to the Federal Reserve, seasonally adjusted industrial production increased 0.3% in September 2018, following an increase of 0.4% in August and an increase of 0.3% in July. Overall industrial production during the third quarter increased at an annualized rate of 3.3%, making the third quarter of 2018 the fourth consecutive quarter in which overall industrial production increased. For reference, industrial production increased 2.4% and 6.0% in the first and second quarter of 2018, respectively. During the third quarter of 2018, manufacturing output increased at an annualized rate of 2.8%, following increases of 1.9% and 2.3% in the first and second quarter of 2018, respectively. After increasing at an annualized rate of 16.5% in the second quarter, mining output continued its pattern of growth, increasing at a rate of 11.4% in the third quarter of 2018.

Seasonally adjusted capacity utilization was 78.1% in September 2018, after measures of 77.9% and 78.1% in July and August, respectively. Capacity utilization for the third quarter overall measured 78.0%, up from 77.2% and 77.8% in the first quarter and second quarter of 2018, respectively.

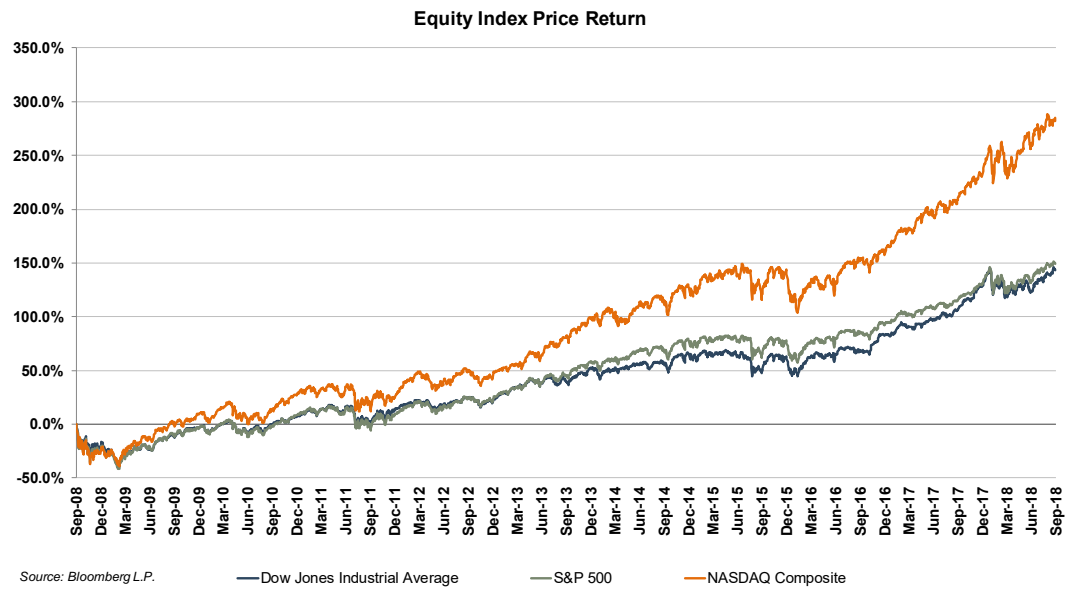
## The Financial Markets

In the third quarter, major U.S. stock market indices posted gains due to muted volatility, strong corporate earnings and continued economic growth. Much of this economic growth is still being credited to the tax overhaul passed in late 2017. While the U.S. continued its ongoing trade disputes with China, Mexico, and Canada, tariff threats took their tolls on individual auto, machinery and semiconductor stocks, but seemed to have only marginal impacts on broader equity markets in the U.S. Still, analysts worry that these impacts could find their way into the markets in the fourth quarter, along with concerns surrounding a contentious midterm election cycle and the possibility that the Fed will raise rates again in the fourth quarter. However, in general, the third quarter was devoid of these potential sources of volatility, as trading volumes were muted throughout much of the summer vacation season. For reference, the S&P 500 recorded no daily swing of 1% in either direction over the quarter, compared with 36 such moves in the first half of the year. This lack of volatility, coupled with surging corporate profits and steady economic growth, led U.S. equity markets to all post solid gains in the third quarter of 2018.

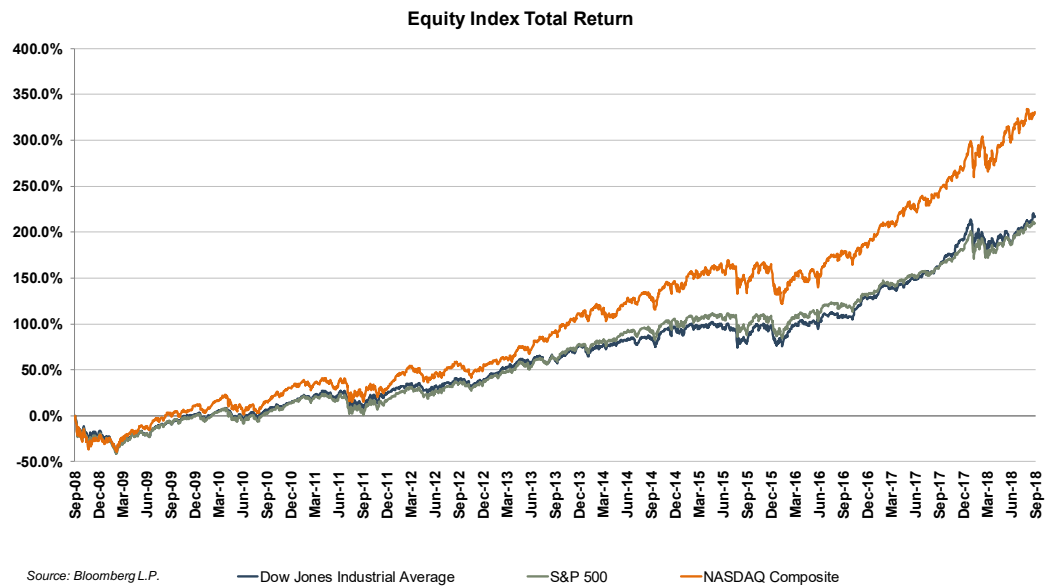
The following provides a brief summary of each index's performance over the third quarter of 2018:

- » The Dow Jones Industrial Average ended the third quarter of 2018 at 26,458. This represents a 9.0% increase for the quarter, following an increase of 0.7% in the second quarter and a decline of 2.5% in the first quarter of the year. The Dow was up 25.1% during 2017.
- » The S&P 500 Index recovered from a decrease of 1.2% during the first quarter of 2018 and closed at 2,718 at the end of the second quarter. The gain in the index during the second quarter represented 2.9% over the end of the first quarter of 2018. The S&P posted another, much more substantial gain in the third quarter, closing at 2,914, which is a 7.2% increase over the end of the second quarter. The S&P posted a gain of 19% during 2017.
- » The NASDAQ Composite Index increased 7.1% during the third quarter to close at 8,046, following gains of 2.3% and 6.3% in the first and second quarters of 2018, respectively. During 2017, the NASDAQ rose 28.2%.
- » The broad market Wilshire 5000 Index closed the third quarter at 30,260, a gain of 6.6% over the second quarter, which followed a loss of 1.4% in the first quarter and a gain of 3.6% in the second quarter. The Wilshire 5000 index was up 18.6% during 2017.

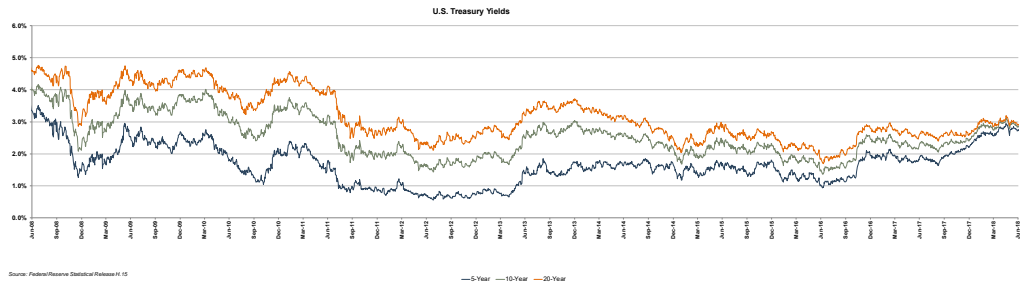
The following chart shows the relative price performance of the Dow Jones Industrial Average, S&P 500, and NASDAQ Composite Indices.



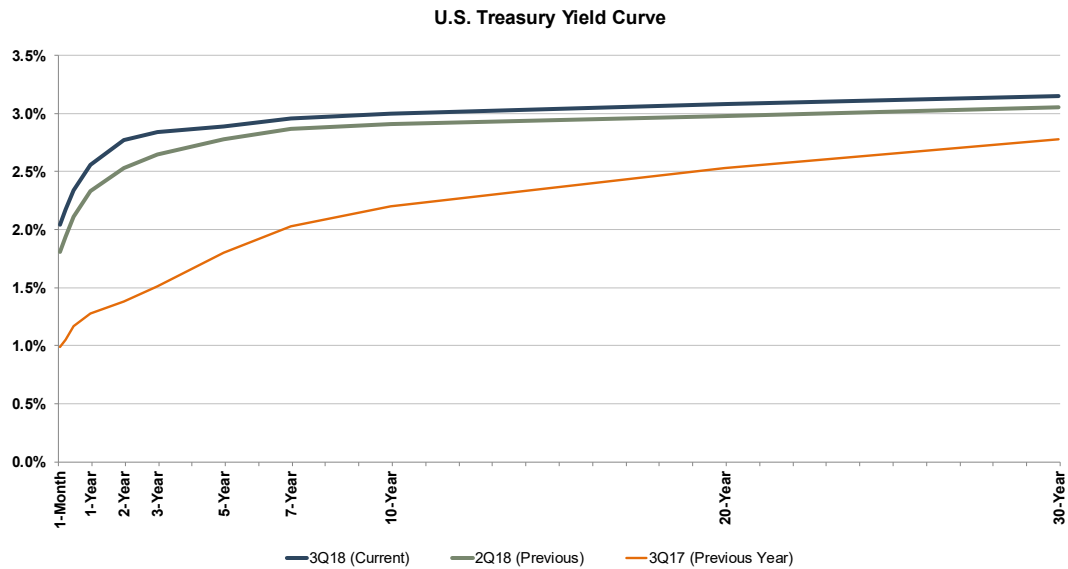
The following chart shows the relative total return performance (which includes reinvested dividends) of the Dow Jones Industrial Average, S&P 500, and NASDAQ Composite Indices.



Treasury yields increased during the third quarter of 2018. Bond prices are negatively correlated with their respective yields. Bond prices can shift abruptly due to investor reactions to major variances in reported economic data versus market expectations (e.g., expected inflation, growth, monetary policy, and other Federal Reserve actions). Further, the spread between 2-year and 10-year Treasury note yields narrowed significantly over the quarter, as growth in the 2-year note's yield (24 bps) far outpaced that of the 10-year note (9 bps). At the end of the first quarter of 2018, the spread between the two yields was 56 basis points. This spread had fallen to 38 basis points by the end of the second quarter and further narrowed in the third quarter to 23 basis points, suggesting a continuously flattening yield curve over the course of the year. Investors generally view the slope of the yield curve as an indicator of the direction of the economy. Steeper sloped yield curves imply greater future economic growth.

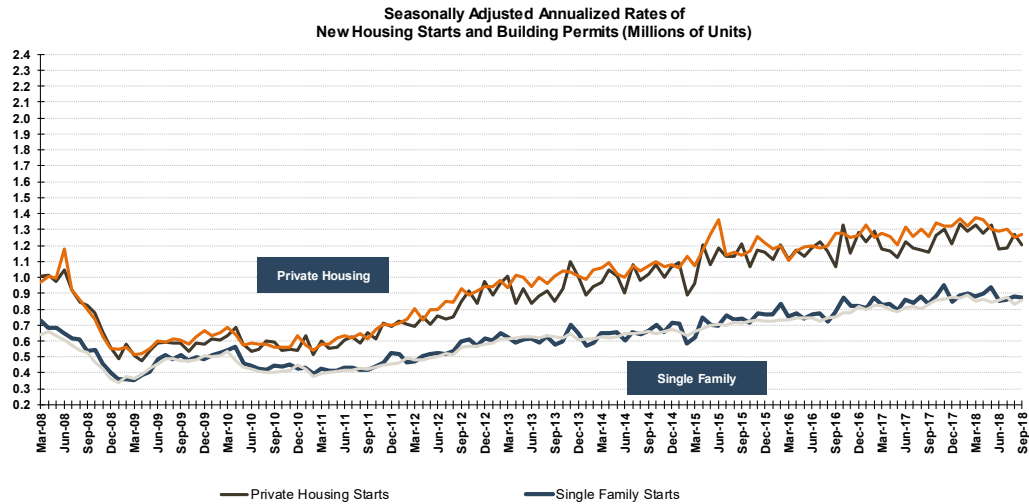


Economists surveyed by *The Wall Street Journal* anticipate yields to continue to rise in upcoming years.



# Housing Market

Home building activity has traditionally been a primary driver of overall economic activity because new home construction stimulates a broad range of industrial, commercial, and consumer spending and investment. According to the U.S. Census Bureau, new privately owned housing starts were at a seasonally adjusted annualized rate of 1,201,000 units in September 2018, 5.3% below the revised August rate of 1,268,000 units but 3.7% above the September 2017 rate.<sup>2</sup> The seasonally adjusted annual rate of private housing units authorized by building permits (considered the best indicator of future housing starts) was 1,241,000 units in September 2018, 0.6% below the revised August rate of 1,249,000 and 1.0% below the September 2017 rate.



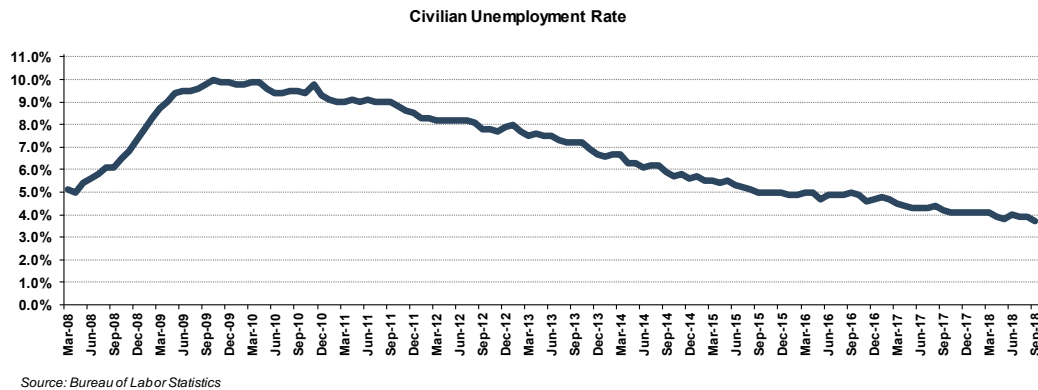
Source: U.S. Census Bureau  
 Note: Permits at a given date are generally a leading indicator of future starts. Beginning with January 2004, building permit data reflects the change to the 20,000 place series.

According to the National Association of Realtors (“NAR”), existing-home sales (at a seasonally adjusted annual rate) totaled 5.15 million in September 2018, which is down from 3.4% from August and 4.1% below the September 2017 level. First-time home buyers purchased 32% of existing homes. Housing inventory stood at 1.88 million existing homes, representing 4.4 months of supply at the current sales pace, which is up slightly from 4.2 months in September 2017. Properties stayed on the market an average of 32 days in September 2018, up from 29 days August, but down from 34 days in September 2017. The national median existing-home price, \$258,100, increased 4.2% relative to September 2017 and marked the 79<sup>th</sup> straight month of year-over-year gains. Distressed sales, which include foreclosures and short sales, accounted for approximately 3% of sales in September 2018, unchanged from August 2018, but down from 4% in September 2017.

<sup>2</sup> The Census Bureau revised both seasonally adjusted and unadjusted estimate of building permits and starts. The revised data covers January 2012 through the current release. The Census Bureau intends to revise data on an annual basis in future years.

## Unemployment and Payroll Jobs

According to the BLS, the unemployment rate (U-3) was 3.7% in September 2018, which is down from 3.9% in July and August 2018. The September 2018 unemployment rate of 3.7% was the lowest since December 1969, according to the Labor Department. Economists surveyed by *The Wall Street Journal* anticipate unemployment rates of 3.6% in both December 2018 and June 2019. The underemployment rate (U-6, seasonally adjusted), which includes workers who are involuntarily working part-time positions, increased to 7.5%, compared to 7.5% in July and 7.4% in August.



In September 2018, the labor force participation rate stood at 62.7% (relative to mid- to high- 60s prior to the recession), consistent with levels seen throughout most of 2018. The number of nonfarm payroll jobs increased by 134,000 in September 2018, and September's gain follows increases of 165,000 and 270,000 jobs in July and August, respectively. The Federal Reserve estimates that 17 million jobs have been created during the current economic expansion. Population growth alone adds approximately 109,400 individuals to the workforce per month. Economists surveyed by *The Wall Street Journal* anticipate payroll gains of approximately 173,000 jobs per month over the next year.

## Monetary Policy and Interest rates

The Federal Reserve's Open Market Committee ("FOMC") lowered its target for the federal funds rate to a range of 0% to 0.25% during the fourth quarter of 2008 in an effort to stimulate the economy throughout the Great Recession. Target rates were held steady during 2009 and remained unchanged for several years. The accommodative monetary policy actions used to keep interest rates low included the purchase of agency mortgage-backed securities and long-term Treasury securities. These asset purchases were reduced by \$10 billion (in aggregate) per month beginning in January 2014, and the asset purchase program was officially terminated in October 2014. In December 2015, the FOMC increased the target range for the federal funds rate for the first time since the start of the Great Recession. The FOMC increased the range again in December 2016 and March 2017. In June 2017, the FOMC increased the target federal funds rate to a range of 1.0% to 1.25%, based on employment gains, inflation rates, household spending, and business investment. The FOMC elected to maintain this range at their September 2017 meeting, but voted to increase the range to 1.25% to 1.50% during the December 2017 meeting.

During the first quarter of 2018, Janet Yellen was replaced by Jay Powell as Chairman of the Federal Reserve. After increasing the target rate twice during the first quarter of 2018, ultimately ending March 2018 at a range of 1.50% to 1.75%, Federal Reserve officials voted unanimously in June 2018 to raise the target rate again to a range of 1.75% to 2.00%. In September, Fed officials announced their unanimous decision to once again raise the target rate to a range of 2% to 2.25%. This increase marks the first time since 2008 that the Fed has lifted its benchmark rate above 2%. Chairman Powell remarked that “These rates remain low . . . this gradual return to normal is helping to sustain this strong economy for the longer-run benefit of all Americans.” The Fed also dropped from its post-meeting statement language that had described its rate stance as “accommodative” since the recession. As the FOMC continues to target a nominal neutral rate of interest in the range of 2.25% to 3.5%, most Federal Reserve officials expect the committee to raise rates once more this year, by one percentage point next year, and at least once more in 2020, which would leave the benchmark range slightly above 3.25%.

The following was excerpted from the Federal Reserve’s September 26<sup>th</sup> press release:

*Consistent with its statutory mandate, the Committee seeks to foster maximum employment and price stability. The Committee expects that further gradual increases in the target range for the federal funds rate will be consistent with sustained expansion of economic activity, strong labor market conditions, and inflation near the Committee’s symmetric 2 percent objective over the medium term. Risks to the economic outlook appear roughly balanced.*

*In view of realized and expected labor market conditions and inflation, the Committee decided to raise the target range for the federal funds rate to 2 to 2-1/4 percent.*

*In determining the timing and size of future adjustments to the target range for the federal funds rate, the Committee will assess realized and expected economic conditions relative to its maximum employment objective and its symmetric 2 percent inflation objective. This assessment will take into account a wide range of information, including measures of labor market conditions, indicators of inflation pressures and inflation expectations, and readings on financial and international developments.*

## Summary and Outlook

The Great Recession reached its official end in mid-2009. The subsequent period of expansion was initially characterized by slow gains. A period of stronger and more consistent growth followed, and various measures are beginning to indicate that the economy is entering the latter stages of the current expansion. After a period of relative dormancy, inflation has accelerated in 2018, as the costs of goods increase amidst global trade concerns. Equity markets rebounded in the second quarter of 2018, as the major indices all posted gains, and this momentum continued into the third quarter as the major indices posted greater gains than observed in the previous quarter due to muted volatility and strong corporate earnings and growth. While trade conflicts between the U.S. and major trading partners continued, any downward price effects of these conflicts were confined to individual stocks and sub-sectors, as the broader markets were not heavily impacted. The unemployment rate has remained stable for several months in the range of 3.7%-4.0%, continually nearing all-time lows. Labor force participation remains low, but has been steady throughout the first three quarters of the year. Economic growth is expected to remain positive, though rising interest rates may dampen future growth and impact the housing market. GDP growth expectations from private economists surveyed by *The Wall Street Journal* are on the order of 2.9% and 2.5% for the fourth quarter of 2018 and first quarter of 2019, respectively, and 3.1% for all of 2018. This estimated growth of 3.1% compares to actual annual GDP growth of 2.6%, 1.6%, and 2.3% in 2015, 2016, and 2017, respectively. The Federal Reserve is planning to continue to reduce its balance sheet at a steady and predictable rate and to increase the federal fund target rate once more before the end of the year. Many aspects that could determine the future course of the U.S. economy remain uncertain at the end of the third quarter, including future inflation, the impact of trade agreements, and the potential effects of a flattening yield curve.



# Financial Analysis

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## Analysis of the Unadjusted Balance Sheets

The schedule presented below shows the subject business's year-end balance sheets for the period ended December 31, 2018.

Fixed assets include all of the company's equipment. At the date of valuation, they made up approximately 96.73% of the business's total assets.

	Dec 2018
<b>ASSETS</b>	
Cash	-
Accounts Receivable	-
Inventory	-
Other Current Assets	-
Total Current Assets	<u>-</u>
Fixed Assets	525,611
(Accumulated Depreciation)	(340,813)
Intangible Assets	-
(Accumulated Amortization)	-
Other Non-Current	6,250
Non-Operating Assets	-
Total Assets	<u><u>191,048</u></u>
<b>LIABILITIES &amp; EQUITY</b>	
Accounts Payable	-
Income Taxes	-
Short Term Notes Payable	-
Current Portion of LT Debt	-
Other Current Liabilities	-
Total Current Liabilities	<u>-</u>
Long Term Debt	-
Other Non-Current Liabilities	-
Non-Operating Liabilities	-
Total Liabilities	<u>-</u>
Equity	<u>191,048</u>
Total Liabilities & Equity	<u><u>191,048</u></u>

## Adjusted Balance Sheet

As part of my analysis of the fair market value I adjusted the business's assets and liabilities to their estimated fair market values as of December 31, 2018, the date of valuation. In addition, I have estimated the liquidation value of the tangible assets as of December 31, 2018. The following schedule presents the business's book value, adjustments to book value, adjusted book value, and estimated liquidation value as of December 31, 2018.

	Book Value 2018	Adjustments	Adjusted Book Value
<b>ASSETS</b>			
Cash	-		-
Accounts Receivable	-		-
Inventory	-		-
Other Current Assets	-		-
Total Current Assets	-	-	-
Fixed Assets	525,611		525,611
(Accumulated Depreciation)	(340,813)	170,406	(170,407)
Intangible Assets	-		-
(Accumulated Amortization)	-		-
Other Non-Current	6,250		6,250
Non-Operating Assets	-		-
Total Assets	191,048	170,406	361,454
<b>LIABILITIES &amp; EQUITY</b>			
Accounts Payable	-		-
Income Taxes	-		-
Short Term Notes Payable	-		-
Current Portion of LT Debt	-		-
Other Current Liabilities	-		-
Total Current Liabilities	-	-	-
Long Term Debt	-		-
Other Non-Current Liabilities	-		-
Non-Operating Liabilities	-		-
Total Liabilities	-	-	-
Equity	191,048	170,406	361,454
Total Liabilities & Equity	191,048	170,406	361,454

## Analysis of the Unadjusted Income Statements

As part of my analysis of the fair market value of a 100% interest Sample, Inc., I analyzed the business's unadjusted income statements for the year ended December 31, 2018.

	Dec 2018	Dec 2017	Dec 2016
Revenues less Discounts and Allowances	614,722	784,698	735,335
Cost of Goods Sold	118,826	212,345	165,113
Gross Profit	<u>495,896</u>	<u>572,353</u>	<u>570,222</u>
Operating Expenses			
Depreciation/Amortization	-	-	-
Officers' Compensation	62,500	130,000	134,480
Operating Lease and Rent	47,000	40,500	42,000
Expenses	352,099	298,362	294,205
Total Operating Expenses	<u>461,599</u>	<u>468,862</u>	<u>470,685</u>
Operating Profit	34,297	103,491	99,537
Other Income/Expenses			
Interest Expense	74	-	-
Other Income	-	-	-
Other Expense	-	-	-
Income Before Taxes	<u>34,223</u>	<u>103,491</u>	<u>99,537</u>
Income Taxes	-	-	-
Net Income	<u><u>34,223</u></u>	<u><u>103,491</u></u>	<u><u>99,537</u></u>

## Adjusted Income Statements

In my analysis of the value I reviewed the business's historical income statements for the 3 year period ending December 31, 2018. In order to determine the business's earnings capacity as of December 31, 2018, it was necessary to adjust its income statements for non-operating revenues and expenses, unusually high or low expenses, and discretionary expenses. This is known as normalizing the income statements. The following schedule shows the adjustments made to the business's income statements.

	Dec 2018	Dec 2017	Dec 2016
<b>Historic Income Before Taxes</b>	<u>34,223</u>	<u>103,491</u>	<u>99,537</u>
<b>Adjustments to Revenue</b>			
Revenues less Discounts and Allowances			
Other Income			
<b>Net Increase (Decrease) in Revenue</b>	<u>-</u>	<u>-</u>	<u>-</u>
<b>Adjustments to Expense</b>			
Cost of Goods Sold			
Depreciation/Amortization			
Officers' Compensation	17,500	(50,000)	(54,480)
Operating Lease and Rent Expenses			
Interest Expense			
Other Expense			
<b>Net Increase (Decrease) in Expense</b>	<u>17,500</u>	<u>(50,000)</u>	<u>(54,480)</u>
<b>Net Increase (Decrease) to Income</b>	<u>(17,500)</u>	<u>50,000</u>	<u>54,480</u>
Tax Effect			
<b>Net Increase (Decrease) to Income After Tax</b>	<u>(17,500)</u>	<u>50,000</u>	<u>54,480</u>
<b>Historic Tax Expense</b>	<u>-</u>	<u>-</u>	<u>-</u>
<b>Adjusted Net Income</b>	<u>16,723</u>	<u>153,491</u>	<u>154,017</u>

The resulting normalized net income for each of the periods in the analysis is presented in the following exhibit.

	Dec 2018	Dec 2017	Dec 2016
Revenues less Discounts and Allowances	614,722	784,698	735,335
Cost of Goods Sold	118,826	212,345	165,113
Gross Profit	<u>495,896</u>	<u>572,353</u>	<u>570,222</u>
Operating Expenses:			
Depreciation/Amortization	-	-	-
Officers' Compensation	80,000	80,000	80,000
Operating Lease and Rent	47,000	40,500	42,000
Expenses	<u>352,099</u>	<u>298,362</u>	<u>294,205</u>
Total Operating Expenses	<u>479,099</u>	<u>418,862</u>	<u>416,205</u>
Operating Profit	16,797	153,491	154,017
Other Income/Expenses			
Interest Expense	74	-	-
Other Income	-	-	-
Other Expense	-	-	-
Income Before Taxes	<u>16,723</u>	<u>153,491</u>	<u>154,017</u>
Income Taxes	-	-	-
Net Income	<u><u>16,723</u></u>	<u><u>153,491</u></u>	<u><u>154,017</u></u>

## Comparative Industry Analysis

The following schedule presents a comparative ratio analysis of Sample, Inc. and similarly sized firms operating in the same industry. Six categories of ratios (liquidity, coverage, leverage, operating, expense to revenue, and cash flow) have been used to compare the operating results of Sample, Inc. with that of the industry. The ratios of the subject company have been compared to the industry ratios as supplied by RMA, IRS.

	Lower RMA	Median RMA	Upper RMA	IRS	Adjusted 2018	Historic 2018
<b>LIQUIDITY RATIOS:</b>						
Current Ratio	0.40	1.2	3.2	2.3	-	-
Quick (Acid-Test) Ratio	0.3	1.0	2.8	2.2	-	-
Revenue/Accounts Receivable	8.5	17.0	999.9	9.6	-	-
Average Collection Period	<b>43</b>	<b>21</b>	-	<b>38</b>	-	-
Inventory Turnover	19.6	999.9	999.9	17.1	-	-
Days Inventory	<b>19</b>	-	-	<b>21</b>	-	-
COGS/Payable	10.7	30.2	999.9	4.2	-	-
Days Payable	<b>34</b>	<b>12</b>	-	<b>87</b>	-	-
Revenue/Working Capital (Days)	(12.6)	74.6	11.9	12.9	-	-
<b>COVERAGE RATIOS:</b>						
Times Interest Earned	0.3	3.5	17.2	188.2	226.99	463.47
NI+Non-Cash Expenditures / Current LTD	-	-	-	-	-	-
<b>LEVERAGE RATIOS:</b>						
Fixed Assets/Tangible Worth	(0.5)	2.4	0.3	0.5	0.98	0.97
Debt/Tangible Net Worth	(2.3)	33.6	0.8	0.2	-	-
Debt/Equity	(8.2)	(8.2)	(8.2)	0.1	-	-
<b>OPERATING RATIOS:</b>						
% Profits Before Taxes/Tangible Worth	0.00%	44.20%	140.40%	50.03%	4.63%	17.91%
% Profits Before Taxes/Total Assets	-3.50%	12.00%	43.70%	41.22%	4.63%	17.91%
Fixed Asset Turnover	5.6	12.9	45.3	7.0	1.73	3.33
Total Asset Turnover	2.8	3.7	6.4	3.1	1.70	3.22
<b>EXPENSE TO REVENUE RATIOS:</b>						
% Deprtn., Depltn., Amort./Revenue	8.70%	3.90%	1.40%	1.10%	0.00%	0.00%
% Officers' &/or Owners' Compensation/Revenue	14.60%	9.20%	5.30%	21.74%	13.01%	10.17%
<b>Cash Flow Ratios</b>						
Operating Cash Flow (OCF)						-
Funds Flow Coverage (FFC)						463.47
Cash Interest Coverage						379.01
Cash Current Debt Coverage						-
Capital Expenditure						-
Total Debt						-
Total Free Cash						0.73
Cash Flow Adequacy						-

# **Valuation Methods Accepted**

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## **Adjusted Book Value Method**

A business's adjusted book value is calculated by adjusting the book value of the company's assets and liabilities to their estimated fair market value as of the date of valuation. In a going concern business, fair market value usually is depreciated replacement cost. The adjusted book method is used primarily to value holding companies, companies that have no goodwill value, or companies whose value is primarily intrinsic to its assets. At December 31, 2018, Sample, Inc.'s adjusted book value was \$361,500.

# **Income Methods of Valuation**

## **Discounted Cash Flows Method**

### **Conceptual Basis**

The discounted cash flows analysis is an income method to valuation wherein the total fair market value of the business entity is calculated by discounting projected future cash flows back to the date of valuation. At the end of the projection period, a residual or terminal value is calculated and discounted to its present value at the date of valuation. The theory behind the discounted cash flows method is that an entity's value is equal to the present value of its expected future cash flows. It is used primarily when a business's short-term growth of the projected earnings stream is not expected to equal its expected long term growth rate and when a business's earnings and/or cash flows are the primary factors of value.

The steps involved in a discounted cash flows analysis are as follows:

1. Develop the pro-forma ongoing capacity base to be used for the projected cash flows.
2. Develop the method to be used to project future earnings or cash flows.
3. Develop a risk adjusted discount rate.
4. Discount to the date of valuation the projected cash flow streams using the discount rate.
5. Capitalize the terminal year's projected income into a residual value using the discount rate less the terminal growth rate.
6. Discount the residual value to its present value as of the date of valuation.
7. Sum the present values of the discounted cash flows and residual value.
8. Adjust for non-operating assets and/or liabilities, premiums and discounts to determine the fair market value for the entity at the date of valuation.



## Pro-Forma Base

In order to estimate the business's fair market value using the discounted cash flows method, it is necessary to determine Sample, Inc.'s cash flow base as of the date of valuation. The first step, adjusting the historical income statements to a normalized state, was completed in a previous section of this appraisal report. The second step, weighting the adjusted income statements and calculating the weighted-average base, is presented in the following schedule.

<b>EBIT</b>	<u>Dec 2018</u>	<u>Dec 2017</u>	<u>Dec 2016</u>
Adjusted EBT	16,723	153,491	154,017
Adjusted Interest Expense	<u>74</u>	<u>-</u>	<u>-</u>
	16,797	153,491	154,017
Weight	100	50	25
Ongoing Capacity	<u>75,455</u>		
<b>Selected Ongoing Capacity</b>	<u>75,500</u>		

## Selection of an Appropriate Discount Rate

Discount rates vary among particular types of businesses and from one period of time to another. Discount rates are expressed as a percentage and represent the risk of receiving the benefit stream over time. The more speculative or higher the risk, the higher the discount rate; conversely, the less speculative or lower the risk, the lower the discount rate.

The discount rate is built by summing up the following factors; the risk-free rate of return, the common stock equity risk premium, the smaller size premium, the industry risk premium and the company specific premium.

The risk-free rate of return includes the investors' required rate of return for the "riskless" use of their funds and a factor for inflation. The rate of return earned on long term U.S. Government bonds is considered a good proxy for the risk-free rate of return. As of December 31, 2018, the date of valuation, the rate of return on a twenty-year U.S. Government Treasury Bond was 2.9%. Therefore, the risk-free rate of return is 2.9%.

The common stock equity risk premium return is the additional rate of return required by investors in the market to compensate them for the additional risk in investing in a stock security as compared to a long term U.S. Government security. In the Ibbotson Associates' Stocks, Bonds, Bills and Inflation Yearbook, it is shown that, between 1926 and 2008, the average total returns earned on large corporate stocks has been approximately 7.4% higher than the average total annual returns for long term U.S. Government bonds. Therefore, in developing a discount rate, I added an equity risk premium of 7.4% to the risk-free rate of return.

The same Ibbotson Associates' study indicates that the smallest stocks traded on the New York Stock Exchange (defined as the lower 10 percent) earned an additional 4.0% premium over the larger stocks traded on the exchange. This small stock premium was added to the risk-free rate of return and the equity risk premium.

In the Ibbotson Associates' Stocks, Bonds, Bills and Inflation Yearbook, the risk of doing business in a particular industry has been calculated using a beta methodology to determine the risk that a particular industry has. This risk can be greater than the market as a whole (a plus number) or the risk can be less than the market as a whole (a negative number). According to Ibbotson Associates, the industry risk premium is 2.1%, therefore, I included this amount in the buildup of the discount rate.

Investing in a closely-held business involves additional elements of risk which must be compensated by offering a higher rate of return. The additional risk may be from specific risks associated with the company itself. Although there is little empirical evidence to assist the appraiser in determining this subjective risk premium, I have considered the following factors:

1. The business's financial ratios.

2. The long term outlook for the subject company's industry.
3. The depth of the subject company's management.
4. The degree of competition for the subject business's revenues.
5. The historical trend in the subject company's after tax earnings.
6. The geographic region the subject company conducts business in.

After considering the aforementioned factors, it is my opinion that the subjective risk premium for Sample, Inc. should be approximately 14.0%.

The result of adding these risk factors is a discount rate of 30.4%. The following exhibit shows the calculation for the capitalization rate for Sample, Inc. as of December 31, 2018.

Cost of equity			
Risk-free Rate of Return		2.9%	
Common Stock Equity Risk Premium		7.4%	
Small Stock Risk Premium		4.0%	
Plus/Minus Industry Risk Premium		2.1%	
Company Specific Premium			
Depth of Management			
Importance of Key Personnel	3.0%		
Stability of Industry	2.0%		
Diversification of Product Line			
Diversification of Customer Base			
Diversification/Stability of Suppliers			
Geographic Location			
Stability of Earnings	4.0%		
Earnings Margins	5.0%		
Financial Structure			
Total Company Specific Premium		<u>14.0%</u>	
Net discount rate		<u>30.4%</u>	
Adjust from After Tax Rate to Pretax Economic Stream		0.0%	
Adjust from Cash Flow Rate to EBIT Economic Stream		<u>0.0%</u>	
Discount Rate			<u><u>30.4%</u></u>
Selected Discount Rate			<u><u>30.4%</u></u>

### Projected Earnings Method

The next step is to determine the applicable method for forecasting the future earnings.

<b>Dollar Growth</b>	Dec 2019	Dec 2020	Dec 2021
Enter Projected Stream In Dollars	<u>70,000</u>	<u>100,000</u>	<u>135,000</u>

### Cash Flows to be Discounted

The following exhibit shows the business's estimated projected earnings for the 3 years after the date of valuation discounted to their present values as of December 31, 2018. In addition, the last year's projected earnings were capitalized into a residual value and discounted to its present value as of December 31, 2018.

Forecast Period	Projected Economic Stream	Growth Rate	Factor At 30.4% Disc Rate	Terminal Value	Discounted Value
2019	70,000		76.687%		53,681
2020	100,000	42.9%	58.809%		58,809
2021	135,000	35.0%	45.099%		60,884
2022-forever	137,700	2.0%	45.099%	484,859	218,667
Total Discounted Cash Flows					<u>392,041</u>
Indicated Value					<u>593,527</u>
Selected Value					<u>593,500</u>

## **Market Approach - Guideline Companies Methods**

### **Conceptual Basis**

Market based valuation methods use multiples that are extrapolated from BizComps company data to derive the fair market value for the subject business. The theory behind this method is that the public market determines what price is an acceptable return for the earnings stream, gross revenue, or book value for a company. If that company is similar to the subject company then that multiple can be applied as a proxy for the fair market value of the subject company.

### **Identification of Privately-traded Guideline Companies**

The privately-traded guideline company method uses valuation ratios of "comparable" guideline companies to determine the operating value of the subject company. My research began with obtaining information on all privately-traded companies that had the same standard industrial classification code (SIC) as Sample, Inc.. After reviewing financial and non-financial information for each of the privately-traded companies with a 332710 SIC code, I determined that there existed companies that were similar and comparable to Sample, Inc. and could be used as privately-traded guideline companies.

## Price to Seller's Discretionary Earnings

The theory of the price to seller's discretionary earnings method is that the market determines the appropriate price to seller's discretionary earnings multiple to apply to the subject company's weighted discretionary earnings. The first step in applying this method is to determine the weighted discretionary earnings.

	Dec 2018	Dec 2017	Dec 2016
Adjusted Pre-Tax Income	16,723	153,491	154,017
Adjusted Interest Expense	74	-	-
Adjusted Depreciation/Amortization	-	-	-
Adjusted Officers' Compensation	-	-	-
<b>Seller's Discretionary Earnings</b>	<u>16,797</u>	<u>153,491</u>	<u>154,017</u>
Weight on Seller's Discretionary Cash Flow	100	50	25
<b>Weighted Average BIZCOMPS SDE Base</b>	<u><u>75,455</u></u>		
<b>Selected BIZCOMPS SDE Base</b>	<u><u>75,500</u></u>		

When using this method, it is important to adjust the price to seller's discretionary earnings ratios for the differences in size, product diversification, and financial strength between the privately-held subject company and the guideline companies. After reviewing the guideline companies' price to seller's discretionary earnings ratios and making the appropriate adjustments, the appropriate P/SDE ratios to apply to Sample, Inc.'s weighted seller's discretionary earnings as of December 31, 2018 are shown in the table below. The following table summarizes the calculation of the business entity using price to earnings of traded companies.

	<u>BIZCOMPS</u>
Economic Base	75,500
P/E Multiple	3.08
Sub-Total	<u>232,540</u>
Adjustment	
Sub-Total	<u>232,540</u>
Excess/Non-Operating Assets	<u>201,486</u>
Indicated Value	<u><u>434,026</u></u>
Selected Value	<u><u>434,000</u></u>

## Price to Revenues

The percentage of revenues method is used when the subject company's cost structure approximates that of the privately-traded guideline companies. The first step in applying this method is to determine the weighted revenue.

	Dec 2018	Dec 2017	Dec 2016
Adjusted Revenue	614,722	784,698	735,335
Weight on Revenue	100	50	25
<b>Weighted Average Revenue</b>	<b><u>680,517</u></b>		
<b>Selected Revenue Base</b>	<b><u>680,500</u></b>		

When using this method, it is important to adjust the price to revenue ratios for the differences in size, product diversification, and financial strength between the privately-held subject company and privately-traded guideline companies. After reviewing the privately-traded guideline companies' price to revenues ratios and making the appropriate adjustments, the appropriate P/R ratios to apply to Sample, Inc.'s weighted revenue as of December 31, 2018 are shown in the table below. The following table summarizes the calculation of the business entity using price to revenues multiple of publicly traded companies.

	<u>BIZCOMPS</u>
Revenue Base	680,500
P/R Multiple	0.58
Sub-Total	<u>394,690</u>
Adjustment	
Sub-Total	<u>394,690</u>
Excess/Non-Operating Assets	<u>201,486</u>
Indicated Value	<u>596,176</u>
Selected Value	<u>596,200</u>

## Summary of Valuation Methods

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In my evaluation of the fair market value of a 100% interest in Sample, Inc. as of December 31, 2018, I calculated and analyzed a variety of valuation methods. The following exhibit lists the various valuation methodologies and the weighting I assigned to each method.

Going Concern Value	361,500	10%
DCF Indicated Value	593,500	26%
Market Data P/SDE Indicated Value	434,000	29%
Market Data P/R Indicated Value	596,200	36%
Calculated Weighted Average Conclusion of Value	<u>525,034</u>	<u>100%</u>
Selected Conclusion of Value	<u>525,000</u>	

## Value Conclusion

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Based on my analysis of Sample, Inc. and all of the factors affecting its value, it is my opinion that the fair market value of a 100% interest in the business as of December 31, 2018 is \$525,000.

Conclusion Of Total Value	525,000
Total Shares Outstanding	1,000
Value Per Share	525.00
Number Of Shares Being Valued	<u>1,000</u>
Value of Interest Appraised	<u><u>525,000</u></u>
Rounded	<u><u>525,000</u></u>





# Certification of Appraiser

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I certify that, to the best of my knowledge and belief:

1. The statements of fact contained in this report are true and correct.
2. The reported analyses, opinions, and conclusions are limited only by the reported assumptions and limiting conditions and are my personal, impartial, and unbiased professional analyses, opinions, and conclusions.
3. I have no (or the specified) present or prospective interest in the property that is the subject of this report, and I have no (or the specified) personal interest with respect to the parties involved.
4. I have no bias with respect to the property that is the subject of this report or to the parties involved with this assignment.
5. My engagement in this assignment was not contingent upon developing or reporting predetermined results.
6. My compensation for completing this assignment is not contingent upon the development or reporting of a predetermined value or direction in value that favors the cause of the client, the amount of the value opinion, the attainment of a stipulated result, or the occurrence of a subsequent event directly related to the intended use of this appraisal.
7. My analyses, opinions, and conclusions were developed, and this report has been prepared, in conformity with the Uniform Standards of Professional Appraisal Practice.
8. No one provided significant business appraisal assistance to the person signing this certification. (If there are exceptions, the name of each individual providing significant business appraisal assistance must be stated.)

## Appendix B: Limiting Conditions

Preparation of this report involved the review of substantial documentation with respect to the Company, the industry and the national economy. Sources of information related to the industry and the national economy are cited specifically at appropriate sections of the report.

In all cases, I have relied upon the referenced information without independent verification. This report is, therefore, dependent upon the information provided. A material change in critical information relied upon in this report would be cause for a reassessment to determine the effect, if any, upon my conclusion.

Users of this business valuation report should be aware that business valuations are based on future earnings potential that may or may not materialize. Therefore, the actual results achieved during the projection period will vary from the projections utilized in this valuation, and the variations may be material.

Some assumptions invariably will not materialize, and unanticipated events and circumstances may occur. Therefore, the actual performance in any areas forecasted/projected will vary from the forecast/projection, and the variations may be material. Business Matter Valuation will not express any form of assurance on the likelihood of achieving the forecast/projection or on the reasonableness of the used assumptions. Any such forecast/projection is presented as part of the appraisal and is not intended to be used separately.

The value premise(s) cited in this report are fundamental to the value opinions rendered herein, and I reserve the right to reconsider such premise(s) should subsequent or additional information be discovered, although no such obligation exists.

We have relied upon the representations of the owners, management and other third parties concerning the value and useful condition of all equipment, real estate, investments used in the business, and any other assets or liabilities except as specifically stated to the contrary in this report. I have not attempted to confirm whether or not all assets of the business are free and clear of liens and encumbrances, or that Sample, Inc. has good title to all assets.

The estimate of value included in this report assumes that Sample, Inc. will maintain the character and integrity of the company through any sale, reorganization or reduction of any owner's/manager's participation in the existing activities of the company.

Since neither Sample, Inc. management nor advisors have advised me otherwise, I assume that there is full compliance with all applicable federal, state, and local laws and regulations unless the lack of compliance is stated, defined, and considered in the appraisal report.

Public information, purchased private information and industry statistical information are from sources I deem to be reliable; however, I make no representation as to the accuracy or completeness of such information, and have accepted the information without further verification.

This report and its related calculations were prepared using various software applications potentially including Microsoft Word and Microsoft Excel, Express Business Valuation, and/or various Internet-related software, third-party data (as indicated) and information.

I assume no responsibility for the legal description or matters including legal or title considerations. Title to the subject assets, properties, or business interests is assumed to be good and marketable as represented by owners, management and advisors of Sample, Inc. unless otherwise stated.

I assume no hidden or unapparent conditions regarding the subject assets, properties or business interests.

Unless otherwise stated in this report, I did not observe, and I have no knowledge of, the existence of hazardous materials with regard to the subject assets, properties, or business interests. However, I am not qualified to detect such substances. I assume no responsibility for such conditions or for any expertise required to discover them.

No opinion, counsel or interpretation is intended in matters that require legal or other appropriate professional advice. It is assumed that such opinions, counsel or interpretations have been or will be obtained from the appropriate professional sources.

The analyses, opinions, and conclusions presented in this report apply to this engagement only and may not be used out of the context presented herein. This report is valid only for the effective date(s) specified and

only for the purpose(s) specified herein.

Although I have exerted considerable diligence and applied my best efforts in constructing this document, immaterial anomalies, if any, may arise. Even so, I am confident that my overall conclusion would still fall within a materially consistent conclusion.

While the client has not informed Sample, Inc. of any intent to do so, any third parties to whom this report is shown may be assured that this report, while performed in the employ of the client, was materially prepared on a non-advocacy basis. Any third persons, however, are cautioned that Business Matter Valuation has no duty to you and, therefore, no warranty is expressed or implied. Nothing in this report is intended to replace your independent sole judgment, due diligence, or decision to seek professional legal, accounting, or valuation counsel.

This report has been prepared solely for the use of the party or parties named and specifically for the purposes set out therein. In accordance with normal practice, I hereby disclaim liability to any other person. Any other person should not rely upon the information and conclusions reached nor should any statement in this report be used for any other purpose without written consent from Sample, Inc..

The statements and opinions given in this report are given in good faith and in the belief that such statements are not false or misleading. In preparing this report I have relied upon information believed to be reliable and accurate provided by the owners, management and advisors of Sample, Inc. and other sources. I have no reason to believe that any material facts have been withheld from me, nor do I warrant that my investigation has revealed all of the matters in which an audit or more extensive examination might disclose.

This valuation reflects facts and conditions existing at the date of this valuation. Subsequent events have not been considered, and I have no obligation to update my report for such events and conditions.

Business Matter Valuation does not purport to be a guarantor of value. Valuation of closely held companies is an imprecise science, with value being a question of fact, and reasonable people can differ in their estimates of value. Business Matter Valuation, however, performed conceptually sound and commonly accepted methods and procedures of valuation in determining the estimate of value included in this report. Business Matter Valuation is not liable for any use, reliance, financial applications, report distribution or other utilization of any kind, by any party not having written authorization from Business Matter Valuation.

The appraised estimate of fair market value in this report is based on the definition applied throughout such report. An actual transaction in the shares may be completed at a value higher, lower or equal to the value rendered herein. I make no guarantee of any kind with regard to the likely or ultimate amount that may result in any future transaction.

The opinion(s) offered in this report do not constitute an offer to buy or sell the shares.

The valuation analyst, by reason of performing this valuation and preparing this report, is not to be required to give expert testimony nor to be in attendance in court or at any government, professional or regulatory hearing, including IRS matters with reference to the matters contained herein, unless prior written arrangements have been made with Business Matter Valuation regarding such additional engagement as to the timing, fee .

## Appendix F: Glossary

This Glossary was developed jointly by representatives of the American Institute of CPAs, the American Society of Appraisers, the Canadian Institute of Business Valuers, the Institute of Business Appraisers, and the National Association of Certified Valuation Analysts.

**Adjusted Book Value** - the value that results after one or more asset(s) or liability amounts are added, deleted, or changed from their respective financial statement amounts.

**Appraisal** - See Valuation.

**Appraisal Approach** - See Valuation Approach.

**Appraisal Date** - See Valuation Date.

**Appraisal Method** - See Valuation Method.

**Appraisal Procedure** - See Valuation Procedure.

**Asset (Asset-Based) Approach** - a general way of determining a value indication of a business, business ownership interest, or security by using one or more methods based on the value of the assets of that business net of liabilities.

**Benefit Stream** - any level of income, cash flow, or earnings generated by an asset, group of assets, or business enterprise. When the term is used, it should be supplemented by a definition of exactly what it means in the given valuation context.

**Beta** - a measure of systematic risk of a security; the tendency of a security's returns to correlate with swings in the broad market.

**Blockage Discount** - an amount or percentage deducted from the current market price of a publicly traded security to reflect the decrease in the per share value of a block of those securities that is of a size that could not be sold in a reasonable period of time given normal trading volume.

**Business** - see Business Enterprise.

**Business Enterprise** - a commercial, industrial, service, or investment entity, or a combination thereof, pursuing an economic activity.

**Business Valuation** - the act or process of determining the value of a business enterprise or ownership interest therein.

**Capital Asset Pricing Model (CAPM)** - a model in which the cost of capital for any security or portfolio of securities equals a risk free rate plus a risk premium that is proportionate to the systematic risk of the security or portfolio.

**Capitalization** - a conversion of a single period stream of benefits into value.

**Capitalization Factor** - any multiple or divisor used to convert anticipated benefits into value.

**Capitalization Rate** - any divisor (usually expressed as a percentage) used to convert anticipated benefits into value.

**Capital Structure** - the composition of the invested capital of a business enterprise; the mix of debt and equity financing.

**Cash Flow** - cash that is generated over a period of time by an asset, group of assets, or business enterprise. It may be used in a general sense to encompass various levels of specifically defined cash flows. When the term is used, it should be supplemented by a qualifier (for example, "discretionary" or "operating") and a definition of exactly what it means in the given valuation context.

**Control** - the power to direct the management and policies of a business enterprise.

**Control Premium** - an amount (expressed in either dollar or percentage form) by which the pro rata value (calculated, in proportion value) of a controlling interest exceeds the pro rata value of a noncontrolling interest in a business enterprise, that reflects the power of control.

**Cost Approach** - a general way of estimating a value indication of an individual asset by quantifying the amount of money that would be required to replace the future service capability of that asset.

**Cost of Capital** - the expected rate of return (discount rate) that the market requires in order to attract funds to a particular investment.

**Discount** - a reduction in value or the act of reducing value.

**Discount for Lack of Control** - an amount or percentage deducted from the pro rata share of value of one hundred percent (100%) of an equity interest in a business to reflect the absence of some or all of the powers of control.

**Discount for Lack of Marketability** - an amount or percentage deducted from the value of an ownership interest to reflect the relative absence of marketability.

**Discount Rate** - a rate of return (cost of capital) used to convert a monetary sum, payable or receivable in the future, into present value.

**Economic Life** - the period of time over which property may generate economic benefits.

**Effective Date** - See Valuation Date.

**Enterprise** - See Business Enterprise.

**Equity Net Cash Flows** - those cash flows available to pay out to equity holders (in the form of dividends) after funding operations of the business enterprise, making necessary capital investments, and reflecting increases or decreases in debt financing.

**Equity Risk Premium** - a rate of return in addition to a risk free rate to compensate for investing in equity instruments because they have a higher degree of probable risk than risk free instruments (a component of the cost of equity capital or equity discount rate).

**Excess Earnings** - that amount of anticipated benefits that exceeds a fair rate of return on the value of a selected asset base (often net tangible assets) used to generate those anticipated benefits.

**Excess Earnings Method** - a specific way of determining a value indication of a business, business ownership interest, or security determined as the sum of the value of the assets obtained by capitalizing excess earnings and the value of the selected asset base. Also frequently used to value intangible assets. See Excess Earnings.

**Fair Market Value** - the price, expressed in terms of cash equivalents, at which property would change hands between a hypothetical willing and able buyer and a hypothetical willing and able seller, acting at arm's length in an open and unrestricted market, when neither is under compulsion to buy or sell and when both have reasonable knowledge of the relevant facts. {NOTE: In Canada, the term "price" should be replaced with the term "highest price".}

**Forced Liquidation Value** - liquidation value at which the asset or assets are sold as quickly as possible, such as at an auction.

**Going Concern** - an ongoing operating business enterprise.

**Going Concern Value** - the value of a business enterprise that is expected to continue to operate into the future. The intangible elements of Going Concern Value result from factors such as having a trained work force, an operational plant, and the necessary licenses, systems, and procedures in place.

**Goodwill** - that intangible asset arising as a result of name, reputation, customer loyalty, location, products, and similar factors not separately identified.

**Goodwill Value** - the value attributable to goodwill.

**Income (Income-Based) Approach** - a general way of determining a value indication of a business, business ownership interest, security, or intangible asset using one or more methods that convert anticipated benefits into a present single amount.

**Intangible Assets** - nonphysical assets (such as franchises, trademarks, patents, copyrights, goodwill,

equities, mineral rights, securities and contracts as distinguished from physical assets) that grant rights, privileges, and have economic benefits for the owner.

**Invested Capital** - the sum of equity and debt in a business enterprise. Debt is typically long term liabilities or the sum of short term interest bearing debt and long term liabilities. When the term is used, it should be supplemented by a definition of exactly what it means in the given valuation context.

**Invested Capital Net Cash Flows** - those cash flows available to pay out to equity holders (in the form of dividends) and debt investors (in the form of principal and interest) after funding operations of the business enterprise and making necessary capital investments.

**Investment Risk** - the degree of uncertainty as to the realization of expected returns.

**Investment Value** - the value to a particular investor based on individual investment requirements and expectations. {NOTE: In Canada, the term used is "Value to the Owner."}

**Key Person Discount** - an amount or percentage deducted from the value of an ownership interest to reflect the reduction in value resulting from the actual or potential loss of a key person in a business enterprise.

**Levered Beta** - the beta reflecting a capital structure that includes debt.

**Liquidity** - the ability to quickly convert property to cash or pay a liability.

**Liquidation Value** - the net amount that can be realized if the business is terminated and the assets are sold piecemeal. Liquidation can be either "orderly" or "forced".

**Majority Control** - the degree of control provided by a majority position.

**Majority Interest** - an ownership interest greater than fifty percent (50%) of the voting interest in a business enterprise.

**Market (Market-Based) Approach** - a general way of determining a value indication of a business, business ownership interest, security, or intangible asset by using one or more methods that compare the subject to similar businesses, business ownership interests, securities, or intangible assets that have been sold.

**Marketability** - the ability to quickly convert property to cash at minimal cost.

**Marketability Discount** - See Discount for Lack of Marketability.

**Minority Discount** - a discount for lack of control applicable to a minority interest.

**Minority Interest** - an ownership interest less than fifty percent (50%) of the voting interest in a business enterprise.

**Net Book Value** - with respect to a business enterprise, the difference between total assets (net of accumulated depreciation, depletion, and amortization) and total liabilities of a business enterprise as they appear on the balance sheet (synonymous with Shareholder's Equity); with respect to an intangible asset, the capitalized cost of an intangible asset less accumulated amortization as it appears on the accounting books of the business enterprise.

**Net Cash Flow** - a form of cash flow. When the term is used, it should be supplemented by a qualifier (for example, "Equity" or "Invested Capital") and a definition of exactly what it means in the given valuation context.

**Net Tangible Asset Value** - the value of the business enterprise's tangible assets (excluding excess assets and nonoperating assets) minus the value of its liabilities. {NOTE: In Canada, tangible assets also include identifiable intangible assets.}

**Nonoperating Assets** - assets not necessary to ongoing operations of the business enterprise. {NOTE: In Canada, the term used is "Redundant Assets."}

**Orderly Liquidation Value** - liquidation value at which the asset or assets are sold over a reasonable period of time to maximize proceeds received.

**Premise of Value** - an assumption regarding the most likely set of transactional circumstances that may be applicable to the subject valuation; e.g. going concern, liquidation.

**Portfolio Discount** - an amount or percentage that may be deducted from the value of a business enterprise to reflect the fact that it owns dissimilar operations or assets that may not fit well together.

**Rate of Return** - an amount of income (loss) and/or change in value realized or anticipated on an investment, expressed as a percentage of that investment.

**Redundant Assets** - {NOTE: In Canada, see “Nonoperating Assets.”}

**Report Date** - the date conclusions are transmitted to the client.

**Replacement Cost New** - the current cost of a similar new property having the nearest equivalent utility to the property being valued.

**Reproduction Cost New** - the current cost of an identical new property.

**Residual Value** - the prospective value as of the end of the discrete projection period in a discounted benefit streams model.

**Risk Free Rate** - the rate of return available in the market on an investment free of default risk.

**Risk Premium** - a rate of return in addition to a risk free rate to compensate the investor for accepting risk.

**Rule of Thumb** - a mathematical relationship between or among variables based on experience, observation, hearsay, or a combination of these, usually applicable to a specific industry.

**Special Interest Purchasers** - acquirers who believe they can enjoy post-acquisition economies of scale, synergy, or strategic advantages by combining the acquired business interest with their own.

**Standard of Value** - the identification of the type of value being utilized in a specific engagement; e.g. fair market value, fair value, investment value.

**Sustaining Capital Reinvestment** - the periodic capital outlay required to maintain operations at existing levels, net of the tax shield available from such outlays.

**Systematic Risk** - the risk that is common to all risky securities and cannot be eliminated through diversification. When using the capital asset pricing model, systematic risk is measured by beta.

**Terminal Value** - See Residual Value.

**Unlevered Beta** - the beta reflecting a capital structure without debt.

**The Risk Management Association** – Formerly know as Robert Morris Associates .

**Unsystematic Risk** - the portion of total risk specific to an individual security that can be avoided through diversification.

**Valuation** - the act or process of determining the value of a business, business ownership interest, security, or intangible asset.

**Valuation Approach** - a general way of determining a value indication of a business, business ownership interest, security, or intangible asset using one or more valuation methods.

**Valuation Date** - the specific point in time as of which the valuator’s opinion of value applies (also referred to as “Effective Date” or “Appraisal Date”).

**Valuation Method** - within approaches, a specific way to determine value.

**Valuation Procedure** - the act, manner, and technique of performing the steps of an appraisal method.

**Valuation Ratio** - a fraction in which a value or price serves as the numerator and financial, operating, or physical data serve as the denominator.

**Value to the Owner** - {NOTE: In Canada, see Investment Value.}

**Weighted Average Cost of Capital (WACC)** - the cost of capital (discount rate) determined by the weighted average at market value of the cost of all financing sources in the business enterprise’s capital structure.



