ACORN ENERGY, INC.
Form 10-K
March 27, 2019

UNITED STATES

SECURITIES AND EXCHANGE COMMISSION

WASHINGTON, D.C. 20549

FORM 10-K

ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE

SECURITIES EXCHANGE ACT OF 1934

For the fiscal year ended **December 31, 2018** Commission file number: **001-33886**

ACORN ENERGY, INC.

(Exact name of registrant as specified in charter)

Delaware	**22-2786081**
(State or other jurisdiction of incorporation or organization)	(I.R.S. Employer Identification No.)
1000 N West Street, Suite 1200,	**19801**
Wilmington, Delaware (Address of principal executive offices)	(Zip Code)

410-654-3315

Registrant's telephone number, including area code

Securities registered pursuant to Section 12(b) of the Act:

Title of each class Name of each exchange on which registered
None

Securities registered pursuant to Section 12(g) of the Act:

Common Stock, par value $.01 per share

(Title of class)

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. Yes [ ] No [X]

Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Exchange Act. Yes [ ] No [X]

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes [X] No [ ]

Indicate by check mark whether the registrant has submitted electronically every Interactive Data File required to be submitted pursuant to Rule 405 of Regulation S-T during the preceding 12 months (or for such shorter period that the registrant was required to submit such files). Yes [X] No [ ]

Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K is not contained herein, and will not be contained, to the best of registrant’s knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K. [X]

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, a smaller reporting company, or emerging growth company. See the definitions of “large accelerated filer,” “accelerated filer,” “smaller reporting company,” and “emerging growth company” in Rule 12b-2 of the Exchange Act. (Check one):

Large accelerated filer [ ] Accelerated filer [ ] Non-accelerated filer [ ]

Smaller reporting company [X] Emerging growth company [ ]

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 13(a) of the Exchange Act. [ ]

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Act). Yes [ ] No [X]

As of the lastday of the second fiscal quarter of 2018, the aggregate market value of the registrant's common stock held by non-affiliates of the registrant was approximately $8.4 million based on the closing sale price on that date as reported on the OTCQB marketplace. As of March 22, 2019 there were 29,555,786 shares of Common Stock, $0.01 par value per share, outstanding.

DOCUMENTS INCORPORATED BY REFERENCE:

None.

TABLE OF CONTENTS

		PAGE
PART I		
Item 1.	BUSINESS	3
Item 1A.	RISK FACTORS	8
Item 1B.	UNRESOLVED STAFF COMMENTS	16
Item 2.	PROPERTIES	17
Item 3.	LEGAL PROCEEDINGS	18
PART II		
Item 5.	MARKET FOR REGISTRANT'S COMMON EQUITY, RELATED STOCKHOLDER MATTERS AND ISSUER PURCHASES OF EQUITY SECURITIES	19
Item 7.	MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS	20
Item 7A.	QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK	30
Item 8.	FINANCIAL STATEMENTS AND SUPPLEMENTARY DATA	31
Item 9.	CHANGES IN AND DISAGREEMENTS WITH ACCOUNTANTS ON ACCOUNTING AND FINANCIAL DISCLOSURE	32
Item 9A	CONTROLS AND PROCEDURES	32
Item 9B.	OTHER INFORMATION	33
PART III		
Item 10.	DIRECTORS, EXECUTIVE OFFICERS AND CORPORATE GOVERNANCE	34
Item 11.	EXECUTIVE COMPENSATION	37

Item 12. SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT AND RELATED STOCKHOLDER MATTERS 43

Item 13. CERTAIN RELATIONSHIPS, RELATED TRANSACTIONS AND DIRECTOR INDEPENDENCE 45

Item 14. PRINCIPAL ACCOUNTING FEES AND SERVICES 47

PART IV

Item 15. EXHIBITS AND FINANCIAL STATEMENT SCHEDULES 48

Item 16. FORM 10-K SUMMARY 48

Certain statements contained in this report are forward-looking in nature. These statements can be identified by the use of forward-looking terminology such as “believes”, “expects”, “may”, “will”, “should” or “anticipates”, or the negatives thereof, or comparable terminology, or by discussions of strategy. You are cautioned that our business and operations are subject to a variety of risks and uncertainties and, consequently, our actual results may materially differ from those projected by any forward-looking statements. Certain of such risks and uncertainties are discussed below under the heading “Item 1A. Risk Factors.”

OmniMetrix®, OmniView®, ScopeView™, TrueGuard™ and *TrueShield™* are trademarks of OmniMetrix, LLC.

PART I

ITEM 1. BUSINESS

OVERVIEW

Acorn Energy, Inc. ("Acorn" or "the Company") is a holding company focused on technology driven solutions for energy infrastructure asset management. Following the sale of our remaining interests in DSIT Solutions Ltd. ("DSIT") in February 2018 (see below), we provide the following services and products through our OmniMetrix™, LLC ("OmniMetrix") subsidiary:

Power Generation ("PG") monitoring. OmniMetrix's PG activities provide wireless remote monitoring and control systems and services for critical assets as well as Internet of Things applications.

Cathodic Protection ("CP") monitoring. OmniMetrix's CP activities provide for remote monitoring of cathodic protection systems on gas pipelines for gas utilities and pipeline companies.

During 2018, each of our PG and CP activities represented a reportable segment.

On January 28, 2016, we entered into a Share Purchase Agreement for the sale of a portion of our interest in DSIT to Rafael Advanced Defense Systems Ltd. ("Rafael"), a major Israeli defense company (the "2016 DSIT Transaction"). Following the closing of the transaction on April 21, 2016, we owned approximately 41.2% of DSIT and had limited representation on its Board. Accordingly, from that date, we no longer consolidated the results of DSIT and instead reported DSIT's results on the equity method. Consequently, from April 21, 2016, we no longer reported segment information with respect to DSIT's Energy & Security Sonar Solutions segment or its other activities.

On January 18, 2018, we entered into a Share Purchase Agreement for the sale of our remaining interest in DSIT to an Israeli investor group (the "2018 DSIT Transaction"). Following the closing of the transaction on February 14, 2018, we no longer reported DSIT's results on the equity method.

DSIT provides sonar and acoustic related solutions for energy, defense and commercial markets with a focus on underwater site security for strategic energy installations and other advanced sonar and acoustic systems for surface ships and real-time embedded hardware and software development and production.

We continually evaluate opportunities related to our activities and our goal is to maximize shareholder value and position our holdings for a strategic event, which may include co-investment by one or more third parties and/or a synergistic acquisition of another company.

FINANCIAL RESULTS BY COMPANY

The following tables show, for the periods indicated, the financial results (dollar amounts in thousands) attributable to each of our consolidated companies.

	Year ended December 31, 2018					
	OmniMetrix		Acorn		Total Continuing Operations	
Revenues	$5,087		$—		$ 5,087	
Cost of Sales	1,965		—		1,965	
Gross profit	3,122		—		3,122	
Gross profit margin	61	%			61	%
R& D expenses	542		—		542	
Selling, general and administrative expenses	2,696		1,260		3,956	
Operating loss	$(116	)	$(1,260)		$ (1,376	)

	Year ended December 31, 2017		
	OmniMetrix	Acorn	Total Continuing Operations
Revenues	$4,350	$—	$ 4,350
Cost of Sales	1,903	—	1,903
Gross profit	2,447	—	2,447
Gross profit margin	56 %		56 %
R& D expenses	518	—	518
Selling, general and administrative expenses	2,712	1,128	3,840
Operating loss	$(783)	$(1,128)	$ (1,911)

OMNIMETRIX – POWER GENERATION MONITORING AND CONTROL AND CATHODIC PROTECTION MONITORING AND CONTROL

OmniMetrix LLC is a Georgia limited liability company established in 1998 based in Buford, Georgia that develops and markets wireless remote monitoring and control systems and services for multiple markets in the Internet of Things ecosystem: critical assets (including stand-by power generators, compressors, batteries, pumps, pumpjacks, light towers, turbines, as well as other industrial equipment) as well as cathodic protection for the pipeline industry (gas utilities and pipeline companies). Acorn owns 80% of OmniMetrix with one of Acorn's former directors owning the remaining 20%.

Products & Services

In the PG segment, OmniMetrix sells a line of devices and services built on its baseline TrueGuard wireless remote monitor. This device is broadly applicable across all brands and models of emergency power generators and industrial engine applications. The TrueGuard product family connects directly to the engine's control panel, and captures all data flowing through the control panel. As a result, the product provides the ability to identify whether an emergency generator is capable of operating as expected. In 2012, OmniMetrix designed and gained approval from PTCRB, the certification forum of North American cellular operators, and AT&T for a new 4G data radio module, replacing the 2G technology used since 2007. In 2016 OmniMetrix began shipping product with LTE-enabled radios. This new device includes GPS functionality and data storage at the device for the first time, enabling OmniMetrix to bring a mobile asset tracking functionality into the market, with primary focus on mobile generators and related equipment.

In the CP segment, OmniMetrix offers two primary product lines; the Hero Rectifier Monitor and the Patriot Test Station Monitor. Both of these products are used to monitor cathodic protection systems, a process which reduces rust and corrosion on the steel pipes used to transport natural gas underground. As the name suggests, the Hero Rectifier Monitor product monitors the operation of the rectifiers, which are a critical component in the effort to prevent corrosion, and are also the most common point of failure in the corrosion system. The Patriot Test Station Monitor is

also used to provide data points along the pipeline segment powered by the rectifier.

In October 2018 OmniMetrix began beta testing a new product, AIRGuard, to remotely monitor and control industrial air compressors. We are currently exploring the opportunity in the industrial air compressor market.

Customers and Markets

At its core, the OmniMetrix PG product can remotely monitor and control any industrial engine application, which includes engines, standby generators, compressors, batteries, turbines, pumps, and other equipment. Early in the company's history, a strategic decision was made to focus primarily on the standby power generation market. Recently, the company has expanded its focus to add several additional applications where it sees demand.

Following the advent of the Internet of Things (IoT) ecosystem, whereby multiple sensing and monitoring devices are aggregated into one simple dashboard for customers, many large companies, including Google, Comcast, Verizon, AT&T and others are entering this market and offering similar platforms. Standby generator monitoring is rapidly becoming part of this ecosystem.

As OmniMetrix can monitor and control all major brands of standby generators, it is well-positioned to compete in this market.

In the first stages of OmniMetrix's PG product and market development, relatively unsophisticated generator controls and early generation cellular and satellite communication processes limited the applications to alarm delivery. Customers were notified that some event had taken place after the fact. There was no diagnostic data opportunity, but service organizations could, at best, practice a proactive service approach.

With the advent of second-generation cellular systems and newer, computerized engine controls, OmniMetrix migrated to a design point of collecting large amounts of performance data from the remote machinery, allowing service organizations to perform diagnostics on remote equipment before dispatching service. This was the beginning of the OmniMetrix SmartService™ Program. It allowed the service organization to put the right person in the right truck with the right parts to effect a one-trip or a zero-trip solution. At this phase, service organizations could be efficient, as well as proactive, in their operations. They could also manage more customers by using remote monitoring. Customers have provided OmniMetrix feedback telling how customer service teams are able to work "smarter" and more efficiently by going directly to sites with problems, thus increasing the value of their businesses.

OmniMetrix is now in its third phase of evolution, maturing the high-performance data collection design point into the first provider offering of automated prognostic solutions. As most generator failures are the result of consumables, and as those consumables can be monitored, the consumption trends can be extrapolated into predictions of the most common failure modes.

OmniMetrix's PG monitors have been installed on generators from original equipment manufacturers ("OEMs") such as Caterpillar, Kohler, Generac, Cummins, MTU Energy and other generator manufacturers. OmniMetrix provides dual value propositions to the generator service organizations as well as to the machine owner. The dealers benefit from the receipt of performance data and status conditions from the generators they service for their customers, which allows the dealer service organization to be proactive in their delivery of service to their customers, as well as to implement the OmniMetrix *SmartService™* approach to analyzing the remote machines before dispatching a service truck. Since the majority of service and warranty costs are incurred from service people driving trucks, preemptive analysis of customer site conditions prior to dispatch can reduce their labor cost. From the machine owner's perspective, the OmniMetrix product provides a powerful tool to be used in their constant effort to avoid failures that come from consumables such as batteries and fuel. With proper monitoring, the large majority of machine failures can be avoided completely. This migration from failure reporting to failure prevention is fundamental to the OmniMetrix focus and is the result of a strong data collection and analysis design point. We believe that this transition to prognostics sets OmniMetrix apart from its competitors, many of whom are still in the failure reporting phase of application development. We have also increased our marketing efforts to end-users in an effort to increase demand for our services. These efforts have proven to be very successful, and OmniMetrix continues to execute on that strategy.

There are two types of competitors in the PG marketplace: independent monitoring organizations (such as OmniMetrix) who produce the monitoring systems (but not the equipment being monitored); and OEMs such as generator manufacturers or generator controls manufacturers who have begun offering customer connectivity to their machinery.

In 2018, no single customer of OmniMetrix provided more than 10% of its sales. OmniMetrix has successfully been able to mitigate the risk of customer dependency by increasing its penetration rate, its sales pipeline and supporting a larger base of customers. OmniMetrix expects to continue to expand its base of customers in 2019.

Competition

OmniMetrix is a vertical market company, deeply focused on providing an excellent customer experience and product and service designs for a complete end-to-end program for its customers. Having been the first provider of wireless remote monitoring systems for standby generators and pipeline corrosion programs, the company has had the opportunity to mature its offering to a level not offered by others who might like to compete in these two segments. This long experience working with key brand project partners over the years has resulted in product offerings that are competitive.

There are two types of competitors in the PG marketplace:

(1) Independent monitoring organizations (such as OmniMetrix) that produce the monitoring systems, but not the equipment being monitored. Among these are companies such as Ayantra, FleetZOOM, Gen-Tracker, and PointGuard. PointGuard is owned by a Caterpillar dealer and focuses its business on the Caterpillar channel. Today it offers an array of diagnostic capabilities. The other three competitors operate in the reactive "failure notification" mode described in the early stages of the OmniMetrix business model. In the past, those competitors positioned themselves at a lower performance, lower price quadrant of the market.

(2) OEMs such as generator manufacturers or generator controls manufacturers have begun offering customer connectivity to their machinery. They offer a current generation connectivity replacing telephone dial-up modems that had been used in the past. Their offerings are limited to their own brands, so they do not fit into a broad application such as does the OmniMetrix *SmartService™,* supporting service organizations that service all brands. They are also generally designed for the machine owners' use, in a reactive application. Deep Sea Electronics offers wireless devices to allow remote access to generators with some of their controls. Similarly, Cummins Power Generation offers a device that allows their machine owners to browse directly into the generator. This device is only valid for certain types of their generators.

We believe OmniMetrix has a well-established and well-defended position in the high-performance PG monitoring segment, due to its long history and numerous industry partner projects. The company is currently applying an aggressive sales effort into both the market segment requiring less technology and lower price (including the extremely large residential generator market) as well as developing more sophisticated, diagnostic products and custom solutions for commercial and industrial clientele.

Within the CP marketplace, there are no OEM competitors, but there are several independent monitoring companies similar to OmniMetrix such as Abriox, Elecsys, and American Innovations. We believe that OmniMetrix systems provide greater functionality than these competitors, though those competitors are much larger and have greater resources, potentially enabling better channel penetration than OmniMetrix can accomplish.

Intellectual Property

OmniMetrix has always focused on being the technology leader in its markets, and as a result has created many "industry firsts". Initially, the company only pursued patents on the most valuable processes and systems and otherwise made public disclosure of many processes to prevent others from making later patent claims on those items. Nonetheless, OmniMetrix has five issued patents. Furthermore, the company has agreements with its employees and consultants which establish certain non-disclosure and, in some cases, non-compete, requirements. OmniMetrix continually evaluates whether and how to best protect its intellectual property, but there can be no assurance that its efforts will be successful in all cases.

Facilities

OmniMetrix's activities are currently conducted in approximately 21,000 square feet of office and production space in the Hamilton Mill Business Park located in Buford, Georgia under a lease that expires on December 31, 2019. OmniMetrix is currently utilizing only a portion of these leased facilities and has previously taken an impairment charge with respect to the underutilization of these facilities.

DSIT

We recorded $450,000 as our 41.2% share of DSIT's net income for the year ending December 31, 2017. On February 14, 2018, we closed on the sale of our remaining interest in DSIT to a group of Israeli investors for $5.8 million before transaction costs and withholding taxes. Accordingly, we adjusted our equity investment balance in DSIT to be equal to the gross proceeds received from the sale and recorded an impairment charge in 2017 of $308,000. In 2018, we recorded our 41.2% share of DSIT's income or loss through the closing of the 2018 DSIT Transaction as well as our estimated transaction costs and withholding taxes on the transaction ($441,000 and $388,000, respectively) offset by $222,000, net of professional fees less interest income, refunded by the Israel Tax Authorities related to our 2016 Israeli tax return.

GRIDSENSE

GridSense, which was 100% owned by Acorn and until the cessation of its operations and subsequent liquidation (see below), developed and marketed remote monitoring systems to electric utilities and industrial facilities worldwide.

In April 2016, we announced that we decided to cease operations of our GridSense Inc. subsidiary and initiate the liquidation of the GridSense assets.

In July 2016, GridSense Inc. sold its assets to Franklin Fueling Systems, Inc., a wholly-owned subsidiary of Franklin Electric Co., Inc., for a gross sales price of $1.0 million.

Following the sale, GridSense Inc. engaged a third-party liquidation officer to satisfy, to the extent of the funds available, the claims of GridSense Inc. creditors, including Acorn which was GridSense Inc.'s largest creditor. At December 31, 2016, GridSense had approximately $19,000 of cash available (excluding escrow amounts) for satisfaction of remaining creditor claims of approximately $314,000. During the year ended December 31, 2017, the liquidator settled $70,000 of claims while disbursing $7,000 to those creditors. All of these settlements occurred in the first quarter of 2017 with no settlements with outside creditors being made subsequent to the first quarter of 2017.

On September 25, 2017, the Board of Directors of GridSense Inc. decided to dissolve and wind up the affairs of GridSense Inc. and adopted a Plan of Liquidation and Dissolution (the "Plan"). In accordance with the Plan, which was adopted on the same date, GridSense Inc. filed and executed Articles of Dissolution of the Corporation with the State of Colorado and established a liquidating trust to which all assets and liabilities of GridSense Inc. were transferred to in order to implement the winding up of the business. In addition, GridSense Pty Ltd. ("GPL"), the parent company of

GridSense's former operating company in Australia were deregistered by the Australian Securities & Investments Commission ("ASIC"). As a result of the deregistration, which is akin to a Chapter 7 bankruptcy in the US, (i) GPL has ceased to exist as a legal entity and its property is deemed vested in ASIC, (ii) the former officers and directors of GPL no longer have the right to deal with property registered in the GPL's name, (iii) legal proceedings against GPL cannot be commenced or continued.

Accordingly, following the two aforementioned events, GridSense (GridSense Inc. and GPL) was deconsolidated from the books of Acorn. We recorded a gain of $660,000 on the deconsolidation of GridSense in the third quarter of 2017.

BACKLOG

As of December 31, 2018, OmniMetrix had a backlog of approximately $4.1 million, primarily comprised of deferred revenue, of which approximately $2.7 million is expected to be recognized as revenue in 2019.

RESEARCH AND DEVELOPMENT EXPENSE, NET

Research and development expense recorded for the years ended December 31, 2018 and 2017 for our OmniMetrix subsidiary in continuing operations is as follows (amounts in thousands of U.S. dollars):

	Years ended December 31,	
	2018	2017
OmniMetrix	$542	$518

EMPLOYEES

At December 31, 2018, we employed a total of 22 employees – all of which were full-time employees employed by OmniMetrix in the U.S. Our CEO and CFO are hired as consultants to us.

Eleven of OmniMetrix's 22 employees are engaged in production, engineering and technical support, seven in marketing and sales and three in finance and IT in addition to our CEO. We consider our relationship with our employees to be satisfactory. We have no collective bargaining agreements with any of our employees.

ADDITIONAL FINANCIAL INFORMATION

For additional financial information regarding our operating segments, foreign and domestic operations and sales, see "Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations" and Note 16 to our Consolidated Financial Statements included in this Annual Report.

AVAILABLE INFORMATION

We file annual, quarterly and current reports, proxy statements and other information with the Securities and Exchange Commission (the "SEC"). These filings are available to the public over the internet at the SEC's website at http://www.sec.gov. You may also read and copy any document we file at the SEC's public reference room located at

100 F Street, NE, Washington, DC 20549. Please call the SEC at 1-800-SEC-0330 for further information on the public reference room.

Our website can be found at http://www.acornenergy.com. We make available free of charge on or through our website, access to our annual report on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K, and amendments to those reports as soon as reasonably practicable after such material is electronically filed, or furnished, to the SEC. Our website also includes our Code of Business Conduct and Ethics, and our Board of Directors' Committee Charter for the Audit Committee.

ITEM 1A. RISK FACTORS

We may from time to time make written or oral statements that contain forward-looking information. However, our actual results may differ materially from our expectations, statements or projections. The following risks and uncertainties, together with other factors not presently determinable, could cause actual results to differ from our expectations, statements or projections.

GENERAL FACTORS

We have a history of operating losses and have used significant amounts of cash for operations and to fund our acquisitions and investments.

We have a history of losses from our OmniMetrix subsidiary and corporate overhead and have used significant amounts of cash to fund our operating activities over the years. In 2018 and 2017, we had operating losses of $1.4 million and $1.9 million, respectively. We also had income from discontinued operations of $0.7 million in 2017. We did not have any income from discontinued operations in 2018. Cash used in operating activities of continuing operations was $2.4 million in 2018 and $1.6 million in 2017.

The closing of the 2018 DSIT Transaction provided us with approximately $1.9 million after paying transaction costs, withholding taxes and the repayment of director loans and associated accrued interest. On March 22, 2019, we had approximately $1.1 million of consolidated cash and cash equivalents (including restricted cash), of which $290,000 was restricted and held by a bank in Israel.

During 2018 and 2017, we provided OmniMetrix with $300,000 of financing each year. We believe that with OmniMetrix's continued growth and increased credit availability, that OmniMetrix will not need financing from us during 2019. Our corporate overhead has also been significantly reduced and has stabilized. Based on the above, we believe we have sufficient cash to finance our operations for at least twelve months from the issuance of the financial statements contained in this Annual Report. However, we may need to seek additional sources of funding for long-term corporate costs or if OmniMetrix were not to grow at the rate anticipated and needed additional funds for their operations. Additional sources of funding may include additional loans from related and/or non-related parties, partial sale of, or finding a strategic partner for, OmniMetrix or equity financings. There can be no assurance additional funding will be available at acceptable terms or that we will be able to successfully utilize any of these possible sources to provide additional liquidity.

We depend on key management for the success of our business.

Our success is largely dependent on the skills, experience and efforts of our senior management team, including Jan Loeb, Walter Czarnecki and Tracy Clifford. The loss of the services of any of these key managers could materially harm our business, financial condition, future results and cash flow. We do not maintain "key person" life insurance policies on any members of senior management. We may also not be able to locate or employ on acceptable terms qualified replacements for our senior management if their services were no longer available.

Loss of the services of a few key employees could harm our operations.

We depend on key technical employees and sales personnel. The loss of certain personnel could diminish our ability to develop and maintain relationships with customers and potential customers. The loss of certain technical personnel could harm our ability to meet development and implementation schedules. The loss of key sales personnel could have a negative effect on sales to certain current customers. Although most of our significant employees are bound by confidentiality and non-competition agreements, the enforceability of such agreements cannot be assured. Our future success also depends on our continuing ability to identify, hire, train and retain other highly qualified technical and managerial personnel. If we fail to attract or retain highly qualified technical and managerial personnel in the future, our business could be disrupted.

There is a limited trading market for our common stock and the price of our common stock may be volatile

Our common stock is traded on the OTCQB marketplace under the symbol “ACFN.” The OTCQB is a regulated quotation service that displays real-time quotes, last-sale prices and volume information in over-the-counter equity securities and provides significantly less liquidity than a listing on the NASDAQ Stock Markets or other national securities exchanges. The OTCQB securities are traded by a community of market makers that enter quotes and trade reports. This market is limited in comparison to the national stock exchanges and any prices quoted may not be a reliable indication of the value of our common stock. Quotes for stocks included on the OTCQB are not listed in the financial sections of newspapers as are those for the NASDAQ Stock Market or the NYSE. Therefore, prices for securities traded solely on the OTCQB may be difficult to obtain.

Trading on the OTCQB marketplace as opposed to a national securities exchange has resulted and may continue to result in a reduction in some or all of the following, each of which could have a material adverse effect on the price of our common stock and our company:

- the liquidity of our common stock;
- the market price of shares of our common stock;
- our ability to obtain financing for the continuation of our operations;
- the number of institutional and other investors that will consider investing in shares of our common stock;
- the number of market markers in shares of our common stock;
- the availability of information concerning the trading prices and volume of shares of our common stock; and
- the number of broker-dealers willing to execute trades in shares of our common stock.

In addition, the market price of our common stock could be subject to wide fluctuations in response to:

- quarterly variations in our revenues and operating expenses;
- announcements of new products or services by us;
- fluctuations in interest rates;
- significant sales of our common stock;
- the operating and stock price performance of other companies that investors may deem comparable to us; and
- news reports relating to trends in our markets or general economic conditions.

Penny stock rules will limit the ability of our stockholders to sell their stock

The Securities and Exchange Commission has adopted regulations which generally define “penny stock” to be any equity security that has a market price (as defined) less than $5.00 per share or an exercise price of less than $5.00 per share, subject to certain exceptions. Our securities are covered by the penny stock rules, which impose additional sales practice requirements on broker-dealers who sell to persons other than established customers and “accredited investors”. The term “accredited investor” refers generally to institutions with assets in excess of $5,000,000 or individuals with a net worth in excess of $1,000,000 or annual income exceeding $200,000 or $300,000 jointly with their spouse. The penny stock rules require a broker-dealer, prior to a transaction in a penny stock not otherwise exempt from the rules, to deliver a standardized risk disclosure document in a form prepared by the SEC which provides information about penny stocks and the nature and level of risks in the penny stock market. The broker-dealer also must provide the customer with current bid and offer quotations for the penny stock, the compensation of the broker-dealer and its salesperson in the transaction and monthly account statements showing the market value of each penny stock held in the customer’s account. The bid and offer quotations, and the broker-dealer and salesperson compensation information, must be given to the customer orally or in writing prior to effecting the transaction and must be given to the customer in writing before or with the customer’s confirmation. In addition, the penny stock rules require that prior to a transaction in a penny stock not otherwise exempt from these rules, the broker-dealer must make a special written determination that the penny stock is a suitable investment for the purchaser and receive the purchaser’s written agreement to the transaction. These disclosure requirements may have the effect of reducing the level of trading activity in the secondary market for the stock that is subject to these penny stock rules. Consequently, these penny stock rules may affect the ability of broker-dealers to trade our securities. We believe that the penny stock rules discourage investor interest in and limit the marketability of our common stock; however, we have the option to execute a reverse split which could mitigate this issue.

Compliance with changing regulation of corporate governance, public disclosure and financial accounting standards may result in additional expenses and affect our reported results of operations.

Keeping informed of, and in compliance with, changing laws, regulations and standards relating to corporate governance, public disclosure and accounting standards, including the Sarbanes-Oxley Act, Dodd-Frank Act, as well as new and proposed SEC regulations and accounting standards, has required an increased amount of management attention and external resources. Compliance with such requirements may result in increased general and administrative expenses and an increased allocation of management time and attention to compliance activities.

We may not be able to successfully integrate companies which we may invest in or acquire in the future, which could materially and adversely affect our business, financial condition, future results and cash flow.

Part of our business model includes the acquisition of new companies either as new platform companies or complimentary companies. Although we do not presently foresee making such acquisitions in the near term unless they support our existing business, if we did so, any failure to effectively integrate any future acquisition's management into our controls, systems and procedures could materially adversely affect our business, results of operations and financial condition.

In order to grow, we may decide to pursue growth through acquisitions, although we do not currently plan any significant acquisitions. Any significant acquisition could require substantial use of our capital and may require significant debt or equity financing. We anticipate the need to closely manage our cash for the foreseeable future and cannot provide any assurance as to the availability or terms of any such financing or its effect on our liquidity and capital resources.

Integrating acquisitions is often costly, and we may not be able to successfully integrate acquired companies with existing operations without substantial costs, delays or other adverse operational or financial consequences. Integrating acquired companies involves a number of risks that could materially and adversely affect our business, including:

- failure of the acquired companies to achieve the results we expect;
- inability to retain key personnel of the acquired companies;
- dilution of existing stockholders;
- potential disruption of our ongoing business activities and distraction of our management;
- difficulties in retaining business relationships with suppliers and customers of the acquired companies;
- difficulties in coordinating and integrating overall business strategies, sales and marketing, and research and development efforts; and
- difficulties in establishing and maintaining uniform standards, controls, procedures and policies, including accounting controls and procedures.

We incur substantial costs as a result of being a public company.

As a public company, we incur significant legal, accounting, and other expenses in connection with our reporting requirements. The Sarbanes-Oxley Act of 2002, Dodd-Frank Act and the rules subsequently implemented by the Securities and Exchange Commission ("SEC") have required changes in corporate governance practices of public companies. These rules and regulations have already increased our legal and financial compliance costs and the amount of time and effort we devote to compliance activities. We expect that as a result of continued compliance with

these rules and regulations, we will continue to incur significant legal and financial compliance costs. We continue to regularly monitor and evaluate developments with respect to these new rules with our legal counsel, but we cannot predict or estimate the amount of additional costs we may incur or the timing of such costs.

We may in the future become involved in litigation that may materially adversely affect us.

From time to time in the ordinary course of our business, we may become involved in various legal proceedings, including commercial, product liability, employment, class action and other litigation and claims, as well as governmental and other regulatory investigations and proceedings. Any legal proceedings can be time-consuming, divert management’s attention and resources and cause us to incur significant expenses. Because litigation is inherently unpredictable, the results of any such actions may have a material adverse effect on our business, operations or financial condition.

We have reported material weaknesses in internal controls over financial reporting as of December 31, 2018 and we cannot assure you that additional material weaknesses will not be identified in the future or that we can effectively remediate our reported weaknesses. If our internal control over financial reporting or disclosure controls and procedures are not effective, there may be errors in our financial statements that could require a restatement, or our filings may not be timely, and investors may lose confidence in our reported financial information.

Section 404 of the Sarbanes-Oxley Act of 2002 requires us to evaluate the effectiveness of our internal control over financial reporting as of the end of each year, and to include a management report assessing the effectiveness of our internal control over financial reporting in each Annual Report on Form 10-K.

Our management, including our Chief Executive Officer and Chief Financial Officer, does not expect that our internal control over financial reporting will prevent all errors and all fraud. A control system, no matter how well designed and operated, can provide only reasonable, not absolute, assurance that the control system's objectives will be met. Further, the design of a control system must reflect the fact that there are resource constraints, and the benefits of controls must be considered relative to their costs. Controls can be circumvented by the individual acts of some persons, by collusion of two or more people, or by management override of the controls. Over time, controls may become inadequate because changes in conditions or deterioration in the degree of compliance with policies or procedures may occur. Because of the inherent limitations in a cost-effective control system, misstatements due to error or fraud may occur and not be detected.

As a result, we cannot assure you that additional significant deficiencies or material weaknesses in our internal control over financial reporting will not be identified in the future or that we can effectively remediate our reported weaknesses. Any failure to maintain or implement required new or improved controls, or any difficulties we encounter in their implementation, could result in significant deficiencies or material weaknesses, cause us to fail to timely meet our periodic reporting obligations, or result in material misstatements in our financial statements. Any such failure could also adversely affect the results of periodic management evaluations regarding disclosure controls and the effectiveness of our internal control over financial reporting required under Section 404 of the Sarbanes-Oxley Act of 2002 and the rules promulgated thereunder. The existence of a material weakness could result in errors in our financial statements that could result in a restatement of financial statements, cause us to fail to timely meet our reporting obligations and cause investors to lose confidence in our reported financial information.

If we are unable to protect our intellectual property, or our intellectual property protection efforts are unsuccessful, others may duplicate our technology.

We rely on a combination of patents, trademarks, copyrights, trade secret laws and restrictions on disclosure to protect our intellectual property rights. Our ability to compete effectively will depend, in part, on our ability to protect our proprietary technology, systems designs and manufacturing processes. The ability of others to use our intellectual

property could allow them to duplicate the benefits of our products and reduce our competitive advantage. In the future, should we apply for new patents, we do not know whether any of our pending patent applications will be issued or, in the case of patents issued, that the claims allowed are or will be sufficiently broad to protect our technology or processes. Further, a patent issued covering one use of our technology may not be broad enough to cover uses of that technology in other business areas. Even if all our patent applications are issued and are sufficiently broad, they may be challenged or invalidated, or our competitors may independently develop or patent technologies or processes that are equivalent or superior to ours. We could incur substantial costs in prosecuting patent and other intellectual property infringement suits and defending the validity of our patents and other intellectual property. While we have attempted to safeguard and maintain our property rights, we do not know whether we have been or will be completely successful in doing so. These actions could place our patents, trademarks and other intellectual property rights at risk and could result in the loss of patent, trademark or other intellectual property rights protection for the products, systems and services on which our business strategy partly depends. Furthermore, it is not practical from a cost/benefit perspective to file for patent or trademark protection in every jurisdiction where we now or in the future may conduct business. In those territories where we do not have the benefit of patent or trademark protections, our competitors may be able to prevent us from selling our products or otherwise limit our ability to advertise under our established product names and we may face risks associated with infringement litigation as discussed below.

We rely, to a significant degree, on contractual provisions to protect our trade secrets and proprietary knowledge. These trade secrets either cannot be protected by patent protection or we have determined that seeking a patent is not in our interest. These agreements may be breached, and we may not have adequate remedies for any breach. Our trade secrets may also be known without breach of such agreements or may be independently developed by competitors.

It can be difficult or expensive to obtain the insurance we need for our business operations.

As part of our business operations, we maintain insurance as a corporate risk management strategy. Insurance products are impacted by market fluctuations and can become expensive and sometimes very difficult to obtain. There can be no assurance that we can secure all necessary or appropriate insurance at an affordable price for the required limits. Our failure to obtain such insurance could lead to uninsured losses that could have a material adverse effect on our results of operations or financial condition or cause us to be out of compliance with our contractual obligations.

We may in the future be involved in product liability and product warranty claims relating to the products we manufacture and distribute that, if adversely determined, could adversely affect our financial condition, results of operations, and cash flows. Product liability claims can be expensive to defend and can divert the attention of management and other personnel for significant periods, regardless of the ultimate outcome. Claims of this nature could also have a negative impact on customer confidence in our products and our company. While insurance can mitigate some of this risk, due to our current size and limited operating history, we have been unable to obtain product liability insurance with significant coverage. Our customers may not accept the terms we have been able to procure and seek to terminate our existing contracts or cease to do business with us.

Concentrations of credit risk

Financial instruments, which potentially subject the Company to concentrations of credit risk, consist principally of cash and cash equivalents, restricted cash, and trade accounts receivable. The Company’s cash and cash equivalents were deposited primarily with U.S. banks and brokerage firms and, together with restricted cash, amounted to $1.3 million at December 31, 2018, of which $290,000 was restricted and held in a bank in Israel. Approximately 17% of the accounts receivable at December 31, 2018 was due from one customer who pays its receivables over usual credit periods. Credit risk with respect to the balance of trade receivables is generally diversified due to the number of entities comprising the Company’s customer base. The Company does not believe there is significant risk of non-performance by these counterparties.

RISKS RELATED TO OMNIMETRIX

OmniMetrix has incurred net losses since our acquisition and may never achieve sustained profitability.

OmniMetrix has generated operating losses since our acquisition in 2012 including operating losses of $0.2 million in 2018 and $0.8 million in 2017. While OmniMetrix has significantly reduced its losses and its cash needs from us and

we expect positive cash flow from operations in 2019, we can provide no assurance that OmniMetrix will be able to generate sufficient revenues and cash flow to allow it to become profitable or to eventually sustain profitability or to have positive cash flows.

An increase in customer terminations would negatively affect our business by reducing OmniMetrix revenue or requiring us to spend more money to grow our customer base.

Non-renewals or other monitoring service terminations could increase in the future due to customer dissatisfaction with our products and services, increased competition from other providers or alternative technologies.

If we have an increase in our non-renewal rate, we will have to acquire new customers on an ongoing basis just to maintain our existing level of customers and revenues. As a result, marketing expenditures are an ongoing requirement of our business. We incur significant costs to acquire new customers, and those costs are an important factor in determining our net profitability. Therefore, if we are unsuccessful in retaining customers or are required to spend significant amounts to acquire new customers, our revenue could decrease, and our operating results could be affected.

OmniMetrix is a relatively small company with limited resources compared to some of its current and potential competitors, which may hinder its ability to compete effectively.

Some of OmniMetrix's current and potential competitors have significantly greater resources and broader name recognition than it does. As a result, these competitors may have greater credibility with OmniMetrix's existing and potential customers. They also may be able to adopt more aggressive pricing policies and devote greater resources to the development, promotion and sale of their products which would allow them to respond more quickly to new or emerging technologies or changes in customer requirements. In particular at the present time we are facing significant competition from generator manufacturers who offer their own monitoring solutions.

OmniMetrix may not be able to access sufficient capital to support growth.

OmniMetrix has been dependent on Acorn's ability and willingness to provide funding to support its business and growth strategy. Since our acquisition of OmniMetrix in February 2012, we have invested approximately $14.0 million and, through March 22, 2019, have lent $2,962,000, net of repayments to OmniMetrix, not including $985,000 of accrued interest and expenses advanced to it by Acorn since 2014. OmniMetrix has reduced its borrowings from Acorn (only $300,000 in each of 2017 and 2018) and is not expected to need funding support from us in 2019 to support its growth and working capital needs.

In October 2017, OmniMetrix renewed its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1 million. Debt incurred under this financing arrangement bore interest at the greater of prime (4.50% at December 31, 2017) plus 2% or 6% per year. In addition, OmniMetrix was to pay a monthly service charge of 0.9% of the average aggregate principal amount outstanding for the prior month, for an effective rate of interest on advances of 17.3%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of one year beginning November 1, 2017. OmniMetrix allowed this line to expire according to its terms at October 31, 2018.

In March 2019, OmniMetrix reinstated its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1 million. Debt incurred under this financing arrangement bears interest at the greater of 6% and prime (5.5% at March 22, 2019) plus 1.5% per year. In addition, OmniMetrix is to pay a monthly service charge of 0.75% of the average aggregate principal amount outstanding for the prior month, for a current effective rate of interest on advances of 16.0%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of two years beginning March 1, 2019.

We have no assurance that this financing arrangement will provide sufficient liquidity for OmniMetrix's working capital needs in 2019. Additional financing for OmniMetrix may be in the form of a bank line, a new loan or investment by others, a loan by Acorn, or a combination of the above. The availability and amount of any additional loans from us to OmniMetrix may be limited by the working capital needs of our corporate activities. Whether Acorn will have the resources necessary to provide funding, or whether alternative funds, such as third-party loans, will be available at the time and on terms acceptable to Acorn and OmniMetrix cannot be determined.

OmniMetrix sells equipment and services which monitor third-party products, thus its revenues are dependent on the continued sales of such third-party products.

OmniMetrix's end-user customer base is comprised exclusively of parties who have chosen to purchase either generators or construct gas pipelines. OmniMetrix has no ability to control the rate at which new generators or cathodic protection systems are acquired. If purchases of such products decline, the associated need for OmniMetrix's products and services is expected to decline as well.

If OmniMetrix is unable to keep pace with changing market or customer-mandated product and service improvements, OmniMetrix's results of operations and financial condition may suffer.

Many of OmniMetrix's existing products may require ongoing engineering and upgrades in conjunction with market developments as well as specific customer needs. There can be no assurance that OmniMetrix will continue to be successful in its engineering efforts regarding the development of its products, and future technological difficulties could adversely affect its business, results of operations and financial condition.

The cellular networks used by OmniMetrix are also subject to periodic technical updates that may require corresponding updates to, or replacement of, OmniMetrix's monitoring equipment.

Cellular networks have evolved over time to offer more robust technical capabilities in both voice and data transmission. At the present time, the changes from the so-called "2G" to "3G" and "4G" service have resulted in only limited service interruptions. OmniMetrix anticipates, however, that as these new capabilities come online, it will be necessary to have equipment that can readily interface with the newer cellular networks to avoid negative impacts on customer service. Not all of the costs associated with OmniMetrix's corresponding equipment upgrades can be passed on to customers and any increased expenses are expected to have a negative impact on OmniMetrix's operating results.

A substantial portion of OmniMetrix's revenues are expected to be generated not from product sales, but from periodic monitoring fees and thus it is continually exposed to risks associated with its customers' financial stability.

OmniMetrix sells on-going monitoring services to both PG and CP customers. It is therefore dependent on these customers continuing to timely pay service fees on an on-going basis. If a significant portion of these fees are not renewed from year-to-year, OmniMetrix could expect to experience deterioration in its financial condition.

OmniMetrix's ability to provide, and to collect revenues from, monitoring services is dependent on the reliability of cellular networks not controlled by OmniMetrix.

OmniMetrix provides monitoring services through the use of cellular and satellite technology utilizing the networks of third-party providers. These providers generally do not warrant their services to either OmniMetrix or the end users and any dropped transmissions could result in the loss of customer renewals and potential claims against OmniMetrix. While OmniMetrix uses contractual measures to limit its liability to customers, there is no assurance that such limitations will be enforced or that customers will not cancel monitoring services due to network issues.

OmniMetrix's business is dependent on its ability to reliably store and manage data, but there can be no guarantee that it has sufficient capabilities to mitigate potential data loss in all cases.

The efficient operation of OmniMetrix's business is dependent on its information technology systems. In addition, OmniMetrix's ability to assist customers in analyzing data related to the performance of such customers' power and cathodic protection monitoring systems is an important component of its customer value proposition. OmniMetrix utilizes off-site data servers, housed within a commercial data center utilizing accepted data and power monitoring and protection processes, but whether a data loss can be avoided cannot be assured in every case. OmniMetrix's information technology systems are vulnerable to damage or interruption from natural disasters, sabotage (including theft and attacks by computer viruses or hackers), power outages; and computer systems, Internet, telecommunications or data network failure. Any interruption of OmniMetrix's information technology systems could result in decreased revenue, increased expenses, increased capital expenditures, customer dissatisfaction and potential lawsuits, any of which could have a material adverse effect on its results of operations and financial condition.

RISKS RELATED TO OUR SECURITIES

Our stock price is highly volatile and we do not expect to pay dividends on shares of our common stock for the foreseeable future. Investors may never obtain a return on their investment.

The market price of our common stock has fluctuated substantially in the past and is likely to continue to be highly volatile and subject to wide fluctuations. During 2018, our common stock traded at prices as low as $0.15 and as high as $0.45 per share. Fluctuations in our stock price may continue to occur in response to various factors, many of which we cannot control, including:

- general economic and political conditions and specific conditions in the markets we address;
- quarter-to-quarter variations in our operating results;
- strategic investments or divestments;
- announcements of changes in our senior management;
- the gain or loss of one or more significant customers or suppliers;
- announcements of technological innovations or new products by our competitors, customers or us;
- the gain or loss of market share in any of our markets;
- changes in accounting rules;
- changes in investor perceptions; or
- changes in expectations relating to our products, plans and strategic position or those of our competitors or customers.

We do not intend to pay dividends to our stockholders in the foreseeable future. We intend to reinvest earnings, if any, in the development and expansion of our business. Accordingly, you will need to rely on sales of your common stock after price appreciation, which may never occur, in order to realize a return on your investment.

Our share price may decline due to the large number of shares of our common stock eligible for future sale in the public market including shares underlying warrants and options.

Almost all of our outstanding shares of common stock are, or could upon exercise of options or warrants become, eligible for sale in the public market as described below. Sales of a substantial number of shares of our common stock in the public market, or the possibility of these sales, may adversely affect our stock price.

As of March 22, 2019, 29,555,786 shares of our common stock were issued and outstanding. As of that date we had 2,392,142 warrants outstanding and exercisable with a weighted average exercise price of $1.28 and 1,313,155 options outstanding and exercisable with a weighted average exercise price of $2.97 per share, which if exercised would result in the issuance of additional shares of our common stock. In addition to the options noted above, at March 22, 2019, 80,000 options are outstanding, but have not yet vested and are not yet exercisable.

Substantially all of our currently outstanding shares and shares issuable under our outstanding options and warrants are or would be freely tradable.

We may have to offer additional securities for sale in the near future.

In February 2018, we sold of our remaining interest in DSIT and received cash proceeds of approximately $4.2 million (net of DSIT's balance due to Acorn which was assigned to the purchasers) which was used to pay transaction costs, withholding taxes, repay our director loans and associated accrued interest and provide working capital for us and OmniMetrix. As of March 22, 2019, we had consolidated cash (including restricted cash) of approximately $1.1 million, of which $290,000 is currently restricted and held in a bank in Israel, which we believe is sufficient for at least the next twelve months. Despite this, we may ultimately not have sufficient cash to allow us to execute our plans and the occurrence of one or more unanticipated events may require us to make significant expenditures. Accordingly, we may need to raise additional amounts to finance our operations. If we were to do so by selling shares of our common stock and/or other securities convertible into shares of our common stock, current investors may incur additional dilution in the value of their shares.

ITEM 1B. UNRESOLVED STAFF COMMENTS

None.

16

ITEM 2. PROPERTIES

OmniMetrix's activities are currently conducted in approximately 21,000 square feet of office and production space in the Hamilton Mill Business Park located in Buford, Georgia under a lease that expires on December 31, 2019. The lease provides for annual rent of approximately $109,000 in 2019. OmniMetrix is currently utilizing only a portion of these leased facilities and has previously taken an impairment charge with respect to the underutilization of these facilities. OmniMetrix is currently seeking more suitable office space for which to enter into a lease effective January 1, 2020.

ITEM 3. LEGAL PROCEEDINGS

None.

PART II

ITEM 5. MARKET FOR REGISTRANT'S COMMON EQUITY, RELATED STOCKHOLDER MATTERS AND ISSUER PURCHASES OF EQUITY SECURITIES

Market Information

Our common stock is traded under the symbol "ACFN" on the OTCQB marketplace. The following table sets forth, for the periods indicated, the high and low bid prices on the OTCQB marketplace.

	High	Low
2018:		
First Quarter	$0.32	$0.15
Second Quarter	0.45	0.29
Third Quarter	0.35	0.20
Fourth Quarter	0.35	0.15
2017:		
First Quarter	$0.56	$0.18
Second Quarter	0.42	0.20
Third Quarter	0.27	0.15
Fourth Quarter	0.26	0.16

As of March 15, 2019, the last reported sales price of our common stock on the OTCQB marketplace was $0.35, there were 96 record holders of our common stock and we estimate that there were approximately 3,855 beneficial owners of our common stock.

ITEM 7. MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

RECENT DEVELOPMENTS

In March 2019, OmniMetrix reinstated its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1 million. Debt incurred under this financing arrangement bears interest at the greater of 6% and prime (5.5% at March 22, 2019) plus 1.5% per year. In addition, OmniMetrix is to pay a monthly service charge of 0.75% of the average aggregate principal amount outstanding for the prior month, for a current effective rate of interest on advances of 16%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of two years beginning March 1, 2019.

OVERVIEW AND TREND INFORMATION

The following discussion includes statements that are forward-looking in nature. Whether such statements ultimately prove to be accurate depends upon a variety of factors that may affect our business and operations. Certain of these factors are discussed in "Item 1A. Risk Factors."

We currently operate in two reportable operating segments, both of which are performed though our OmniMetrix subsidiary:

- The PG segment which provides wireless remote monitoring and control systems and services for critical assets as well as Internet of Things applications; and
- The CP segment which provides for remote monitoring of cathodic protection systems on gas pipelines for gas utilities and pipeline companies.

Following the closing of the 2016 DSIT Transaction, the Company no longer consolidated the results of DSIT, but rather reported on its investment in DSIT on the equity method (until the closing of the 2018 DSIT Transaction.

On February 14, 2018, we closed on the sale of our remaining interest in DSIT to a group of Israeli investors for $5.8 million before transaction costs and withholding taxes. Accordingly, we adjusted our equity investment balance in

DSIT to be equal to the gross proceeds received from the sale and recorded an impairment charge in 2017 of $308,000. In 2018, we recorded our 41.2% share of DSIT's income or loss through the closing of the 2018 DSIT Transaction as well as our estimated transaction costs and withholding taxes on the transaction ($441,000 and $388,000, respectively) offset by $222,000, net of professional fees less interest income, refunded by the Israel Tax Authorities related to our 2016 Israeli tax return.

The following analysis should be read together with the segment information provided in Note 16 to our Consolidated Financial Statements included in this report.

OmniMetrix

Following the emergence of machine-to-machine (M2M) and Internet of Things (IoT) applications whereby companies aggregate multiple sensors and monitors into a simplified dashboard for customers, OmniMetrix believes it plays a key role in this new economic ecosystem. In addition, OmniMetrix sees a rapidly growing need for backup power infrastructure to secure critical military, government, and private sector assets against emergency events including terrorist attacks, natural disasters, and cybersecurity threats. As residential and industrial standby generators, turbines, compressors, pumps, pumpjacks, light towers and other industrial equipment are part of the critical infrastructure increasingly becoming monitored in Internet of Things applications, and given that OmniMetrix monitors all major brands of critical equipment, OmniMetrix believes it is well-positioned as a competitive participant in this new market.

OmniMetrix has two divisions: PG and CP. In 2018, OmniMetrix recorded revenue of $5,087,000 ($3,656,000 in its PG activities and $1,431,000 in its CP activities) as compared to revenue of $4,350,000 recorded in 2017 ($3,355,000 in its PG activities and $995,000 in its CP activities). Increased revenue in 2018 was driven by monitoring revenue which increased 21% from $2,235,000 in 2017 to $2,712,000 in 2018. The increase in monitoring revenue was complemented by an increase in hardware revenue which increased 12% from $2,115,000 in 2017 to $2,375,000 in 2018. The increase in monitoring revenue is the result of increased units being monitored. The increase in hardware revenue is the result of increased sales of both PG and CP units.

Gross profit during 2018 was $3,121,000 reflecting a gross margin of 61% on revenue compared with a gross profit of $2,447,000 reflecting a 56% gross margin in 2017. The increased gross profit in 2018 was due to a decrease in our cost of goods. Gross margin on hardware revenue increased in 2018 to 36% from 27% in 2017. This increase was the result of increased gross margins for PG hardware which grew from 21% in 2017 to 32% in 2018. The increased margin was the result of reduced costs in our PG units as we benefit from our redesigned products. CP hardware gross margin stayed essentially flat at 39% in 2018 compared to 38% in 2017. Gross margin on monitoring revenue remained strong at 84% during 2018 and 2017.

During 2018, OmniMetrix recorded $542,000 of R&D expense as compared to $518,000 in 2017. The increase in R&D expense in 2018 is related to the continued development of next generation PG and CP products and exploration into new possible product lines. We expect a moderate increase in R&D expense in 2019 as we continue to work on certain initiatives to redesign products and expand product lines to increase the level of innovation and to reduce their costs in order to increase our future margins.

During 2018, OmniMetrix recorded $2,696,000 of SG&A costs. Such costs were just slightly below 2017 SG&A costs of $2,712,000 (a decrease of $16,000 or 1%). We anticipate that our annual SG&A costs in 2019 will increase approximately 23% as we plan to expand our sales and IT teams and invest in certain initiatives such as the implementation of a fully integrated Enterprise Resource Planning System.

In October 2017, OmniMetrix renewed its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1 million. Debt incurred under this financing arrangement bore interest at the greater of prime (4.50% at December 31, 2017) plus 2% or 6% per year. In addition, OmniMetrix was to pay a monthly service charge of 0.9% of the average aggregate principal amount outstanding for the prior month, for an effective rate of interest on advances of 17.3%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of one year beginning November 1, 2017. OmniMetrix allowed this line to expire according to its terms at October 31, 2018.

In March 2019, OmniMetrix reinstated its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1 million. Debt incurred under this financing arrangement bears interest at the greater of 6% and prime (5.5% at March 22, 2019) plus 1.5% per year. In addition, OmniMetrix is to pay a monthly service charge of 0.75% of the average aggregate principal amount outstanding for the prior month, for a current effective rate of interest on advances of 16%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of two years beginning March 1, 2019.

During 2017 and 2018, Acorn lent OmniMetrix $300,000 each year. We believe that OmniMetrix will not need working capital support in 2019 beyond the amounts available to it under the amended Loan and Security Agreement. However, we have no assurance that this will be the case. Additional financing for OmniMetrix may be in the form of a bank line, a new loan or investment by others, a loan by Acorn, or a combination of the above. The availability and amount of any additional loans from us to OmniMetrix may be limited by the working capital needs of our corporate activities. Whether Acorn will have the resources necessary to provide funding, or whether alternative funds, such as third-party loans, will be available at the time and on terms acceptable to Acorn and OmniMetrix cannot be determined.

GridSense

GridSense was 100% owned by Acorn and until the cessation of its operations and subsequent liquidation (see below), developed and marketed remote monitoring systems to electric utilities and industrial facilities worldwide.

In April 2016, we announced that we decided to cease operations of our GridSense Inc. subsidiary and initiate the liquidation of the GridSense assets.

In July 2016, GridSense Inc. sold its assets to Franklin Fueling Systems, Inc., a wholly-owned subsidiary of Franklin Electric Co., Inc., for a gross sales price of $1.0 million.

Following the sale, GridSense Inc. engaged a third-party liquidation officer to satisfy, to the extent of the funds available, the claims of GridSense Inc. creditors, including Acorn which was GridSense Inc.'s largest creditor. At December 31, 2016, GridSense had approximately $19,000 of cash available (excluding escrow amounts) for satisfaction of remaining creditor claims of approximately $314,000. During the year ended December 31, 2017, the liquidator settled $70,000 of claims while disbursing $7,000 to those creditors. All of these settlements occurred in the first quarter of 2017 with no settlements with outside creditors being made subsequent to the first quarter of 2017.

On September 25, 2017, the Board of Directors of GridSense Inc. decided to dissolve and wind up the affairs of GridSense Inc. and adopted a Plan of Liquidation and Dissolution (the "Plan"). In accordance with the Plan, which was adopted on the same date, GridSense Inc. filed and executed Articles of Dissolution of the Corporation with the State of Colorado and established a liquidating trust to which all assets and liabilities of GridSense Inc. were transferred to in order to implement the winding up of the business. In addition, GridSense Pty Ltd. ("GPL"), the parent company of GridSense's former operating company in Australia were deregistered by the Australian Securities & Investments Commission ("ASIC"). As a result of the deregistration, which is akin to a Chapter 7 bankruptcy in the US, (i) GPL has ceased to exist as a legal entity and its property is deemed vested in ASIC, (ii) the former officers and directors of GPL no longer have the right to deal with property registered in the GPL's name, (iii) legal proceedings against GPL cannot be commenced or continued.

Accordingly, following the two aforementioned events, GridSense (GridSense Inc. and GPL) was deconsolidated from the books of Acorn. We recorded a gain of $660,000 on the deconsolidation of GridSense in the third quarter of 2017.

Corporate

Corporate general and administrative ("G&A") expense of $1,260,000 in 2018 reflected an increase of $132,000 or 12% from the $1,128,000 of G&A expense reported in 2017 which included the $167,000 benefit recorded from a settlement reached with a professional service provider on an outstanding invoice. G&A expense in 2018 included combined one-time bonuses of $150,000 paid to our CEO and former Executive Chairman of the Board in recognition of their performance in the 2018 DSIT Transaction and $20,000 in the aggregate of transition consulting fees paid to our former CFO. Excluding these non-recurring items from 2017 and 2018, G&A expense decreased in 2018 by $205,000 as compared to 2017 due to reductions in corporate overhead, primarily in compensation expenses. We do not expect our annual corporate G&A expense to materially change in 2019 other than expenses that may be required to corporately support the growth in OmniMetrix. Non-cash stock compensation increased from $22,000 in 2017 to $26,000 in 2018.

The closing of the 2018 DSIT Transaction provided us with approximately $1.9 million after assigning $1.6 million of the amounts we owed to DSIT to the purchasers, paying transaction costs, withholding taxes and the repayment of director loans and associated accrued interest. In our sale of shares of DSIT Solutions Ltd. (“DSIT”), the Israel Tax Authorities (“ITA”) withheld tax of NIS 1,008,000, NIS 146,000 and NIS 1,359,000 in 2016, 2017 and 2018, respectively. Such amounts were recorded as expense ($266,000, $41,000, and $388,000) in each of those years. In August 2018, we received back from the ITA NIS 1,087,000 ($293,000 at the then exchange rate) consisting of $266,000 of tax, $21,000 of interest income and $6,000 of exchange gain.

We received the refund following the filing of our 2016 Israeli tax return in which we claimed that we were due a refund of the withheld taxes in full as we believe that each of the sale transactions is exempt from tax under Israeli tax law. The ITA did not timely respond to our refund claim for the 2016 tax withheld and under Israeli tax law was required to return the tax withheld in the 2016 transaction with interest. However, we had to provide a letter to the ITA stating that we understand that the return of the tax withheld resulting from our 2016 Israeli tax filing does not constitute the consent of the ITA to the method of reporting and the tax refund deriving from it and another letter whereby we committed not to transfer those funds received out of Israel until the end of the ITA’s review. The ITA has requested documentation of the transaction to begin its review of our position.

We have recorded the $222,000, net of fees of $65,000 offset by interest income of $21,000, as part of the gain (loss) on sale of interest of DSIT in the third quarter of 2018 relating to the 2016 DSIT transaction withholding. This offsets the loss on the 2018 DSIT transaction which reduced the loss recorded in 2018 to $607,000. We do not believe we will have to return such funds to the ITA at the end of the ITA’s review. However, as we committed not to transfer those funds out of Israel until the completion of the ITA’s review, such funds are deemed to be restricted and are reflected as such on our balance sheet as of December 31, 2018. By statute, the funds will no longer be restricted the earlier of December 31, 2022 or the completion of the ITA’s review of our tax position. We believe that the ITA will complete its review of our tax position by the end of 2019.

We have filed our Israeli tax return for 2017 and requested a refund of the tax withheld of NIS 146,000 (currently valued at $40,000 before interest) and plan to file our 2018 Israeli tax return and request a refund of the tax withheld of NIS 1,358,000 (currently valued at $375,000 before interest). We will record a tax benefit on the tax withheld in 2017 and 2018 if and when those monies are remitted back to us by the ITA.

As of March 22, 2019, Acorn’s corporate operations (excluding cash at our OmniMetrix subsidiary) held a total of approximately $781,000 in cash and cash equivalents (including restricted cash), of which $290,000 was restricted and held at a bank in Israel.

CRITICAL ACCOUNTING POLICIES

The SEC defines “critical accounting policies” as those that require application of management’s most difficult, subjective or complex judgments, often as a result of the need to make estimates about the effect of matters that are inherently uncertain and may change in subsequent periods.

The following discussion of critical accounting policies represents our attempt to report on those accounting policies, which we believe are critical to our consolidated financial statements and other financial disclosure. It is not intended to be a comprehensive list of all of our significant accounting policies, which are more fully described in Note 2 of the Notes to the Consolidated Financial Statements included in this Annual Report. In many cases, the accounting treatment of a particular transaction is specifically dictated by generally accepted accounting principles, with no need for management’s judgment in their application. There are also areas in which the selection of an available alternative policy would not produce a materially different result.

We have identified the following as critical accounting policies affecting our Company: principles of consolidation and investments in associated companies; revenue recognition, foreign currency transactions and stock-based compensation.

Principles of Consolidation and Investments in Associated Companies

Our consolidated financial statements include the accounts of all majority-owned subsidiaries. All intercompany balances and transactions have been eliminated.

Investments in other entities are accounted for using the equity method or cost basis depending upon the level of ownership and/or our ability to exercise significant influence over the operating and financial policies of the investee. Investments of this nature are recorded at original cost and adjusted periodically to recognize our proportionate share of the investee’s net income or losses after the date of investment. When net losses from an investment accounted for under the equity method exceed its carrying amount, the investment balance is reduced to zero and additional losses are not recorded. We resume accounting for the investment under the equity method when the entity subsequently reports net income and our share of that net income exceeds the share of net losses not recognized during the period the equity method was suspended. Investments are written down only when there is clear evidence that a decline in value that is other than temporary has occurred. In 2017 and 2018, we had no cost basis investments. Following the closing of the 2016 DSIT Transaction, we accounted for our investment in DSIT using the equity method.

The equity method of accounting is intended to be a single line consolidation and, therefore, generally should result in the same net income attributable to the investor as would be the case if the investee had been consolidated. The main impact on our consolidated financial statements is that, instead of DSIT’s results of operations and balance sheets affecting our consolidated line items, our proportionate share of net income or loss from DSIT is reported in equity income (loss) — net, in our consolidated income statements, and our investment in DSIT is reported as an equity method investment in our consolidated balance sheets.

23

Following the closing of the 2018 DSIT Transaction, we no longer have any equity method investments.

Revenue Recognition

Our revenue recognition policy is consistent with applicable revenue recognition guidance and interpretations. The core principle of ASC 606 is to recognize revenue when promised goods or services are transferred to customers in an amount that reflects the consideration that is expected to be received for those goods or services. ASC 606 defines a five-step process to achieve this core principle, which includes: (1) identifying contracts with customers, (2) identifying performance obligations within those contracts, (3) determining the transaction price, (4) allocating the transaction price to the performance obligation in the contract, which may include an estimate of variable consideration, and (5) recognizing revenue when or as each performance obligation is satisfied. We assess whether payment terms are customary or extended in accordance with normal practice relative to the market in which the sale is occurring. Our sales arrangements generally include standard payment terms. These terms effectively relate to all customers, products, and arrangements regardless of customer type, product mix or arrangement size.

If revenue recognition criteria are not satisfied, amounts received from customers are classified as deferred revenue on the balance sheet until such time as the revenue recognition criteria are met.

Sales of OmniMetrix monitoring systems include the sale of equipment (“HW”) and of monitoring services (“Monitoring”). Sales of OmniMetrix equipment do not qualify as a separate unit of accounting. As a result, revenue (and related costs) associated with sale of equipment are recorded to deferred revenue (and deferred charges) upon shipment for PG and CP monitoring units. Revenue and related costs with respect to the sale of equipment are recognized over the estimated life of the units which are currently estimated to be three years (two years up to December 31, 2017). Revenues from the prepayment of monitoring fees (generally paid twelve months in advance) are initially recorded as deferred revenue upon receipt of payment from the customer and then amortized to revenue over the monitoring service period. See Notes 16 and 17 for the disaggregation of our revenue for the periods presented.

Stock-based Compensation

We recognize stock-based compensation expense based on the fair value recognition provision of applicable accounting principles, using the Black-Scholes option valuation method. Accordingly, we are required to measure the cost of employee services received in exchange for an award of equity instruments based on the grant-date fair value of the award and to recognize that cost over the period during which an employee is required to provide service in exchange for the award. Under the Black-Scholes method, we make assumptions with respect to the expected lives of the options that have been granted and are outstanding, the expected volatility, the dividend yield percentage of our

common stock and the risk-free interest rate at the respective dates of grant.

For our Acorn options, the expected volatility factor used to value stock options in 2018 was based on the historical volatility of the market price of our common stock over a period equal to the expected term of the options. For the expected term of the option, we used an estimate of the expected option life based on historical experience. The risk-free interest rate used is based upon U.S. Treasury yields for a period consistent with the expected term of the options. We assumed no quarterly dividend rate. We recognize stock-based compensation expense on an accelerated basis over the requisite service period. Due to the numerous assumptions involved in calculating share-based compensation expense, the expense recognized in our consolidated financial statements may differ significantly from the value realized by employees on exercise of the share-based instruments. In accordance with the prescribed methodology, we do not adjust our recognized compensation expense to reflect these differences.

For the years ended December 31, 2018 and 2017, we incurred stock compensation expense with respect to options of approximately $26,000 and $22,000, respectively.

See Note 12 to the consolidated financial statements for the assumptions used to calculate the fair value of share-based employee compensation for our Acorn options.

RESULTS OF OPERATIONS

The selected consolidated statement of operations data for the years ended December 31, 2018 and 2017 and consolidated balance sheet data as of December 31, 2018 and 2017 has been derived from our audited Consolidated Financial Statements included in this Annual Report. The selected consolidated statement of operations data for the years ended December 31, 2016, 2015 and 2014 has been derived from our consolidated financial statements not included herein.

This data should be read in conjunction with our Consolidated Financial Statements and related notes included herein and “Item 7. Management’s Discussion and Analysis of Financial Condition and Results of Operations.”

Selected Consolidated Statement of Operations Data:

	For the Years Ended December 31,				
	2018	**2017**	**2016**	**2015**	**2014**
	(in thousands, except per share data)				
Revenue	$5,087	$4,350	$8,659	$16,548	$15,067
Cost of sales	1,965	1,903	5,134	10,381	9,726
Gross profit	3,122	2,447	3,525	6,167	5,341
Research and development expenses, net	542	518	927	1,705	1,618
Selling, general and administrative expenses	3,956	3,840	5,651	9,632	9,280
Restructuring and related charges	—	—	—	—	97
Operating loss	(1,376)	(1,911)	(3,053)	(5,170)	(5,654)
Finance income (expense), net	(104)	(231)	(572)	(327)	190
Loss before income taxes	(1,480)	(2,142)	(3,625)	(5,497)	(5,464)
Income tax expense		(41)	(19)	(209)	(163)
Net loss after income taxes	(1,480)	(2,183)	(3,644)	(5,706)	(5,627)
Impairment of investment in DSIT	(33)	(308)			
Share of income in DSIT	33	450	268	—	—
Gain (loss) on sale of interest in DSIT, net of transaction costs and withholding taxes	(607)		3,543	—	—
Income (loss) before discontinued operations	(2,087)	(2,041)	167	(5,706)	(5,627)
Income from discontinued operations, net of income taxes		698	(286)	(5,096)	(23,972)
Net loss	(2,087)	(1,343)	(119)	(10,802)	(29,599)
Non-controlling interest share of loss – continuing operations	86	174	264	105	47
Non-controlling interest share of loss - discontinued operations	—	—	—	98	2,407
Net income (loss) attributable to Acorn Energy, Inc. shareholders	$(2,001)	$(1,169)	$145	$(10,599)	$(27,145)
Basic and diluted net income (loss) per share attributable to Acorn Energy, Inc. shareholders:					

Income (loss) from continuing operations	$(0.07)	$(0.06)	$0.02	$(0.21)	$(0.25)
Loss from discontinued operations		0.02	(0.01)	(0.19)	(0.94)
Net income (loss) per share attributable to Acorn Energy, Inc. shareholders	$(0.07)	$(0.04)	$0.01	$(0.40)	$(1.19)
Weighted average number of shares outstanding attributable to Acorn Energy, Inc. shareholders – basic	29,540	29,423	28,488	26,803	22,844
Weighted average number of shares outstanding attributable to Acorn Energy, Inc. shareholders – diluted	29,540	29,423	28,531	26,803	22,844

The following table sets forth certain information with respect to revenues and profits of our reportable business segments for the years ended December 31, 2018 and 2017 (dollars in thousands), including the percentages of revenues attributable to such segments. (See Note 16 to our Consolidated Financial Statements for the definitions of our reporting segments).

	PG	CP	Total
Year ended December 31, 2018:			
Revenues from external customers	$3,656	$1,431	$5,087
Percentage of total revenues from external customers	72 %	28 %	100 %
Segment gross profit	2,524	598	3,122
Year ended December 31, 2017:			
Revenues from external customers	$3,355	$995	$4,350
Percentage of total revenues from external customers	77 %	23 %	100 %
Segment gross profit	2,017	430	2,447

2018 COMPARED TO 2017

Revenue. Consolidated revenue of $5,087,000 during 2018 reflected an increase of $737,000 or 17% as compared to 2017 revenues of $4,350,000. The increase in revenue was due to the increase in the volume of sales by OmniMetrix both in monitoring and equipment sales. OmniMetrix's revenue increased from $4,350,000 in 2017 to $5,087,000 in 2018. OmniMetrix recorded increased revenue in both its PG and CP activities. PG revenue increased from $3,355,000 in 2017 to $3,656,000 in 2018 (9%) while CP revenue increased from $995,000 in 2017 to $1,431,000 million in 2018 (44%). Increased revenue in both segments was the result of increased hardware sales and resultant monitoring revenue.

Gross profit. OmniMetrix's gross profit increased from $2,447,000 in 2017 to $3,122,000 in 2018. OmniMetrix's increased gross profit was attributable to a combination of its increased revenue and increased gross margin from 56% in 2017 to 61% in 2018. The increased gross margin is the result of increased gross margins in hardware revenue which grew from 27% in 2017 to 36% in 2018 while maintaining an 84% gross margin on monitoring revenue.

Research and development ("R&D") expense. R&D expense increased by $24,000 (5%) from $518,000 in 2017 to $542,000 in 2018 as OmniMetrix continues development of next-generation PG and CP monitors.

Selling, general and administrative expense ("SG&A"). SG&A expense in 2018 increased by $116,000 (3%) as compared to 2017. OmniMetrix's SG&A decreased from $2,712,000 in 2017 to $2,696,000 in 2018. The decrease at OmniMetrix was due to certain personnel vacancies that will be refilled in 2019. The increase in corporate expense from $1,128,000 in 2017 to $1,260,000 in 2018 reflected an increase of $132,000, or 12%, which includes the $167,000 benefit recorded from a settlement reached with a professional service provider on an outstanding invoice. SG&A expense in 2018 included combined one-time bonuses of $150,000 paid to our CEO and former Executive Chairman of the Board in recognition of their performance in the 2018 DSIT Transaction and $20,000 in the aggregate of transition consulting fees paid to our former CFO. Excluding these non-recurring items from 2017 and 2018, SG&A expense decreased in 2018 by $205,000 as compared to 2017 due to reductions in corporate overhead, primarily in compensation expenses.

26

Finance expense, net. Finance expense in 2018 was $104,000 compared to $231,000 in 2017. Finance expense in 2018 was primarily comprised of interest expense of $84,000 associated with OmniMetrix's line of credit, other OmniMetrix interest expense of $6,000, in addition to corporate interest expense of $23,000 net of Corporate interest income of $6,000 and currency exchange net gain of $3,000. Finance expense in 2017 was primarily comprised of corporate interest expense of $107,000 in interest to directors of Acorn as a result of their loans to us during 2017 and $34,000 of interest to DSIT on their loan and our outstanding balance of intercompany expenses to them as well as interest expense of $55,000 associated with OmniMetrix's line of credit.

Loss on sale of DSIT. In the first quarter of 2018, we closed on the sale of our remaining interests in DSIT Solutions Ltd., receiving gross proceeds of $5.8 million before transaction costs, professional fees and withholding taxes. We recorded a loss on the sale of $829,000. This loss was offset by $222,000, net of fees of $44,000, from a tax benefit received in 2018 which reduced the loss to $607,000.

Share of income in DSIT. Following the sale of DSIT in April 2016, we no longer consolidate their results, but rather record our share (approximately 41.2%) of their income (or loss). Our share of DSIT's income in the period prior to the sale of our remaining interest in DSIT was $33,000. In 2017, our share of DSIT's income was $450,000.

Impairment of investment in DSIT. As a result of the sale of our remaining interest in DSIT in February 2018 at a gross sales price of $5.8 million which was below the carrying value of our DSIT investment, we recorded an impairment of $308,000 as of December 31, 2017 to reduce the carrying value of our investment to the selling price at which we sold our investment. We recorded an additional impairment loss of $33,000, equivalent to our share of the 2018 DSIT income.

Income from discontinued operations, net of income taxes. During 2017, we recorded income net of income tax of $698,000 with respect to GridSense, primarily the result of the gain of $660,000 on the deconsolidation of GridSense. We did not have any income from discontinued operations in 2018.

Net loss attributable to Acorn Energy. We had a net loss attributable to Acorn Energy of $2,001,000 in 2018 as compared with a net loss of $1,169,000 in 2017. Our loss in 2018 is comprised of a loss at OmniMetrix of $206,000, corporate expense of $1,274,000 and the loss of $607,000 on the sale of our remaining interest in DSIT. These losses were partially offset by $86,000 representing the non-controlling interest share of our loss in OmniMetrix. Our 2017 results are comprised of corporate expenses of $1,312,000 and a loss at OmniMetrix of $871,000. These losses were offset by income of $698,000 at GridSense which is included in discontinued operations. In addition, we also recorded $450,000 as our share of DSIT's net income in 2017 which was offset by an impairment of $308,000 taken on our DSIT investment and $174,000 of non-controlling interests share in our losses.

LIQUIDITY AND CAPITAL RESOURCES

At December 31, 2018, we had a negative working capital of $651,000. Our working capital includes approximately $973,000 of cash (excluding restricted cash) and deferred revenue of approximately $2.7 million. Such deferred revenue does not require significant cash outlay for the revenue to be recognized. Net cash increased during the year ended December 31, 2018 by $492,000, of which $2,423,000 was used in operating activities, $4,971,000 was provided by investing activities, $2,053,000 was used in financing activities and the effect of the exchange rate was $3,000.

During the year ended December 31, 2018, we used $2,423,000 in operating activities. Our OmniMetrix subsidiary used $19,000 in its operations while our corporate headquarters used $2,404,000 during the same period. Of the cash used in our corporate operating activities, $1,521,000 was used to pay off accumulated unpaid operating expenses previously funded by loans from directors and through advances in previous periods by DSIT.

Net cash of $4,971,000 was provided by investing activities from the sale of our remaining shares of DSIT.

Net cash of $2,053,000 was used in financing activities during the year ended December 31, 2018. During the period, we repaid $1.4 million of director loans which were received in 2017 and we repaid our $340,000 loan from DSIT. In addition, OmniMetrix made net payments of $313,000 under its Loan and Security Agreement (see below).

In October 2017, OmniMetrix renewed its Loan and Security Agreement with a lender providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1.0 million (an increase of $500,000 from the previous Loan and Security Agreement). Debt incurred under this financing arrangement bore interest at the greater of prime (4.5% at December 31, 2017) plus 2% or 6% per year. In addition, OmniMetrix paid a monthly service charge of 0.9% of the average aggregate principal amount outstanding for the prior month, for an effective rate of interest on advances of 17.3%. OmniMetrix also agreed to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of one year beginning November 1, 2017. OmniMetrix allowed this line to expire according to its terms at October 31, 2018.

In March 2019, OmniMetrix reinstated its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1 million. Debt incurred under this financing arrangement bears interest at the greater of 6% and prime (5.5% at March 22, 2019) plus 1.5% per year. In addition, OmniMetrix is to pay a monthly service charge of 0.75% of the average aggregate principal amount outstanding for the prior month, for a current effective rate of interest on advances of 16%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of two years beginning March 1, 2019.

Additional financing for OmniMetrix may be in the form of a bank line, a new loan or investment by others, a loan by Acorn, or a combination of the above. The availability and amount of any additional loans from us to OmniMetrix may be limited by the working capital needs of our corporate activities. Whether Acorn will have the resources necessary to provide funding, or whether alternative funds, such as third-party loans, will be available at the time and on terms acceptable to Acorn and OmniMetrix cannot be determined at this time.

In 2015, Edgar S. Woolard, Jr., one of our then-current directors, acquired a 20% interest in our OmniMetrix Holdings, Inc. subsidiary ("Holdings") through the purchase of preferred stock (the "Preferred Stock") for $1.0 million. Holdings is the holder of 100% of the membership interests OmniMetrix, LLC, through which our OmniMetrix subsidiary operates.

A dividend of 10% per annum accrued on the Preferred Stock. The dividend was payable on the first anniversary of the funding of the investment and quarterly thereafter for so long as the Preferred Stock is outstanding and has not been converted to OmniMetrix common stock. Through December 31, 2016, a dividend payable of $115,000 was recorded with respect to the Preferred Stock. On December 31, 2016, Mr. Woolard agreed to treat these accrued dividends and all subsequent accrued and unpaid dividends as a loan to Holdings which bears interest at 8% per year. In December 2016, Mr. Woolard provided Holdings with an additional $50,000 loan under the same terms as the abovementioned accrued dividends.

On May 14, 2018, Holdings and Mr. Woolard entered into an agreement whereby effective May 1, 2018, the dividend on the Preferred Stock was reduced to 8%. In addition, all the amounts due to Mr. Woolard (accrued dividends, loan and accrued interest) and all future dividends that shall accrue on the Preferred Stock through June 30, 2020, will be paid by Holdings pursuant to an agreed-upon payment schedule which ends on June 30, 2020. During the year ended December 31, 2018, Holdings made payments of $100,000 in the aggregate in accordance with the agreed-upon payment schedule and additional quarterly dividends of $87,000 in the aggregate were accrued. At December 31, 2018, the obligation to Mr. Woolard was $283,000, representing unpaid accrued dividends. This amount, in addition to all future dividends that shall accrue on the Preferred Stock, will be paid by Holdings to Mr. Woolard quarterly as follows:

In the year ending December 31, 2019	$250,000
In the six-month period ended June 30, 2020	$153,000

Dividends shall be paid only to the extent provided under Holdings' Amended and Restated Certificate of Incorporation and as permitted under applicable law.

In addition to the amounts owed to Mr. Woolard (who resigned from the board on August 6, 2018), OmniMetrix owes Acorn approximately $3.9 million for loans, accrued interest and expenses advanced to it by Acorn. Such amounts will only be repaid to Acorn when OmniMetrix is generating sufficient cash to allow such repayment.

We had approximately $973,000 of cash (excluding restricted cash of $290,000) on December 31, 2018, and approximately $814,000 (excluding restricted cash of $290,000) on March 22, 2019. We believe that our current cash plus the cash expected to be generated from operations and borrowing from available lines of credit will provide sufficient liquidity to finance the operating activities of Acorn and the operations of its operating subsidiaries for at

least the next twelve months.

Contractual Obligations and Commitments

The table below provides information concerning obligations under certain categories of our contractual obligations as of December 31, 2018.

CASH PAYMENTS DUE TO CONTRACTUAL OBLIGATIONS

	Years Ending December 31, (in thousands)				
	Total	**2019**	**2020-2021**	**2022-2023**	**2024 and thereafter**
Debt	$	$	$ —	$ —	$ —
Software agreements	65	21	42	2	
Operating leases	109	109		—	—
Due to former director (1)	283	250	33	—	—
Total contractual cash obligations	$457	$380	$ 75	$ 2	$ —

(1) Represents accrued unpaid dividends due to Edgar S. Woolard, Jr., on his shares of OmniMetrix Preferred Stock. Such dividends shall be paid only to the extent provided under the Amended and Restated Certificate of Incorporation of OmniMetrix Holdings, Inc., and as permitted by applicable law.

ITEM 7A. QUANTITATIVE AND QUALITATIVE DISCLOSURE ABOUT MARKET RISK

General

We are required to make certain disclosures regarding our financial instruments, including derivatives, if any.

A financial instrument is defined as cash, evidence of an ownership interest in an entity, or a contract that imposes on one entity a contractual obligation either to deliver or receive cash or another financial instrument to or from a second entity. Examples of financial instruments include cash and cash equivalents, deposits, trade accounts receivable, loans, investments, trade accounts payable, accrued expenses, options and forward contracts. The disclosures below include, among other matters, the nature and terms of derivative transactions, information about significant concentrations of credit risk, and the fair value of financial assets and liabilities.

Fair Value of Financial Instruments

Fair values of financial instruments included in current assets and current liabilities are estimated to approximate their book values due to the short maturity of such investments.

Concentrations of Credit Risk

Financial instruments, which potentially subject the Company to concentrations of credit risk, consist principally of cash and cash equivalents and trade accounts receivable. The Company’s cash and cash equivalents were deposited primarily with U.S. banks and brokerage firms and amounted to $973,000, excluding restricted cash of $290,000 held at a bank in Israel, at December 31, 2018. Approximately 17% of the accounts receivable at December 31, 2018 was due from one customer who pays its receivables over usual credit periods. Credit risk with respect to the balance of trade receivables is generally diversified due to the number of entities comprising the Company’s customer base. The Company does not believe there is significant risk of non-performance by these counterparties.

Interest Rate Risk

In October 2017, OmniMetrix renewed its Loan and Security Agreement with a lender providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1.0 million (an increase of $500,000 from the previous Loan and Security Agreement). Debt incurred under this financing arrangement bore interest at the greater of prime (4.5% at December 31, 2017) plus 2% or 6% per year. In addition, OmniMetrix paid a monthly service charge of 0.9% of the average aggregate principal amount outstanding for the prior month, for an effective rate of interest on advances of 17.3%. OmniMetrix also agreed to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of one year beginning November 1, 2017. This Loan and Security Agreement terminated pursuant to its terms October 31, 2018. The balance outstanding under this agreement was paid as of November 6, 2018.

In March 2019, OmniMetrix reinstated its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1 million. Debt incurred under this financing arrangement bears interest at the greater of 6% and prime (5.5% at March 22, 2019) plus 1.5% per year. In addition, OmniMetrix is to pay a monthly service charge of 0.75% of the average aggregate principal amount outstanding for the prior month, for a current effective rate of interest on advances of 16%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150,000 in its line-of-credit with the lender for a minimum of two years beginning March 1, 2019.

ITEM 8. FINANCIAL STATEMENTS AND SUPPLEMENTARY DATA

Furnished at the end of this report commencing on page F-1.

ITEM 9. CHANGES IN AND DISAGREEMENTS WITH ACCOUNTANTS ON ACCOUNTING AND FINANCIAL DISCLOSURE

None.

ITEM 9A. CONTROLS AND PROCEDURES

Evaluation of Disclosure Controls and Procedures

Our management, with the participation of our Chief Executive Officer and Chief Financial Officer, has evaluated the effectiveness of the design and operation of our disclosure controls and procedures (as defined in Rule 13a-15(e) under the Securities Exchange Act of 1934, as amended (the "Act") as of the end of the period covered by this annual report on Form 10-K. Based on this evaluation, our Chief Executive Officer and Chief Financial Officer concluded that, due to the material weaknesses in our internal control over financial reporting as described below, our disclosure controls and procedures were not effective as of December 31, 2018.

Internal Control Over Financial Reporting

Management is responsible for establishing and maintaining adequate internal control over financial reporting, as such term is defined in Exchange Act Rule 13a-15(f). Under the supervision and with the participation of our management, including our Chief Executive Officer and Chief Financial Officer, we conducted an evaluation of the effectiveness of our internal control over financial reporting as of December 31, 2018 based upon the document "Internal Control - Integrated Framework (2013)" issued by the Committee of Sponsoring Organizations of the Treadway Commission ("COSO"). Based upon this assessment and those criteria, management concluded that due to the material weaknesses described below, our internal control over financial reporting was not effective as of December 31, 2018.

The Company employs a decentralized internal control methodology, coupled with management's oversight, whereby each subsidiary is responsible for mitigating its risks to financial reporting by implementing and maintaining effective control policies and procedures and subsequently translating that respective risk mitigation up and through to the parent level and to the Company's external financial statements. Also, as the Company's subsidiary is not large enough to effectively mitigate certain risks by segregating incompatible duties, management must employ compensating mechanisms throughout the Company in a manner that is feasible within the constraints it operates.

The material weaknesses management identified were caused by an insufficient complement of resources at the Company's OmniMetrix subsidiary and limited IT system capabilities, such that individual control policies and procedures could not be implemented, maintained, or remediated when and where necessary. As a result, a majority of the significant process areas management identified for the Company's OmniMetrix subsidiary had one or more material weaknesses present. This condition was further exacerbated as the Company could not demonstrate that each of the principles described within COSO's document "Internal Control - Integrated Framework (2013)" were present and functioning.

Although a material weakness is defined as a deficiency, or a combination of deficiencies in internal control over financial reporting, such that there is a reasonable possibility that a material misstatement of the Company's annual or interim financial statements will not be prevented or detected on a timely basis, this material weakness did not result in any material misstatements of the Company's consolidated financial statements and disclosures for any interim periods during, or for the annual period ended December 31, 2018.

Remediation Actions

Management intends to strengthen the Company's internal controls. Management expects to make progress towards reducing the risk that the material weakness could result in a material misstatement of the Company's annual or interim financial statements. As business conditions allow and resources permit, management will systematically build the necessary capabilities and infrastructure to implement corrective action.

Changes in Internal Control Over Financial Reporting

Other than those changes associated with our material weakness described above and the corresponding remediation actions, there was no change in our internal control over financial reporting (as defined in Rule 13a-15(f) under the Securities Exchange Act of 1934, as amended), during our last fiscal year that has materially affected, or is reasonably likely to materially affect, our internal control over financial reporting.

ITEM 9B. OTHER INFORMATION

None.

PART III

ITEM 10. DIRECTORS, EXECUTIVE OFFICERS AND CORPORATE GOVERNANCE

Directors and Executive Officers

Set forth below is certain information concerning the directors and certain officers of the Company:

Name	Age	Position
Jan H. Loeb	60	Director, President and Chief Executive Officer
Gary Mohr	60	Director and member of our Audit, Nominating and Compensation Committees
Michael F. Osterer	73	Director and member of our Audit, Nominating and Compensation Committees
Samuel M. Zentman	73	Director, Chairman of our Audit Committee and member of our Nominating and Compensation Committees
Tracy S. Clifford	50	Chief Financial Officer
Walter Czarnecki	40	President and CEO of OmniMetrix

Jan H. Loeb has served as our President and CEO since January 28, 2016. He was appointed to our Board in August 2015 pursuant to the terms of our Loan and Security Agreement with Leap Tide Capital Partners III, LLC (the "Leap Tide Loan Agreement"). He was also appointed to the Board of our then subsidiary DSIT in August 2015 pursuant to the terms of the Leap Tide Loan Agreement and held that position until the recent sale of our remaining interest in DSIT in February 2018. Mr. Loeb has more than 35 years of money management and investment banking experience. He has been the Managing Member of Leap Tide Capital Management LLC since 2007. From 2005 to 2007, he served as the President of Leap Tide's predecessor, Leap Tide Capital Management Inc., which was formerly known as AmTrust Capital Management Inc. He served as a Portfolio Manager of Chesapeake Partners from February 2004 to January 2005. From January 2002 to December 2004, he served as Managing Director at Jefferies & Company, Inc. From 1994 to 2001, he served as Managing Director at Dresdner Kleinwort Wasserstein, Inc. (formerly Wasserstein Perella & Co., Inc.). He served as a Lead Director of American Pacific Corporation from July 8, 2013 to February 27, 2014, and also served as its Director from January 1997 to February 27, 2014. He served as an Independent Director of Pernix Therapeutics Holdings Inc. (formerly, Golf Trust of America, Inc.) from 2006 to August 31, 2011. He served as a Director of TAT Technologies, Ltd. from August 2009 to December 21, 2016. He has been a Director of Keweenaw Land Association, Ltd. since December 2016.

Key Attributes, Experience and Skills. Mr. Loeb brings to the Acorn Board significant financial expertise, cultivated over more than 35 years of money management and investment banking experience, together with a background in public company management and audit committee experience.

34

Gary Mohr was elected to the Board in August 2018 and is a member of our Audit, Compensation and Nominating Committees. Mr. Mohr is President of UE Systems, Incorporated, an international technology company specializing in the field of plant asset reliability through ultrasound. Mr. Mohr started with UE Systems in 1988 as a salesman and rapidly progressed through the ranks as regional sales manager, National Sales Manager, Vice President and eventually President of the company. It is through Mr. Mohr's stewardship that UE Systems has grown from a national brand to an international company with offices in Toronto, Mexico City, Hong Kong, India and the Netherlands, and developed a list of loyal customers, including those in the Fortune 500.

Key Attributes, Experience and Skills. Mr. Mohr brings to the Board a broad range of operational and managerial experience, including a successful track record in product development and marketing leadership.

Michael F. Osterer was elected to the Board in August 2018 and is a member of our Audit, Compensation and Nominating Committees. He served as an advisor to our Board from October 2017 until his election as director. Since 1973, Mr. Osterer has served as Chairman of the Board of UE Systems, Incorporated, a leader in the field of plant asset reliability through ultrasound, which he founded in 1973. He also served as President of UE Systems from 1973 to 1985. Since 1987, Mr. Osterer has served as President of Libom Oil, an oil exploration, drilling and purchasing company, which he founded in 1987. He is the Acting Chairman of the Board of Radon Testing Corporation of America, Inc., which he founded in 1985 and where he served as President from 1985 through 1989. Mr. Osterer also founded Westchester Consultants, a general business consultancy nationally recognized for branding expertise of food products. He served in the United States Air Force/Air National Guard, 105th Airborne Division, from 1964 through 1970. Mr. Osterer graduated from Fordham University with a BA in Social Sciences, *Magna Cum Laude*.

Key Attributes, Experience and Skills. Mr. Osterer brings to Acorn a wealth of operational and managerial experience gained over his long history of successful entrepreneurial pursuits, corporate leadership and oversight.

Samuel M. Zentman has been one of our directors since November 2004 and currently serves as Chairman of our Audit Committee and as a member of our Compensation and Nominating Committees. From 1980 until 2006, Dr. Zentman was the president and chief executive officer of a privately-held textile firm, where he also served as vice president of finance and administration from 1978 to 1980. From 1973 to 1978, Dr. Zentman served in various capacities at American Motors Corporation. He holds a Ph.D. in Complex Analysis. Dr. Zentman serves on the board of Hinson & Hale Medical Technologies, Inc., as well as several national charitable organizations devoted to advancing the quality of education.

Key Attributes, Experience and Skills. Dr. Zentman's long-time experience as a businessman together with his experience with computer systems and software enables him to bring valuable insights to the Board. Dr. Zentman has a broad, fundamental understanding of the business drivers affecting our Company and also brings leadership and oversight experience to the Board.

Tracy S. Clifford was appointed as the Company's Chief Financial Officer on June 1, 2018 and serves as such pursuant to a Consulting Agreement between the Company and Tracy Clifford Consulting, LLC. Ms. Clifford is President and Owner of Tracy Clifford Consulting, LLC, through which she has been providing contract CFO/COO services and other advisory services and project engagements since June 2015. Between October 1999 and May 2015, she served as CFO, Principal Accounting Officer, Corporate Controller and Secretary for a publicly-traded pharmaceutical company and a publicly-traded REIT. Her prior experience includes accounting leadership positions at United Healthcare (Atlanta) and the North Broward Hospital District (Fort Lauderdale) and work on the audit team of Deloitte & Touche (Miami). Ms. Clifford obtained a Bachelor of Science Degree in Accounting from the College of Charleston and a Master's Degree in Business Administration with a concentration in Finance from Georgia State University. Ms. Clifford is a licensed CPA in the state of South Carolina and holds a Certification in the Fundamentals of Forensic Accounting from the AICPA.

Walter Czarnecki serves as President and CEO of OmniMetrix. Mr. Czarnecki has over 15 years of management, strategy and P&L leadership experience building high-growth companies in technology and energy across global markets. Prior to his appointment at OmniMetrix, Walter served as Vice President of Business Development at Acorn, and previously as Director of Corporate Strategy at Ener1, Inc., a maker of lithium-ion energy storage solutions for electric vehicles, grid storage and military applications. There he negotiated and managed Ener1's joint venture with China's largest Tier I auto parts supplier, Wanxiang, a $26 billion global conglomerate. Prior to Ener1, Walter spent four years in Beijing, where he led the Energy Technology team for China Renaissance Group, a Chinese investment bank with over $80 billion in transactions. Prior to China Renaissance, Walter established the University of Maryland's China strategy and increased revenue by $3.6 million. He began his career at Lehman Brothers Investment Banking in New York. Walter holds an MBA in Finance from the Wharton School and an MA in International Studies with a focus on Mandarin and East Asian Studies from the Lauder Institute at the University of Pennsylvania. He is professionally proficient in Mandarin Chinese and graduated Phi Beta Kappa from Bucknell University. In 2015, Walter was named in Wharton's 40 Under 40 list. Walter serves as President of Technology Executives Roundtable, a leadership forum for Atlanta technology CEOs and CFOs.

Audit Committee; Audit Committee Financial Expert

The Company has a separate designated standing Audit Committee established and administered in accordance with SEC rules. The three members of the Audit Committee are Samuel M. Zentman (who serves as Chairman of the Audit Committee), Gary Mohr and Michael F. Osterer. The Board of Directors has determined that each member of the Audit Committee meets the independence criteria prescribed by NASDAQ governing the qualifications for audit committee members and each Audit Committee member meets NASDAQ's financial knowledge requirements. Our Board has determined that Dr. Zentman qualifies as an "audit committee financial expert," as defined in the rules and regulations of the SEC.

Compensation Committee

Our executive compensation is administered by the Compensation Committee of the Board of Directors, which was reconstituted in 2017. The members of the Compensation Committee are Gary Mohr, Michael F. Osterer and Samuel M. Zentman, all of whom have been determined by the Board to be independent in accordance with NASDAQ's requirement for independent director oversight of executive officer compensation.

Nominating Committee

The Nominating Committee of our Board of Directors, which was reconstituted in 2017, has overall responsibility for identifying, evaluating, recruiting and selecting qualified candidates for election, re-election or appointment to the Board. The Members of the Nominating Committee are Gary Mohr, Samuel M. Zentman and Michael Osterer all of whom have been determined by the Board to meet the independence criteria prescribed by NASDAQ governing the qualifications of nominating committee members.

Our stockholders may recommend potential director candidates by contacting the Secretary of the Company to receive a copy of the procedure to recommend a potential director candidate for consideration by the Nominating Committee, who will evaluate recommendations from stockholders in the same manner that they evaluate recommendations from other sources.

Section 16(a) Beneficial Ownership Reporting Compliance

Section 16(a) of the Securities Exchange Act of 1934 (the "Exchange Act") requires our executive officers and directors, and persons who own more than 10% of a registered class of our equity securities to file reports of ownership and changes in ownership with the SEC. These persons are also required by SEC regulation to furnish us with copies of all Section 16(a) forms they file. Further, we have implemented measures to assure timely filing of Section 16(a) reports by our executive officers and directors. Based solely on our review of such forms or written representations from certain reporting persons, we believe that during 2018 our executive officers and directors complied with the filing requirements of Section 16(a).

Code of Ethics

We have adopted a Code of Business Conduct and Ethics that applies to all our directors, officers and employees. This code of ethics is designed to comply with the NASDAQ marketplace rules related to codes of conduct. Our code of ethics may be accessed on the Internet under "Investor Relations" on our website at www.acornenergy.com. We intend to satisfy any disclosure requirement under Item 5.05 of Form 8-K regarding an amendment to, or waiver from, a provision of our code of ethics by posting such information on our website, www.acornenergy.com.

ITEM 11. EXECUTIVE COMPENSATION

EXECUTIVE AND DIRECTOR COMPENSATION

Summary Compensation Table

Name and Principal Position	Year	Salary ($)	Bonus ($)	Option Awards ($)	All Other Compensation ($)	Total ($)
Jan H. Loeb	2018	159,000 (4)	100,000 (5)	9,800 (6)	—	268,800
President and CEO (1)	2017	204,000 (4)	—	9,282 (7)	—	213,282
Tracy S. Clifford	2018	61,875 (4)	—	8,100 (8)	—	69,975
CFO (2)						
Michael Barth	2018	83,871	—	—	32,192 (9)	103,871
CFO and CFO of DSIT(3)	2017	197,726	21,165 (10)	—	30,896 (11)	249,787
Walter Czarnecki	2018	222,696	—	—	—	222,696
CEO and President of OmniMetrix	2017	211,667	—	—	—	211,667

(1) Mr. Loeb was appointed as President and CEO on January 28, 2016.
(2) Ms. Clifford was appointed CFO on June 1, 2018.
(3) Mr. Barth resigned as CFO on June 1, 2018.
(4) Represents the consulting fee paid for the provision of Mr. Loeb's services to the Company as President and CEO and of Ms. Clifford's services to the Company as CFO, respectively.
(5) Consists of a bonus paid in connection with the closing of the sale of the remaining interest in DSIT.
(6) Represents the grant date fair value calculated in accordance with applicable accounting principles with respect to 35,000 options granted on May 1, 2018 with an exercise price of $0.35. The fair value of the options was determined using the Black-Scholes option pricing model using the following assumptions: (i) a risk-free interest rate of 2.69% (ii) an expected term of 3.4 years (iii) an assumed volatility of 129% and (iv) no dividends.
(7) Represents the grant date fair value calculated in accordance with applicable accounting principles with respect to 35,000 options granted on February 21, 2017 with an exercise price of $0.36. The fair value of the options was determined using the Black-Scholes option pricing model using the following assumptions: (i) a risk-free interest rate of 2.24% (ii) an expected term of 7.0 years (iii) an assumed volatility of 84% and (iv) no dividends.
(8) Represents the grant date fair value calculated in accordance with applicable accounting principles with respect to 30,000 options granted on June 1, 2018 with an exercise price of $0.41. The fair value of the options was determined using the Black-Scholes option pricing model using the following assumptions: (i) a risk-free interest rate of 2.67% (ii) an expected term of 4.0 years (iii) an assumed volatility of 124% and (iv) no dividends.
(9) Consists of $12,192 of automobile fringe benefits and the gross-up value of income taxes on such benefits and $20,000 of post-employment transition consulting fees.

(10) Consists of a bonus from DSIT.
(11) Consists of automobile fringe benefits and the gross-up value of income taxes on such benefits.

Executive compensation for 2018. Changes in each named executive officer's base compensation for 2018, together with the methodology for determining their respective bonuses, if any, are described below. The Boards of Directors of our companies (DSIT and OmniMetrix) determined the compensation of their own executive officers and other employees.

Jan H. Loeb. On April 9, 2018, the Company entered into a new consulting agreement (the "2018 Consulting Agreement") with Mr. Loeb extending its arrangements for compensation of Mr. Loeb for his services as President and CEO of the Company. Following the expiration of the 2017 Consulting Agreement (as defined below) on January 7, 2018, and through April 30, 2018, Mr. Loeb continued to provide the consulting and other services to the Company called for in the agreement, and was compensated at the same rate of monthly cash compensation provided for in, the 2017 Consulting Agreement.

Pursuant to the 2018 Consulting Agreement, Mr. Loeb receives cash compensation of $12,000 per month commencing May 1, 2018. Mr. Loeb also received a bonus of $100,000 in recognition of his performance in the sale of the Company's shares of DSIT Solutions Ltd. He is eligible for two additional bonuses during the term of the 2018 Consulting Agreement: $150,000 upon consummation of a corporate acquisition transaction approved by the Company's Board, and $150,000 upon consummation of a corporate financing/funding transaction approved by the Company's Board. Mr. Loeb also received a grant on May 1, 2018, of options to purchase 35,000 shares of the Company's common stock, which shall be exercisable at a price of $0.35 per share (the closing price for the common stock on the last trading day preceding the date of the grant). Fifty percent (50%) of the options vested immediately; the remaining options vested in two equal increments on July 1, 2018 and October 1, 2018. The options will expire on the earlier of January 1, 2025 or 18 months from the date Mr. Loeb ceases to be a director, officer, employee or consultant of the Company.

The 2018 Consulting Agreement expires on December 31, 2019, unless terminated early as provided therein.

Tracy S. Clifford. On June 1, 2018, Tracy S. Clifford was appointed CFO of the Company, replacing outgoing CFO, Michael Barth, who resigned from this position as of that date. Concurrent with the appointment of Ms. Clifford as CFO, the Company entered into a consulting arrangement with Ms. Clifford pursuant to which she receives a monthly fee of $8,500, increased to $9,500 effective November 1, 2018 as allowed by the agreement for the additional hours worked in excess of the average monthly hours covered by the original retainer, in exchange for her services as CFO. Mr. Clifford is not an employee of the Company. Ms. Clifford also received a grant on June 1, 2018 of options to purchase 30,000 shares of our common stock, with an exercise price of $0.41 per share, which was the closing price of the common stock on May 31, 2018. The options will vest and become exercisable on the first anniversary of the date of grant and shall expire upon the earlier of (a) seven years from grant or (b) 18 months from the date Ms. Clifford ceases to be a consultant to the Company. At the beginning of each additional one-year term, the Company shall grant Ms. Clifford an additional 30,000 stock options, which shall have an exercise price equal to the most recent closing price immediately preceding the grant date and otherwise have the same terms as the options described above.

Michael Barth. Mr. Barth resigned as CFO of the Company effective June 1, 2018. During 2018, Mr. Barth received base compensation of $83,871 for the period through May 31, 2018. Mr. Barth's compensation is denominated in New Israel Shekel (NIS) and was unchanged in NIS as compared to 2017. In US dollars, Mr. Barth's base compensation increased approximately $3,000 over the comparable 2017 period due to the weakening of the US dollar during the period. He received a cash bonus of $21,165 for 2017 in accordance with the terms of his contract whereby he is entitled to a bonus payment equal to 1.50% of DSIT's net income before income taxes. Mr. Barth received no bonus from DSIT in 2018 and no bonus from Acorn in 2017 or 2018. Following his resignation as CFO, Mr. Barth also received $20,000 of compensation of transition consulting fees.

Walter Czarnecki. Mr. Czarnecki's base compensation was increased to $242,000 from $220,000 effective June 1, 2018 pursuant to the terms of his employment agreement.

Stockholder input on executive compensation. Stockholders can provide the Company with their views on executive compensation matters at each year's annual meeting through the stockholder advisory vote on executive compensation and during the interval between stockholder advisory votes. The Company welcomes stockholder input on our executive compensation matters, and stockholders are able to reach out directly to our independent directors by emailing to samzentman@yahoo.com to express their views on executive compensation matters.

Employment Arrangements

The employment arrangements of each named executive officer and certain other officers are described below. From time to time, the Company has made discretionary awards of management options as reflected in the table above.

Jan H. Loeb. Concurrent with the appointment of Mr. Loeb as President and CEO of the Company on January 28, 2016, the Company entered into a consulting arrangement (the "2016 Consulting Arrangement") with Leap Tide Capital Management LLC pursuant to which Leap Tide Capital Management LLC received 35,000 warrants with an exercise price of $0.13 and a monthly fee of $17,000 and provided the services of Mr. Loeb to the Company as President and CEO and such other services mutually agreed upon with the Company. Mr. Loeb is not an employee of the Company and did not receive any cash compensation from the Company in connection with his service as President and CEO in 2016. The 2016 Consulting Arrangement expired on January 7, 2017.

On February 21, 2017, the Company entered into a new consulting arrangement effective January 8, 2017 (the "2017 Consulting Arrangement") between the Company and Mr. Loeb extending its arrangements for compensation of Mr. Loeb for his services as President and CEO of the Company. Pursuant to the 2017 Consulting Arrangement, Mr. Loeb received cash compensation of $17,000 per month and a grant on February 21, 2017, of options to purchase 35,000 shares of Company common stock exercisable at a price of $0.36 per share (the closing price for the common stock on the last trading day preceding the date of the grant). These options vested and became exercisable on the same terms as the stock options granted to directors of the Company, with one-fourth immediately exercisable and the remainder becoming exercisable in equal increments on each of April 1, 2017, July 1, 2017 and October 1, 2017. The options will expire on the earlier of January 8, 2024 or 18 months from the date Mr. Loeb ceases to be a director, officer, employee or consultant of the Company.

The 2017 Consulting Agreement expired on January 7, 2018. On April 9th, 2018, the Company entered into a new consulting agreement (the "2018 Consulting Agreement") with Mr. Loeb extending its arrangements for compensation of Mr. Loeb for his services as President and CEO of the Company. Following the expiration of the 2017 Consulting Agreement and through April 30, 2018, Mr. Loeb continued to provide the consulting and other services to the Company called for and was compensated at the same rate of monthly cash compensation provided for in, the 2017 Consulting Agreement.

Pursuant to the 2018 Consulting Agreement, Mr. Loeb receives cash compensation of $12,000 per month commencing May 1, 2018. Mr. Loeb also received a bonus of $100,000 in recognition of his performance in the sale of the Company's shares of DSIT Solutions Ltd. He is eligible for two additional bonuses during the term of the 2018 Consulting Agreement: $150,000 upon consummation of a corporate acquisition transaction approved by the Company's Board, and $150,000 upon consummation of a corporate financing/funding transaction approved by the Company's Board. Mr. Loeb also received a grant on May 1, 2018, of options to purchase 35,000 shares of the Company's common stock, which shall be exercisable at a price of $0.35 per share (the closing price for the common stock on the last trading day preceding the date of the grant). Fifty percent (50%) of the options vested immediately; the remaining options vested in two equal increments on July 1, 2018 and October 1, 2018. The options will expire on the earlier of January 1, 2025 or 18 months from the date Mr. Loeb ceases to be a director, officer, employee or consultant of the Company.

The 2018 Consulting Agreement expires on December 31, 2019, unless terminated early as provided therein.

Tracy S. Clifford became our CFO on June 1, 2018. Concurrent with the appointment of Ms. Clifford, Acorn entered into a Consulting Agreement with Tracy Clifford Consulting, LLC, for the provision of the services of Tracy Clifford as Acorn's Chief Financial Officer. In such capacity, Ms. Clifford will be acting as a consultant to, and not an employee of, Acorn. The initial term of the Consulting Agreement began on June 1, 2018, and expires on June 1, 2019, and will automatically renew unless terminated as provided therein. Pursuant to the Consulting Agreement, Ms. Clifford began receiving cash compensation of $8,500 per month commencing June 1, 2018. Ms. Clifford will also receive additional cash compensation at the rate of $200 per hour for each hour worked in excess of an aggregate of five hundred twenty (520) hours during any one-year term. Ms. Clifford also received a grant on June 1, 2018 of options to purchase 30,000 shares of the Company's common stock, with an exercise price of $0.41 per share, which was the closing price of the common stock on May 31, 2018. The options will vest and become exercisable on the first anniversary of the date of grant and shall expire upon the earlier of (a) seven years from grant or (b) 18 months from the date Ms. Clifford ceases to be a consultant to the Registrant. At the beginning of each additional one-year term, the Company shall grant Ms. Clifford an additional 30,000 stock options, which shall have an exercise price equal to the most recent closing price immediately preceding the grant date and otherwise have the same terms as the options described above. Ms. Clifford's monthly consulting fee was increased to $9,500 effective November 1, 2018 to cover the additional hours worked in excess of the hours provided by the original retainer.

Michael Barth served as CFO of the Company and Chief Financial Officer of DSIT beginning December 1, 2005. Until his resignation as CFO of the Company effective May 31, 2018. In August 2009, the Board approved new employment terms for Mr. Barth. According to the new employment terms, Mr. Barth was entitled to a salary of $175,000 per annum effective August 1, 2009. One half of Mr. Barth's salary was fixed in NIS at the November 1, 2007 exchange rate and linked to the Israel CPI and adjusted semi-annually. The cost of Mr. Barth's total compensation (excluding bonuses) was shared by an arrangement between Acorn (75%) and DSIT (25%). Mr. Barth's annual salary following such linkage adjustments at the time of his resignation was approximately $198,000. Each of Acorn and DSIT separately determine any bonus (if any) to be paid to Mr. Barth. In September 2012, DSIT's board of directors made Mr. Barth eligible to receive an annual bonus equal to 1.5% of DSIT's annual consolidated net income before tax, to be calculated and paid as soon as practicable following the end of DSIT's fiscal year beginning with 2012. For 2017 and 2018, Mr. Barth did not receive any bonus from Acorn. For 2018, Mr. Barth did not receive a bonus based on DSIT's performance. For 2017, Mr. Barth received a bonus of $21,165 based on DSIT's 2017 performance.

Walter Czarnecki. Mr. Czarnecki has served as President and COO of OmniMetrix since March 2014 and as CEO since March 2015. Until June 1, 2017, Mr. Czarnecki had no employment agreement and was employed on an "at-will" basis. Mr. Czarnecki's annual salary for 2016 and until June 1, 2017 was $200,000. Mr. Czarnecki and OmniMetrix entered into an Employment Agreement on June 19, 2017. The Employment Agreement has a three-year term and provides for a base annual salary of $220,000 which was increased to $242,000 on June 1, 2018. Upon the achievement by OmniMetrix and Mr. Czarnecki of certain performance goals established annually by the Board of OmniMetrix, Mr. Czarnecki shall be entitled to increases in his annual salary and an annual bonus. If his employment should be terminated without Cause (as defined in the Employment Agreement), Mr. Czarnecki would be eligible for a severance payment equal to six-months' base salary at the rate in effect at the time of termination, to be paid in equal installments over a six-month period subject to his continuing fulfillment of his ongoing obligations under the Agreement. Mr. Czarnecki did not receive a bonus for 2016 or 2017.

Outstanding Equity Awards at 2018 Fiscal Year End

The following tables set forth all outstanding equity awards made to each of the Named Executive Officers that were outstanding at December 31, 2018.

OPTIONS TO PURCHASE ACORN ENERGY, INC. STOCK

Name	Number of Securities Underlying Unexercised Options (#) Exercisable	Number of Securities Underlying Unexercised Options (#) Unexercisable	Option Exercise Price ($)	Option Expiration Date
Jan H. Loeb	25,000		0.20	August 13, 2022

	35,000	—	0.36	January 8, 2024
	35,000		0.35	January 1, 2025
Tracy S. Clifford	—	30,000	0.41	June 1, 2025
Michael Barth	25,000	—	7.57	December 13, 2019
	40,000	—	1.68	October 2, 2021
Walter Czarnecki	25,000	—	11.42	May 21, 2019
	10,000	—	7.57	December 13, 2019

WARRANTS TO PURCHASE ACORN ENERGY, INC. STOCK

Name	Number of Securities Underlying Unexercised Warrants (#) Exercisable	Number of Securities Underlying Unexercised Warrants (#) Unexercisable	Warrant Exercise Price ($)	Warrant Expiration Date
Jan H. Loeb	35,000 (1)	—	0.13	March 16, 2023
Tracy S. Clifford				
Michael Barth	—	—	—	—
Walter Czarnecki	—	—	—	—

(1) Warrants held by Leap Tide Capital Management, LLC.

Option and Warrant Exercises

None.

Non-qualified Deferred Compensation

The following table provides information on the executive non-qualified deferred compensation activity for each of our named executive officers for the year ended December 31, 2018.

Named Executive Officer	Executive Contributions in Last Fiscal Year ($)	Registrant Contributions in Last Fiscal Year ($)	Aggregate Earnings (Losses) in Last Fiscal Year ($)	Aggregate Withdrawals/ Distributions ($)	Aggregate Balance at Last Fiscal Year End ($)
Jan H. Loeb	$ —	$ —	$ —	$ —	$ —
Tracy S. Clifford					

Michael Barth	—	17,471	(1)	4,775	(2)	—	490,855	(3)
Walter Czarnecki	—	—		—		—	—	

(1) Represents a contribution to a manager's insurance policy for the period through May 31, 2018 (the effective date of Mr. Barth's resignation). Such contributions were made on substantially the same basis as those made on behalf of other Israeli executives.

(2) Represents the dollar value by which the aggregate balance of the manager's insurance policy as of May 31, 2018 (the effective date of Mr. Barth's resignation) is more than the sum of (i) the balance of the manager's insurance policy as of December 31, 2017, and (ii) the employer and employee contributions to the manager's insurance policy during 2018. (Such amounts are estimated –accurate amounts are currently unavailable)

(3) Represents the estimated aggregate balance of the manager's insurance policy as of May 31, 2018 (the effective date of Mr. Barth's resignation) (such amounts are estimated – accurate amounts are currently unavailable). This obligation was fully funded; the Company has no outstanding liability with respect to such amount.

Payments and Benefits Upon Termination or Change in Control

Jan H. Loeb

Under the terms of the consulting agreement with Mr. Loeb, there are no amounts due under any termination scenario.

Tracy S. Clifford

Under the terms of the consulting agreement under which Ms. Clifford serves as our CFO, there are no amounts due under any termination scenario.

Michael Barth

Michael Barth resigned as our Chief Financial Officer effective May 31, 2018. No severance amounts or benefits were paid directly by Acorn in connection with his resignation, as Mr. Barth's severance arrangements were with our former equity investee DSIT.

Walter Czarnecki

Under the terms of the employment agreement with Mr. Czarnecki, Chief Executive Officer of our OmniMetrix subsidiary, we are obligated to make certain payments to him upon the termination of his employment.

The following table describes the potential payments and benefits upon termination of employment for Mr. Czarnecki, as if his employment terminated as of December 31, 2018, the last day of our last fiscal year assuming that there is no earned, but unpaid base salary at the time of termination.

	Circumstances of Termination			
Payments and benefits	**Voluntary resignation**	**Termination not for cause**	**Change of control**	**Death or disability**
Compensation:				
Base salary	$—	$ 121,000 (1)	$ —	$ —
Benefits and perquisites:				
Perquisites and other personal benefits	—	—	—	—
Total	$—	$ 121,000	$ —	$ —

(1) Represents a payment of six months' salary due payable in equal installments over a six-month period to Mr. Czarnecki.

Compensation of Directors

The Board reviews non-employee director compensation on an annual basis. Our compensation policy for non-employee Directors for 2018 was as follows:

Christopher E. Clouser served as non-executive Chairman in 2018 through April 9, 2018, when he was appointed Executive Chairman. Mr. Clouser's service as Director and Executive Chairman terminated at our Annual Meeting of Stockholders on August 6, 2018. As non-executive Chairman, he received an annual retainer of $35,000, plus an annual grant on January 1 of an option to purchase 25,000 shares of Company Common Stock. The Company also paid $22,200 per annum for an administrative assistant for use in connection with the performance of Mr. Clouser's duties. Upon his appointment as Executive Chairman, his cash retainer was increased to an annual rate of $71,000. He also received a bonus in May 2018 of $50,000 in recognition of his performance in the sale of the Company's shares in DSIT Solutions Ltd.

Each non-employee Director (other than the Executive Chairman) receives an annual retainer of $15,000, plus an annual grant on January 1 of an option to purchase 10,000 shares of Company Common Stock.

Upon a non-employee Director's first election or appointment to the Board, such newly elected/appointed Director will be granted an option to purchase 25,000 shares of Company Common Stock. Each option so granted to a newly elected/appointed Director shall vest for the purchase of one-third of the shares purchasable under such option on each of the three anniversaries following the date of first election or appointment.

All options granted to non-employee Directors shall have an exercise price equal to closing price of the Company's Common Stock on its then-current trading platform or exchange on the last trading day immediately preceding the date of grant, and shall, except as described in the preceding paragraph, vest in four installments quarterly in advance. Once vested, such options shall be exercisable in whole or in part at all times until the earliest of (i) seven years from the date of grant or (ii) 18 months from the date such Director ceases to be a Director, officer, employee of, or consultant to, the Company.

The chair of the Audit Committee receives an additional annual retainer of $10,000; each Audit Committee member other than the chair receives an additional annual retainer of $2,000.

Each Director may, in his or her discretion, elect by written notice delivered on or before the first day of each calendar year whether to receive, in lieu of some or all of his or her retainer and board fees, that number of shares of Company

Common Stock as shall have a value equal to the applicable retainer and board fees, based on the closing price of the Company's Common Stock on its then-current trading platform or exchange on the last trading day immediately preceding the first day of the applicable year. Once made, the election shall be irrevocable for such election year and the shares subject to the election shall vest and be issued one-fourth upon the first day of the election year and one-fourth as of the first day of each of the second through fourth calendar quarters thereafter during the remainder of the election year. A newly-elected or appointed Director may, in his or her discretion, make such an election for the balance of the year in which he or she was elected/appointed by written notice delivered on or before the tenth day after his or her election/appointment to the Board, with the number of shares of Company Common Stock subject to such newly elected/appointed Director's election to be based on closing price of the Company's Common Stock on its then-current trading platform or exchange on the last trading day immediately preceding the day of such newly elected/appointed Director's election/appointment. For the 2018 calendar year, Mr. Woolard elected to receive Company Common Stock in lieu of retainer and board fees.

The following table sets forth information concerning the compensation earned for service on our Board of Directors during the fiscal year ended December 31, 2018 by each individual (other than Mr. Loeb who was not separately compensated for his Board service) who served as a Director at any time during the fiscal year.

DIRECTOR COMPENSATION IN 2018

Name	Fees Earned or Paid in Cash ($)	Option Awards ($) (1)	All Other Compensation ($)	Total ($)
Christopher E. Clouser	91,750 (2)	4,500	—	96,250
Mannie L. Jackson	12,250 (3)	1,800		14,050
Edgar S. Woolard Jr.	—	1,800	12,750 (4)	14,550
Samuel M. Zentman	25,000 (5)	1,800	—	26,800
Gary Mohr	6,809 (6)	6,750		13,559
Michael F. Osterer(7)		6,750		6,750

(1) On January 1, 2018, Mannie L. Jackson, Edgar S. Woolard Jr. and Samuel M. Zentman were each granted 10,000 options to acquire stock in the Company. The options had an exercise price of $0.23 and were to expire on January 1, 2025. The fair value of the options was determined using the Black-Scholes option pricing model using the following assumptions: (i) a risk-free interest rate of 2.3% (ii) an expected term of 6.7 years (iii) an assumed volatility of 85% and (iv) no dividends. On January 1, 2018, Christopher E. Clouser was also granted 25,000 options to acquire stock in the Company. The options have an exercise price of $0.23 and expire on January 1, 2025. The fair value of the options was determined using the Black-Scholes option pricing model using the following assumptions: (i) a risk-free interest rate of 2.3% (ii) an expected term of 6.7 years (iii) an assumed volatility of 85% and (iv) no dividends. All options awarded to directors in 2018 remained outstanding at fiscal year-end. These options vested in equal increments quarterly. Messers Jackson and Clouser were not re-elected to the board at the annual meeting on August 6, 2018 and Mr. Woolard resigned from the board effective August 6, 2018. All unvested options expired as of that date. As of December 31, 2018, the number of stock options held by each of the above persons was: Christopher E. Clouser, 288,227; Mannie L. Jackson, 211,433; Edgar S. Woolard Jr., 167,687; and Samuel M. Zentman, 130,424. On August 6, 2018, Gary Mohr and Michael Osterer were each elected to the board at the annual meeting and granted 25,000 options to acquire stock in the Company. The options had an exercise price of $0.34 and were to expire on August 6, 2025. The fair value of the options was determined using the Black-Scholes option pricing model using the following assumptions: (i) a risk-free interest rate of 2.7% (ii) an expected term of 6.6 years (iii) an assumed volatility of 85% and (iv) no dividends.

(2) Includes an annual retainer of $35,000 as non-executive Chairman of the Company and $2,000 received for services rendered as a member of the Audit Committee. Upon his appointment as Executive Chairman on April 9, 2018, his cash retainer was increased to an annual rate of $71,000 from $35,000 which was paid through the third quarter of 2018. He also received a bonus in May 2018 of $50,000 in recognition of his performance in the sale of the Company’s shares in DSIT Solutions Ltd.

(3) Represents the annual retainer of $15,000 as a non-employee director paid quarterly through third quarter 2018 as Mr. Jackson was not re-elected to the board at the annual meeting on August 6, 2018.

(4) Represents the annual retainer of $15,000 as a non-employee director and $2,000 received for services rendered as a member of the Audit Committee paid quarterly through third quarter 2018. Mr. Woolard resigned from the board at the annual meeting on August 6, 2018. Such amounts were paid with 55,435 shares of Company Common Stock.

(5)

Represents the annual retainer of $15,000 as a non-employee director and $10,000 received for services rendered as Chairman of the Audit Committee.

(6) Represents the pro-rata portion from August 6, 2018 (his election date to the board) through December 31, 2018 of the annual retainer of $15,000 as a non-employee director and $2,000 received for services rendered as a member of the Audit Committee.

(7) Mr. Osterer waived his right to receive board fees in 2018.

ITEM 12. SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT AND RELATED STOCKHOLDER MATTERS

The following table and the notes thereto set forth information, as of March 22, 2019, concerning beneficial ownership (as defined in Rule 13d-3 under the Securities Exchange Act of 1934) of common stock by (i) each director of the Company, (ii) each executive officer (iii) all executive officers and directors as a group, and (iv) each holder of 5% or more of the Company's outstanding shares of common stock.

Name and Address of Beneficial Owner (1) (2)	Number of Shares of Common Stock Beneficially Owned (2)		Percentage of Common Stock Outstanding (2)	
Jan H. Loeb	1,609,454	(3)	5.4	%
Gary Mohr	202,014	(4)	*	
Michael F. Osterer	1,798,379	(5)	6.1	%
Samuel M. Zentman	206,869	(6)	*	
Tracy S. Clifford				
Walter Czarnecki	35,000	(7)	*	
All executive officers and directors of the Company as a group (6 people)	3,851,716	(8)	12.9	%

* Less than 1%

(1) Unless otherwise indicated, the address for each of the beneficial owners listed in the table is in care of the Company, 1000 N West Street, Suite 1200, Wilmington, Delaware 19801.

(2) Unless otherwise indicated, each person has sole investment and voting power with respect to the shares indicated. For purposes of this table, a person or group of persons is deemed to have "beneficial ownership" of any shares as of a given date which such person has the right to acquire within 60 days after such date. Percentage information is based on the 29,555,786 shares outstanding as of March 22, 2019.

(3) Consists of 1,479,454 shares held by Mr. Loeb, 95,000 shares underlying currently exercisable options and 35,000 currently exercisable warrants held by Leap Tide Capital Management LLC. Mr. Loeb is the sole manager of Leap Tide Capital Management LLC, with sole voting and dispositive power over the securities held by such entity. Mr. Loeb disclaims beneficial ownership of the securities held by Leap Tide Capital Management LLC except to the extent of his pecuniary interest therein.

(4) Consists of 197,014 shares and 5,000 shares underlying currently exercisable options.

(5) Consists of 1,788,129 shares and 10,250 shares underlying currently exercisable options.

(6) Consists of 61,445 shares and 145,424 shares underlying currently exercisable options.

(7) Consists solely of currently exercisable options.

(8) Consists of 3,526,042 shares, 290,674 shares underlying currently exercisable options and 35,000 shares underlying currently exercisable warrants.

EQUITY COMPENSATION PLAN INFORMATION

The table below provides certain information concerning our equity compensation plans as of December 31, 2018.

Plan Category	Number of Securities to be Issued Upon Exercise of Outstanding Options, Warrants and Rights (a)	Weighted-average Exercise Price of Outstanding Options, Warrants and Rights	Number of Securities Remaining Available for Future Issuance Under Equity Compensation Plans (Excluding Securities Reflected in Column (a))
Equity Compensation Plans Approved by Security Holders	1,302,110	$ 3.35	1,493,780
Equity Compensation Plans Not Approved by Security Holders	2,556,521	$ 1.22	—
Total	3,858,631	$ 1.94	1,493,780

The grants made under our equity compensation plans not approved by security holders includes 162,500 options which were granted under our 2006 Stock Incentive Plan following the original expiration of the Plan on February 8, 2017, and 1,879 options granted in 2015 under our 2006 Stock Option Plan for Non-Employee Directors but in excess of the maximum number of options available for grant under such plan as approved by stockholders. These grants were made to directors and officers at exercise prices equal to the fair market value on the date of the grant. The options generally vest over a one-year period and expire seven years from the date of the grant. The grants made under our equity compensation plans not approved by security holders also includes 2,392,142 warrants issued as compensation to underwriters for services provided in connection capital raise transactions. In February 2019, the Company’s Board ratified all option grants made under our 2006 Stock Incentive Plan following the original expiration of the Plan on February 8, 2017 and extended the expiration date of the 2006 Stock Incentive Plan until December 31, 2024.

ITEM 13. CERTAIN RELATIONSHIPS, RELATED TRANSACTIONS AND DIRECTOR INDEPENDENCE

Transactions With Related Persons

Loans from Directors

Loans from Directors in 2017

On February 16, 2017, we secured commitments for $1.9 million in funding in the form of loans from then-current members of our Board of Directors, including $900,000 immediately funded. The $900,000 of initially funded loans accrued interest at the rate of 12.5% (payable at maturity) and was to mature at the earlier of April 30, 2018 or the receipt of proceeds from the sale of our 41.2% remaining ownership in DSIT (see below).

In addition to the $900,000 initially funded, one of our then-current directors agreed to loan up to an additional $1.0 million to us on or after July 7, 2017 on substantially identical terms as the February 2017 director loans. In the third quarter of 2017, we received $400,000 from the director on the aforementioned $1.0 million commitment. The $400,000 loan received in the third quarter of 2017 was to mature at the earlier of April 30, 2018 or the receipt of proceeds from the sale of our41.2% ownership in DSIT (see below) and accrued interest at the rate of 8.0% per annum, payable at maturity.

During the year ended December 31, 2017, we accrued $107,000 of interest with respect to the 2017 director loans.

Following the closing of the 2018 DSIT Transaction, we paid off the $1.3 million of principal of outstanding 2017 director loans and the accrued interest of $128,000 thereon (which included 2018 interest).

OmniMetrix

On October 16, 2015, Edgar S. Woolard, Jr. one of Acorn’s then-current directors acquired a 10% interest in our OmniMetrix Holdings, Inc. subsidiary (“Holdings”) for $500,000 through the purchase of preferred stock. Holdings is the holder of 100% of the membership interests OmniMetrix, LLC. In the transaction, Mr. Woolard acquired 1,000

shares of Series A Preferred Stock (the “OmniMetrix Preferred Stock”) of Holdings. Subsequently, on November 23, 2015, Mr. Woolard acquired an additional 1,000 shares of OmniMetrix Preferred Stock for an additional $500,000 and currently owns a 20% interest in Holdings.

45

A dividend of 10% per annum accrues on the OmniMetrix Preferred Stock. The dividend was payable on the first anniversary of the funding of the investment and quarterly thereafter for so long as the OmniMetrix Preferred Stock is outstanding and has not been converted to OmniMetrix common stock. The dividend is payable in cash or the form of additional shares of OmniMetrix Preferred Stock at the election of the holder. Through December 31, 2016, a dividend payable of $115,000 was recorded with respect to the OmniMetrix Preferred Stock. On December 31, 2016, Mr. Woolard agreed to treat the $115,000 of accrued dividends (and to treat future accrued dividends) as a loan to OmniMetrix which bears interest at 8% per year. All amounts due (principal and interest) were due the later of April 30, 2018 or 90 days following the advance of a new loan (quarterly dividend accrual). In December 2016, Mr. Woolard provided OmniMetrix with a $50,000 loan under the same terms as the abovementioned accrued dividends. On December 31, 2017, OmniMetrix owed Mr. Woolard $283,000 comprised of $215,000 of accrued dividends, $50,000 of loans and $18,000 of accrued interest.

On May 14, 2018, Holdings and Mr. Woolard entered into an agreement whereby effective May 1, 2018, the dividend on the Preferred Stock was reduced to 8%. In addition, all the amounts due to Mr. Woolard (accrued dividends, loan and accrued interest) and all future dividends that shall accrue on the Preferred Stock through June 30, 2020, will be paid by Holdings pursuant to an agreed-upon payment schedule which ends on June 30, 2020. During the year ended December 31, 2018, Holdings made payments of $100,000 in the aggregate in accordance with the agreed-upon payment schedule and additional quarterly dividends of $87,000 in the aggregate were accrued. At December 31, 2018, the obligation to Mr. Woolard was $283,000, representing unpaid accrued dividends. This amount, in addition to all future dividends that shall accrue on the Preferred Stock, will be paid by Holdings to Mr. Woolard quarterly as follows:

In the year ending December 31, 2019	$250,000
In the six-month period ended June 30, 2020	$153,000

Dividends shall be paid only to the extent provided under Holdings' Amended and Restated Certificate of Incorporation and as permitted under applicable law.

The OmniMetrix Preferred Stock may convert at the option of the holder on a one-for-one basis into OmniMetrix common stock, subject to appropriate adjustments for corporate reorganizations, mergers, stock splits, etc. The OmniMetrix Preferred Stock has full ratchet anti-dilution protection and will not be diluted by any issuances below a pre-money equity valuation of $5.5 million for OmniMetrix.

Director Independence

Applying the definition of independence provided under the NASDAQ rules, the Board has determined that with the exception of Jan H. Loeb, all of the members of the Board of Directors are independent. The Board has also

determined that all of the members of the Audit Committee, the Compensation Committee and the Nominating Committee are independent under the NASDAQ independence standards for such committees.

ITEM 14. PRINCIPAL ACCOUNTING FEES AND SERVICES

Accounting Fees

Friedman LLP

The following table summarized the fees billed to Acorn for professional services rendered by Friedman LLP for the years ended December 31, 2018 and 2017.

	2018	2017
Audit Fees	$87,000	$135,000
Audit – Related Fees	4,800	7,000
Tax Fees		
All Other Fees		
Total	$91,800	$142,000

Audit Fees were for professional services rendered for the audits of the consolidated financial statements of the Company, assistance with review of documents filed with the SEC, consents, and other assistance required to be performed by our independent accountants.

Audit-Related Fees were for travel costs and administrative fees associated with our audit.

Pre-Approval Policies and Procedures

The Audit Committee's current policy is to pre-approve all audit and non-audit services that are to be performed and fees to be charged by our independent auditor to assure that the provision of these services does not impair the independence of the auditor. The Audit Committee pre-approved all audit and non-audit services rendered by our principal accountant in 2018 and 2017.

PART IV

ITEM 15. EXHIBITS AND FINANCIAL STATEMENT SCHEDULES

(a)(1) List of Financial Statements of the Registrant

The consolidated financial statements of the Registrant and the report thereon of the Registrant's Independent Registered Public Accounting Firms are included in this Annual Report beginning on page F-1.

Report of Friedman LLP	F-1
Consolidated Balance Sheets as of December 31, 2018 and 2017	F-2
Consolidated Statements of Operations	F-3
Consolidated Statements of Changes in (Deficit)/Equity	F-4
Consolidated Statements of Cash Flows	F-5
Notes to Consolidated Financial Statements	F-7

ITEM 16. FORM 10-K SUMMARY

Not applicable.

(a)(3) List of Exhibits

No.	
3.1	Amended and Restated Certificate of Incorporation of the Registrant (incorporated herein by reference to Exhibit 3.1 to the Registrant's Annual Report on Form 10-K for the year ended December 31, 2015).
3.2	By laws of the Registrant (incorporated herein by reference to Exhibit 3.2 to the Registrant's Registration Statement on Form S 1 (File No. 33 44027) (the "1992 Registration Statement")).
3.3	Amendments to the By Laws of the Registrant adopted December 27, 1994 (incorporated herein by reference to Exhibit 3.3 of the Registrant's Current Report on Form 8-K dated January 10, 1995).
4.1	Specimen certificate for the common stock (incorporated herein by reference to Exhibit 4.2 to the 1992 Registration Statement).
4.2	Form of Representative Warrant (incorporated herein by reference to Exhibit 4.1 of Registrant's Current Report on Form 8-K filed October 15, 2013)
4.3	Form of Placement Agent Warrant (incorporated herein by reference to Exhibit 4.1 of the Registrant's Current Report on Form 8-K filed December 20, 2010).
4.4	Form of Placement Agent Warrant (incorporated herein by reference to Exhibit 4.01 of the Registrant's Current Report on Form 8-K/A filed November 6, 2014).
4.5	Form of Investor Warrant (incorporated herein by reference to Exhibit 4.02 of the Registrant's Current Report on Form 8-K/A filed November 6, 2014).
4.6	Registration Rights Agreement, dated as of October 31, 2014 (incorporated herein by reference to Exhibit 4.03 of the Registrant's Current Report on Form 8-K/A filed November 6, 2014).
4.7	Amended and Restated Articles of Incorporation of OMX Holdings, Inc. (incorporated herein by reference to Exhibit 4.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016)
4.8	Form of Warrant, dated as of March 16, 2016, of Acorn Energy, Inc., issued to Leap Tide Capital Management LLC (incorporated herein by reference to Exhibit 4.4 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
10.1	Acorn Energy, Inc. 2006 Stock Option Plan for Non-Employee Directors (incorporated herein by reference to the appendix to the Registrant's Definitive Proxy Statement on Schedule 14A filed July 26, 2012, and the Registrant's Additional Definitive Proxy Soliciting Materials on Schedule 14A filed August 28, 2012).*
#10.2*	Acorn Energy, Inc. Amended and Restated 2006 Stock Incentive Plan.
#10.3*	Forms of Option Award Certificate and Option Award Agreement under the Registrant's Amended and Restated 2006 Stock Incentive Plan.

10.4*	Forms of Option Award Certificate and Option Award Agreement under the Registrant's Amended and Restated 2006 Stock Option Plan for Non-Employee Directors (incorporated herein by reference to Exhibit 10.53 to Registrant's Annual Report on Form 10-K for the year ended December 31, 2009).

10.5*	Form of Indemnification Agreement (incorporated herein by reference to Exhibit 10.47 to the Registrant's Annual report on Form 10-K for the year ended December 31, 2011).
10.6*	Amendment to Employment Agreement between DSIT Solutions Ltd. and Michael Barth, effective as of November 11, 2013 (amendment to Hebrew-language original summarized under Item 11 in this Annual Report) (incorporated herein by reference to Exhibit 10.35 to the Registrant's Annual report on Form 10-K for the year ended December 31, 2013).
10.7*	Amendment to Employment Agreement - Michael Barth (incorporated herein by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended June 30, 3014).
10.8	Placement Agent Agreement, dated as of October 30, 2014 (incorporated herein by reference to Exhibit 10.1 of the Registrant's Current Report on Form 8-K/A filed November 6, 2014).
10.9	Securities Purchase Agreement, dated as of October 31, 2014 (incorporated herein by reference to Exhibit 10.3 of the Registrant's Current Report on Form 8-K/A filed November 6, 2014).
10.10	Series A Preferred Stock Subscription Agreement, dated as of November 23, 2015, between OMX Holdings, Inc., and Edgar Woolard (incorporated herein by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
10.11	Share Purchase Agreement, dated as of January 28, 2016, between DSIT Solutions Ltd., Rafael Advanced Defense Systems Ltd., the sellers named therein and Michael Barth as Shareholders Representative (incorporated herein by reference to Exhibit 10.3 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
10.12	Shareholders Agreement, dated as of April 21, 2016, by and among DSIT Solutions Ltd. and the Shareholders named therein (incorporated by reference to Exhibit 10.6 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
10.13	Letter Agreement, dated as of April 21, 2016, between Acorn Energy, Inc. and certain shareholders of DSIT Solutions Ltd. (incorporated by reference to Exhibit 10.7 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
10.14	Letter Agreement, dated December 31, 2016, between OMX Holdings, Inc. and Edgar Woolard (incorporated by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2018).
10.15	Grid Note of OmniMetrix LLC and OMX Holdings, Inc. in favor of Edgar Woolard, dated December 31, 2016 (incorporated by reference to Exhibit 10.2 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2018).
10.16*	Consulting Agreement dated as of January 8, 2017, by and between Acorn Energy, Inc. and Jan H. Loeb (incorporated herein by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2017).
10.17	Promissory Note of Acorn Energy, Inc., dated February 15, 2017, in favor of Christopher E. Clouser (incorporated herein by reference to Exhibit 10.2 to the Registrant's Quarterly Report on Form 10-Q for the

	quarter ended March 31, 2017).
10.18	Promissory Note of Acorn Energy, Inc., dated February 15, 2017, in favor of Edgar Woolard (incorporated herein by reference to Exhibit 10.3 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2017).

10.19	Promissory Note of Acorn Energy, Inc., dated February 15, 2017, in favor of Samuel M. Zentman (incorporated herein by reference to Exhibit 10.4 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2017).
10.20*	Employment Agreement dated as of June 19, 2017, by and between OmniMetrix LLC and Walter Czarnecki (incorporated herein by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended June 30, 2017).
10.21	Promissory Note of Acorn Energy, Inc., dated August 30, 2017, in favor of Edgar Woolard (incorporated herein by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended September 30, 2017).
10.22	Promissory Note of Acorn Energy, Inc., dated September 14, 2017, in favor of Edgar Woolard (incorporated herein by reference to Exhibit 10.2 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended September 30, 2017).
10.23	Share Purchase Agreement, dated as of January 18, 2018, by and between Acorn Energy, Inc., Danbel Holdings Ltd. and M.N. Wasserman Ltd. (incorporated by reference to Exhibit 10.3 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2018).
10.24*	Consulting Agreement, dated as of April 9, 2018, by and between Acorn Energy, Inc. and Jan H. Loeb (incorporated herein by reference to Exhibit 10.4 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2018).
10.25	Letter Agreement, dated as of May 1, 2018, between OMX Holdings, Inc. and Edgar Woolard (incorporated herein by reference to Exhibit 10.5 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2018).
10.26*	Consulting Agreement, dated as of June 1, 2018, by and between Acorn Energy, Inc. and Tracy Clifford Consulting, LLC (incorporated by reference to Exhibit 10.3 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended June 30, 2018).
#21.1	List of subsidiaries.
#23.1	Consent of Friedman LLP.
#31.1	Certification of Chief Executive Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.
#31.2	Certification of Chief Financial Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.
#32.1	Certification of Chief Executive Officer pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.
#32.2	Certification of Chief Financial Officer pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.
#101.1	The following financial statements from Acorn Energy's Form 10-K for the year ended December 31, 2018, filed on March 27, 2019, formatted in XBRL (eXtensible Business Reporting Language): (i) Consolidated Balance Sheets, (ii) Consolidated Statements of Operations, (iii) Consolidated Statements of Comprehensive Income (Loss), (iv) Consolidated Statements of Changes in Equity, (v) Consolidated Statements of Cash

Flows, and (vi) Notes to Consolidated Financial Statements, tagged as blocks of text.

* This exhibit includes a management contract, compensatory plan or arrangement in which one or more directors or executive officers of the Registrant participate.

This exhibit is filed or furnished herewith.

SIGNATURES

Pursuant to the requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934, the Registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of Wilmington, State of Delaware, on March 27, 2019.

ACORN ENERGY, INC.

By: */s/ Jan H. Loeb*
Jan H. Loeb
President and Chief Executive Officer

Pursuant to the requirements of the Securities Exchange Act of 1934, this report has been signed by the following persons on behalf of the registrant, in the capacities and on the dates indicated.

Signature	**Title**	**Date**
/s/ Jan H. Loeb Jan H. Loeb	President; Chief Executive Officer; and Director (Principal Executive Officer)	March 27, 2019
/s/ Tracy S. Clifford Tracy S. Clifford	Chief Financial Officer (Principal Financial Officer and Principal Accounting Officer)	March 27, 2019
/s/ Gary Mohr Gary Mohr	Director	March 27, 2019
/s/ Michael F. Osterer Michael F. Osterer	Director	March 27, 2019
/s/ Samuel M. Zentman Samuel M. Zentman	Director	March 27, 2019

ACORN ENERGY, INC. AND SUBSIDIARIES

INDEX TO CONSOLIDATED FINANCIAL STATEMENTS

Report of Independent Registered Public Accounting Firm	F-1
Consolidated Balance Sheets	F-2
Consolidated Statements of Operations	F-3
Consolidated Statements of Changes in (Deficit)/Equity	F-4
Consolidated Statements of Cash Flows	F-5
Notes to Consolidated Financial Statements	F-7

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Board of Directors and
Stockholders of Acorn Energy, Inc.

Opinion on the Financial Statements

We have audited the accompanying consolidated balance sheets of Acorn Energy, Inc. and its subsidiaries (the "Company") as of December 31, 2018, and 2017, and the related consolidated statements of operations, changes in (deficit)/equity, and cash flows for each of the years in the two-year period ended December 31, 2018, and the related notes (collectively referred to as the financial statements). In our opinion, the financial statements present fairly, in all material respects, the financial position of the Company as of December 31, 2018 and 2017 the results of its operations and its cash flows for each of the years in the two-year period ended December 31, 2018, in conformity with accounting principles generally accepted in the United States of America.

Basis for Opinion

These financial statements are the responsibility of the Company's management. Our responsibility is to express an opinion on the Company's financial statements based on our audits. We are a public accounting firm registered with the Public Company Accounting Oversight Board (United States) (PCAOB) and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB.

We conducted our audits in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement, whether due to error or fraud. The Company is not required to have, nor were we engaged to perform, an audit of its internal control over financial reporting. As part of our audits, we are required to obtain an understanding of internal control over financial reporting, but not for the purpose of expressing an opinion on the effectiveness of the Company's internal control over financial reporting. Accordingly, we express no such opinion.

Our audits included performing procedures to assess the risks of material misstatement of the financial statements, whether due to error or fraud, and performing procedures that respond to those risks. Such procedures included examining, on a test basis, evidence regarding the amounts and disclosures in the financial statements. Our audits also included evaluating the accounting principles used and significant estimates made by management, as well as

evaluating the overall presentation of the financial statements. We believe that our audits provide a reasonable basis for our opinion.

/s/ Friedman LLP

We have served as the Company's auditor since 2010.

Marlton, New Jersey

March 27, 2019

ACORN ENERGY, INC. AND SUBSIDIARIES
CONSOLIDATED BALANCE SHEETS
(IN THOUSANDS, EXCEPT SHARE AND PER SHARE DATA)

	As of December 31,	
	2018	2017
ASSETS		
Current assets:		
Cash and cash equivalents	$973	$481
Restricted cash	290	—
Accounts receivable, net	665	1,103
Inventory, net	261	229
Other current assets	144	91
Investment in DSIT	—	5,800
Deferred charges	803	999
Total current assets	3,136	8,703
Property and equipment, net	73	139
Other assets	710	380
Total assets	$3,919	$9,222
LIABILITIES AND (DEFICIT)/EQUITY		
Current liabilities:		
Short-term bank credit	$—	$313
Accounts payable	246	489
Accrued expenses	430	466
Deferred revenue	2,734	2,753
Due to Acorn directors (former directors as of August 6, 2018)	250	1,690
Due to DSIT	—	1,624
Other current liabilities	127	185
Total current liabilities	3,787	7,520
Long-term liabilities:		
Deferred revenue	1,327	811
Other long-term liabilities	2	139
Due to Acorn director (former director as of August 6, 2018)	33	—
Total long-term liabilities	1,362	950
Commitments and contingencies (Note 11)		
(Deficit)/Equity:		
Acorn Energy, Inc. shareholders		
Common stock - $0.01 par value per share:		
Authorized – 42,000,000 shares; Issued – 30,357,706 and 30,302,271 shares at December 31, 2018 and 2017, respectively	304	303
Additional paid-in capital	100,340	99,819
Warrants	1,118	1,600
Accumulated deficit	(100,064)	(98,215)

Treasury stock, at cost – 801,920 shares at December 31, 2018 and 2017	(3,036)	(3,036)
Total Acorn Energy, Inc. shareholders' (deficit)/equity	(1,338)	471
Non-controlling interests	108	281
Total (deficit)/equity	(1,230)	752
Total liabilities and (deficit)/equity	$3,919	$9,222

The accompanying notes are an integral part of these consolidated financial statements.

ACORN ENERGY, INC. AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF OPERATIONS

(IN THOUSANDS, EXCEPT NET LOSS PER SHARE DATA)

	Year ended December 31,	
	2018	2017
Revenue	$5,087	$4,350
Cost of sales	1,965	1,903
Gross profit	3,122	2,447
Operating expenses:		
Research and development expenses, net	542	518
Selling, general and administrative expenses	3,956	3,840
Total operating expenses	4,498	4,358
Operating loss	(1,376)	(1,911)
Finance expense, net	(104)	(231)
Loss before income taxes	(1,480)	(2,142)
Income tax expense		(41)
Net loss after income taxes	(1,480)	(2,183)
Share of income in DSIT	33	450
Impairment of investment in DSIT	(33)	(308)
Loss on sale of interest in DSIT, net of transaction costs and withholding taxes	(607)	
Loss before discontinued operations	(2,087)	(2,041)
Income from discontinued operations, net of income taxes		698
Net loss	(2,087)	(1,343)
Non-controlling interest share of loss – continuing operations	86	174
Net loss attributable to Acorn Energy, Inc. shareholders.	$(2,001)	$(1,169)
Basic and diluted net loss per share attributable to Acorn Energy, Inc. shareholders:		
From continuing operations	$(0.07)	$(0.06)
From discontinued operations		0.02
Net loss per share attributable to Acorn Energy, Inc. shareholders	$(0.07)	$(0.04)
Weighted average number of shares outstanding attributable to Acorn Energy, Inc. shareholders – basic	29,540	29,423
Weighted average number of shares outstanding attributable to Acorn Energy, Inc. shareholders –diluted	29,540	29,423

The accompanying notes are an integral part of these consolidated financial statements.

F-3

ACORN ENERGY, INC. AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF CHANGES IN (DEFICIT)/EQUITY

(IN THOUSANDS)

	Acorn Energy, Inc. Shareholders									
	Number of Shares	Common Stock	Additional Paid-In Capital	Warrants	Accumulated Deficit	Treasury Stock	Accumulated Other Comprehensive Income (Loss)	**Total Acorn Energy, Inc. Shareholders' (Deficit)/ Equity**	Non-controlling interests	**Total (Deficit)/ Equity**
Balances as of December 31, 2016	30,125	$301	$99,767	$1,600	$(97,046)	$(3,036)	$ (254)	$ 1,332	$ 555	$ 1,887
Net loss	—	—	—	—	(1,169)	—	—	(1,169)	(174)	(1,343)
Deconsolidation of GridSense (see Note 4)	—	—	—	—	—	—	254	254	—	254
Shares issued in lieu of director fees (see Note 15(a))	177	2	30	—	—	—	—	32	—	32
Accrued dividend in OmniMetrix preferred shares	—	—	—	—	—	—	—	—	(100)	(100)
Stock option compensation	—	—	22	—	—	—	—	22	—	22
Balances as of December 31, 2017	30,302	303	99,819	1,600	(98,215)	(3,036)	—	471	281	752
Net loss	—	—	—	—	(2,001)	—	—	(2,001)	(86)	(2,087)
Adjustment of retained earnings in accordance with ASC 606 (see Note 17)	—	—	—	—	152	—	—	152	—	152
Shares issued in lieu of director fees (see Note 15)	56	1	13	—	—	—	—	14	—	14
	—	—	—	—	—	—	—	—	(87)	(87)

Accrued dividend in OmniMetrix preferred shares										
Value of expired warrants			482	(482)						
Stock option compensation	—	—	26	—	—	—	—	26	—	26
Balances as of December 31, 2018	30,358	$304	$100,340	$1,118	$(100,064)	$(3,036)	$ —	$(1,338)	$108	$(1,230)

The accompanying notes are an integral part of these consolidated financial statements.

ACORN ENERGY, INC. AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF CASH FLOWS

(IN THOUSANDS)

	2018	2017
Cash flows used in operating activities:		
Net loss	$(2,087)	$(1,343)
Adjustments to reconcile net loss to net cash used in operating activities (see Schedule A)	(336)	(289)
Net cash used in operating activities – continuing operations	(2,423)	(1,632)
Net cash used in operating activities – discontinued operations		(44)
Net cash used in operating activities	(2,423)	(1,676)
Cash flows provided by investing activities:		
Proceeds from the sale of interests in DSIT, net of transaction costs and cash divested	5,261	—
Release of escrow deposits	—	579
Net cash provided by investing activities – continuing operations	5,261	579
Net cash provided by investing activities – discontinued operations		100
Net cash provided by investing activities	5,261	679
Cash flows provided by (used in) financing activities:		
Short-term bank credit, net	(313)	(63)
Proceeds from director loans	—	1,300
Repayment of loans from former director	(1,400)	—
Repayment of loans from DSIT	(340)	—
Net cash provided by (used in) financing activities – continuing operations	(2,053)	1,237
Net cash used in financing activities – discontinued operations	—	—
Net cash provided by (used in) financing activities	(2,053)	1,237
Effect of exchange rate changes on cash and cash equivalents – continuing operations	(3)	—
Effect of exchange rate changes on cash and cash equivalents – discontinued operations	—	—
Net increase in cash and cash equivalents	782	240
Cash and cash equivalents at beginning of year – discontinued operations		19
Cash, cash equivalents and restricted cash at beginning of year – continuing operations	481	222
Cash and cash equivalents at end of year – discontinued operations	—	—
Cash, cash equivalents and restricted cash at end of year – continuing operations	$1,263	$481
Cash, cash equivalents and restricted cash consist of the following:		
End of period		
Cash and cash equivalents	$973	$481
Restricted cash	290	
	$1,263	$481
Cash, cash equivalents and restricted cash consist of the following:		
Beginning of period		
Cash and cash equivalents	$481	$241

Restricted cash		
	$481	$241
Supplemental cash flow information:		
Cash paid during the year for:		
Interest	$84	$72
Income taxes	$388	$42

The accompanying notes are an integral part of these consolidated financial statements.

ACORN ENERGY, INC. AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF CASH FLOWS

(IN THOUSANDS)

	2018	2017
A. Adjustments to reconcile net loss to net cash used in operating activities:		
Loss from discontinued operations	$	$(698)
Depreciation and amortization	66	75
Gain on sale of interests in DSIT, net of income taxes and transaction costs	607	—
Share of income in DSIT	(33)	(450)
Impairment of investment in DSIT	33	308
Stock-based compensation	26	22
Director fees paid in common stock	14	32
Changes in operating assets and liabilities:		
Decrease (increase) in accounts receivable	438	(98)
Increase in inventory	(32)	(27)
Increase in other current assets and other assets	(35)	(229)
Increase in deferred revenue	497	786
Decrease in balances due to Acorn directors and DSIT	(1,517)	
Increase (decrease) in accounts payable, accrued expenses other current and non-current liabilities and balances due to Acorn directors and DSIT	(400)	(10)
	$(336)	$(289)
B. Non-cash investing and financing activities:		
Accrued preferred dividends to outside investor in OmniMetrix subsequently converted to long-term loan	$87	$100

The accompanying notes are an integral part of these consolidated financial statements.

ACORN ENERGY, INC. AND SUBSIDIARIES

Notes to Consolidated Financial Statements

NOTE 1—NATURE OF OPERATIONS

(a) Description of Business

Acorn Energy, Inc. ("Acorn" or "the Company") is a Delaware corporation which is holding company focused on technology-driven solutions for energy infrastructure asset management. Following the sale of its remaining interests in DSIT Solutions Ltd. ("DSIT") in February 2018 (the 2018 DSIT Transaction) , the Company provides the following services and products through its OmniMetrix™, LLC ("OmniMetrix") subsidiary:

Power Generation ("PG") monitoring. OmniMetrix's PG activities provide wireless remote monitoring and control systems and services for critical assets as well as Internet of Things applications.

Cathodic Protection ("CP") monitoring. OmniMetrix's CP activities provide for remote monitoring of cathodic protection systems on gas pipelines for gas utilities and pipeline companies.

On January 18, 2018, the Company entered into a Share Purchase Agreement for the sale of its remaining interest in DSIT to an Israeli investor group. Following the closing of the transaction on February 14, 2018, the Company will no longer report DSIT's results on the equity method.

The Company's operations are based in the United States and in Israel through its investment in DSIT until the closing of the 2018 DSIT Transaction. Acorn's shares are traded on the OTCQB marketplace under the symbol ACFN.

See Notes 16 and 17 for segment information and major customers.

(b) Liquidity

As of December 31, 2018, the Company had approximately $973 of corporate cash and cash equivalents excluding restricted cash of $290 held at a bank in Israel. In February 2018, the Company sold its remaining interest in DSIT for $5,800 and received cash proceeds of approximately $4,200 (net of $1,600 of the balance due to DSIT which was assigned to the purchasers) which was used to pay transaction costs, withholding taxes, repay director loans and accrued interest and other liabilities. As of March 22, 2019, the Company had corporate cash of approximately $814 excluding restricted cash of $290 held at a bank in Israel. Such cash plus the cash generated from operations and borrowing from the OmniMetrix Loan and Security Agreement, will provide sufficient liquidity to finance the operating activities of Acorn and OmniMetrix at their current level of operations for the foreseeable future and for the twelve months from the issuance of these financial statements in particular.

(c) Accounting Principles

The consolidated financial statements have been prepared in conformity with accounting principles generally accepted in the United States of America (“GAAP”).

(d) Use of Estimates in Preparation of Financial Statements

The preparation of consolidated financial statements requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and the disclosure of contingent assets and liabilities as of the date of the financial statements, and the reported amounts of revenues and expenses during the reporting periods.

As applicable to these consolidated financial statements, the most significant estimates and assumptions relate to uncertainties with respect to income taxes, inventories, account receivable allowances, contingencies and analyses of the possible impairments.

(e) Amounts in the Notes to the Financial Statements

All dollar amounts in the notes to the consolidated financial statements are in thousands except for per share data.

NOTE 2—SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Principles of Consolidation and Presentation

The consolidated financial statements include the accounts of the Company and its subsidiaries. In these consolidated financial statements, "subsidiaries" are companies that are over 50% controlled, the accounts of which are consolidated with those of the Company. Significant intercompany transactions and balances are eliminated in consolidation; profits from intercompany sales, are also eliminated; non-controlling interests are included in equity. When the Company does not have a controlling interest in an entity but exerts significant influence over the entity's operating and financial decisions, the Company applies the equity method of accounting in which it records in earnings its share of income or losses of the entity.

Reclassification

Certain reclassifications have been made to the Company's consolidated financial statements for the year ended December 31, 2017 to conform to the current period's consolidated financial statement presentation. There was no effect on total assets, equity and net loss.

Discontinued Operations

In April 2016, the Company announced that it decided to cease operations of its GridSense subsidiary and initiate the liquidation of the GridSense assets. Following the decision to cease GridSense operations, the Company wrote down all GridSense assets to their estimated realizable values at the time and accrued for estimated severance costs and lease commitments. As a result of this decision, GridSense is reported as a discontinued operation in its consolidated financial statements for all periods presented (see Note 4).

Functional Currency and Foreign Currency Transactions

The currency of the primary economic environment in which the operations of Acorn and its U.S. subsidiaries are conducted is the United States dollar ("dollar"). Accordingly, the Company and all of its U.S. subsidiaries use the dollar as their functional currency. The financial statements of DSIT whose functional currency is the New Israeli Shekel ("NIS") have been translated in accordance with applicable accounting principles. Assets and liabilities are translated at

year-end exchange rates, while revenues and expenses are translated at average exchange rates during the year. Differences resulting from translation are presented in equity as Accumulated Other Comprehensive Income. Gains and losses on foreign currency transactions and exchange gains and losses denominated in non-functional currencies are reflected in finance income (expense), net. Subsequent to the sale of our DSIT equity level investment, this is no longer applicable in the consolidated statements of operations.

Cash Equivalents

The Company considers all highly liquid investments, which include money market funds and short-term bank deposits (up to three months from date of deposit or with maturity of three months from date of purchase) that are not restricted as to withdrawal or use, to be cash equivalents.

Accounts Receivable

Accounts receivable consists of trade receivables. Trade receivables are recorded at the invoiced amount.

Allowance for Doubtful Accounts

The Company maintains allowances for doubtful accounts for estimated losses resulting from the inability of customers to make required payments. This allowance is based on specific customer account reviews and historical collections experience. If the financial condition of the Company’s funding parties or customers were to deteriorate, resulting in an impairment of their ability to make payments, additional allowances may be required. The Company performs ongoing credit evaluations of its customers and does not require collateral.

During the years ended December 31, 2018 and 2017, $0 was charged to expense, respectively. At December 31, 2018 and 2017, the balance in allowance for doubtful accounts was $11.

Inventory

Inventories are comprised of components (raw materials), work-in-process and finished goods, which are measured at net realizable value.

OmniMetrix - Raw materials inventory is generally comprised of radios, cables, antennas, and electrical components. Finished goods inventory consists of fully assembled systems ready for final shipment to the customer. Costs are determined at cost of acquisition on a weighted average basis and include all outside production and applicable shipping costs.

All inventories are periodically reviewed for impairment related to slow-moving and obsolete inventory.

Non-Controlling Interests

The Financial Accounting Standards Board (“FASB”) requires that non-controlling interests be reported as a component of equity, changes in a parent’s ownership interest while the parent retains its controlling interest be accounted for as equity transactions, and upon a loss of control, retained ownership interest be re-measured at fair value, with any gain or loss recognized in earnings. The Company attributes the applicable percentage of income and losses to the non-controlling interests associated with OmniMetrix and DSIT (up to the 2016 DSIT Transaction – see Note 3).

Property and Equipment

Property and equipment are presented at cost at the date of acquisition. Depreciation and amortization are calculated based on the straight-line method over the estimated useful lives of the depreciable assets, or in the case of leasehold improvements, the shorter of the lease term or the estimated useful life of the asset, a portion of which is allocated to cost of sales. Improvements are capitalized while repairs and maintenance are charged to operations as incurred.

Treasury Stock

Shares of common stock repurchased are recorded at cost as treasury stock. When shares are reissued, the cost method is used for determining cost. In accordance with GAAP, the excess of the acquisition cost over the reissuance price of the treasury stock, if any, is charged to additional paid-in capital, limited to the amount previously credited to additional paid-in capital, if any. Any excess is charged to accumulated deficit.

Revenue Recognition

The Company's revenue recognition policy is consistent with applicable revenue recognition guidance and interpretations. The core principle of ASC 606 is to recognize revenue when promised goods or services are transferred to customers in an amount that reflects the consideration that is expected to be received for those goods or services. ASC 606 defines a five-step process to achieve this core principle, which includes: (1) identifying contracts with customers, (2) identifying performance obligations within those contracts, (3) determining the transaction price, (4) allocating the transaction price to the performance obligation in the contract, which may include an estimate of variable consideration, and (5) recognizing revenue when or as each performance obligation is satisfied. The Company assesses whether payment terms are customary or extended in accordance with normal practice relative to the market in which the sale is occurring. The Company's sales arrangements generally include standard payment terms. These terms effectively relate to all customers, products, and arrangements regardless of customer type, product mix or arrangement size.

If revenue recognition criteria are not satisfied, amounts received from customers are classified as deferred revenue on the balance sheet until such time as the revenue recognition criteria are met.

Sales of OmniMetrix monitoring systems include the sale of equipment ("HW") and of monitoring services ("Monitoring"). Sales of OmniMetrix equipment do not qualify as a separate unit of accounting. As a result, revenue (and related costs) associated with sale of equipment are recorded to deferred revenue (and deferred charges) upon shipment for PG and CP monitoring units. Revenue and related costs with respect to the sale of equipment are recognized over the estimated life of the units which are currently estimated to be three years (two years up to December 31, 2017). Revenues from the prepayment of monitoring fees (generally paid twelve months in advance) are initially recorded as deferred revenue upon receipt of payment from the customer and then amortized to revenue over the monitoring service period. See Notes 16 and 17 for the disaggregation of the Company's revenue for the periods presented.

Warranty Provision

OmniMetrix generally grants their customers a one-year warranty on their products. Estimated warranty obligations are provided for as a cost of sales in the period in which the related revenues are recognized, based on management's estimate of future potential warranty obligations and limited historical experience. Adjustments are made to accruals as warranty claim data and historical experience warrant.

The Company's warranty obligations may be materially affected by product or service failure rates and other costs incurred in correcting a product or service failure. Should actual product or service failure rates or other related costs differ from the Company's estimates, revisions to the accrued warranty liability would be required.

Concentration of Credit Risk

Financial instruments, which potentially subject the Company to concentrations of credit risk, consist principally of cash and cash equivalents, escrow deposits and trade accounts receivable. The Company's cash and cash equivalents were deposited primarily with U.S. banks and brokerage firms and amounted to $973 at December 31, 2018, excluding $290 of restricted cash held in a bank in Israel. The Company does not believe there is significant risk of non-performance by these counterparties. See Note 16(d) with respect to revenue from significant customers and concentrations of trade accounts receivables.

Financial Instruments

Fair values of financial instruments included in current assets and current liabilities are estimated to approximate their book values, due to the short maturity of such instruments.

Research and Development Expenses

Research and development expenses consist primarily of labor and related expenses and are charged to operations as incurred.

Advertising Expenses

Advertising expenses are charged to operations as incurred. Advertising expense was $23 and $17 for each of the years ended December 31, 2018 and 2017, respectively.

Stock-Based Compensation

The Company accounts for stock-based awards to employees in accordance with applicable accounting principles, which requires compensation expense related to share-based transactions, including employee stock options, to be measured and recognized in the financial statements based on a determination of the fair value of the stock options. The grant date fair value is determined using the Black-Scholes-Merton ("Black-Scholes") pricing model. For all employee stock options, the Company recognizes expense over the requisite service period on an accelerated basis over the employee's requisite service period (generally the vesting period of the equity grant). The Company's option pricing model requires the input of highly subjective assumptions, including the expected stock price volatility, expected term, and forfeiture rate. Any changes in these highly subjective assumptions significantly impact stock-based compensation expense.

Options awarded to purchase shares of common stock issued to non-employees in exchange for services are accounted for as variable awards in accordance with applicable accounting principles. Such options are valued using the Black-Scholes option pricing model.

See Note 12(d) for the assumptions used to calculate the fair value of stock-based employee compensation. Upon the exercise of options, it is the Company's policy to issue new shares rather than utilizing treasury shares.

Deferred Income Taxes

Deferred income taxes reflects the net tax effects of temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes, as well as operating loss, capital loss and tax credit carryforwards. Deferred tax assets and liabilities are classified as non-current in accordance with ASU 2015-17, Income Taxes (Topic 740): Balance Sheet Classification of Deferred Taxes. Valuation allowances are established against deferred tax assets if it is more likely than not that the assets will not be realized. Deferred tax assets and liabilities are measured using enacted tax rates expected to apply to taxable income in the years in which those temporary differences are expected to be recovered or settled. The effect on deferred tax assets and liabilities of a change in tax rates or laws is recognized in operations in the period that includes the enactment date. See Note 14(e) for the impact of the Tax Cuts and Jobs Act of 2017.

Income Tax Uncertainties

The calculation of the Company’s tax liabilities involves dealing with uncertainties in the application of complex tax regulations. The Company recognizes liabilities for uncertain tax positions based on the two-step process prescribed by applicable accounting principles. The first step is to evaluate the tax position for recognition by determining if the weight of available evidence indicates that it is more likely than not that the position will be sustained on audit, including resolution of related appeals or litigation processes, if any. The second step requires the Company to estimate and measure the tax benefit as the largest amount that is more likely than not being realized upon ultimate settlement. It is inherently difficult and subjective to estimate such amounts, as this requires the Company to determine the probability of various possible outcomes. The Company reevaluates these uncertain tax positions on a quarterly basis. This evaluation is based on factors including, but not limited to, changes in facts or circumstances, changes in tax law, effectively settled issues under audit, and new audit activity. Such a change in recognition or measurement would result in the recognition of a tax benefit or an additional charge to the tax provision in the period. The Company recognizes interest and penalties as incurred in finance income (expense), net in the Consolidated Statements of Operations.

Basic and Diluted Net Income (Loss) Per Share

Basic net income (loss) per share is computed by dividing the net income (loss) attributable to Acorn Energy, Inc. by the weighted average number of shares outstanding during the year, excluding treasury stock. Diluted net income (loss) per share is computed by dividing the net income (loss) by the weighted average number of shares outstanding plus the dilutive potential of common shares which would result from the exercise of stock options and warrants. The dilutive effects of stock options and warrants are excluded from the computation of diluted net loss per share if doing so would be antidilutive. The weighted average number of options and warrants that were excluded from the computation of diluted net loss per share, as they had an antidilutive effect, was approximately 3,778,631 and 4,172,000 for the years ending December 31, 2018 and 2017, respectively.

The following data represents the amounts used in computing EPS and the effect on net income and the weighted average number of shares of dilutive potential common stock:

	Year ended December 31,	
	2018	2017
Net loss available to common stockholders	$(2,001)	$(1,169)
Weighted average shares outstanding:		
-Basic	29,540	29,423
Add: Warrants	—	—
Add: Stock options	—	—
-Diluted	29,540	29,423
Basic and diluted net loss per share	$(0.07)	$(0.04)

Fair Value Measurement

The Company follows the provisions of the accounting standard which defines fair value, establishes a framework for measuring fair value and enhances fair value measurement disclosure. Under these provisions, fair value is defined as the price that would be received to sell an asset or paid to transfer a liability (i.e., the "exit price") in an orderly transaction between market participants at the measurement date.

The standard establishes a hierarchy for inputs used in measuring fair value that maximizes the use of observable inputs and minimizes the use on unobservable inputs by requiring that the most observable inputs be used when available. Observable inputs are inputs that market participants would use in pricing the asset or liability developed based on market data obtained from sources independent of the Company. Unobservable inputs are inputs that reflect the Company's assumptions about the assumptions market participants would use in pricing the asset or liability developed based on the best information available in the circumstances. The hierarchy is described below:

Level 1: Quoted prices (unadjusted) in active markets that are accessible at the measurement date for assets or liabilities. The fair value hierarchy gives the highest priority to Level 1 inputs.

Level 2: Observable prices that are based on inputs not quoted on active markets but corroborated by market data.

Level 3: Unobservable inputs are used when little or no market data is available. The fair value hierarchy gives the lowest priority to Level 3 inputs.

Recently Issued Accounting Principles

Other than the announcement noted below, there have been no recent accounting pronouncements or changes in accounting pronouncements during the year ended December 31, 2018, that are of material significance, or have potential material significance, to the Company.

In May 2014, the Financial Accounting Standards Board ("FASB") issued Accounting Standards Update ("ASU") 2014-09, "Revenue from Contracts with Customers" ("ASU 2014-09"). This update outlines a new comprehensive revenue recognition model that supersedes most current revenue recognition guidance and requires companies to recognize revenue to depict the transfer of promised goods or services to customers in an amount that reflects the

consideration to which the entity expects to be entitled in exchange for those goods or services. The FASB has issued several updates to ASU 2014-09, which collectively with ASU 2014-09, represent the FASB Accounting Standards Codification Topic 606 (“ASC 606”). In September 2017, the FASB issued ASU 2017-13, Revenue Recognition (Topic 605), Revenue from Contracts with Customer (Topic 606), Leases (Topic 840) and Leases (Topic 842), which provides additional implementation guidance on the previously issued ASU 2016-02 Leases (Topic 842). On January 1, 2018, we adopted ASC 606 for all contracts using the modified retrospective method, which means the historical periods are presented under the previous revenue standards with the cumulative net income effect being adjusted through retained earnings. See Note 17.

In August 2016 FASB issued Accounting Standards Update No. 2016-15 Statement of Cash Flows (Topic 230) Classification of Certain Cash Receipts and Cash Payments. The amendments in this Update provide guidance on the eight specific cash flow issues and apply to all entities, including both business entities and not-for-profit entities that are required to present a statement of cash flows under Topic 230. The amendments in this Update are effective for public business entities for fiscal years beginning after December 15, 2017, and interim periods within those fiscal years. Early adoption is permitted, including adoption in an interim period. The adoption of this standard does not have a material impact to the Company’s consolidated financial statements.

In November 2016 the FASB issued ASU 2016-18 Statement of Cash Flows (Topic 230). The amendments in this Update require that a statement of cash flows explain the change during the period in the total of cash, cash equivalents, and amounts generally described as restricted cash or restricted cash equivalents. The amendments in this Update are effective for public business entities for fiscal years beginning after December 15, 2017, and interim periods within those fiscal years. Early adoption is permitted, including adoption in an interim period. If an entity early adopts the amendments in an interim period, any adjustments should be reflected as of the beginning of the fiscal year that includes that interim period. The adoption of this standard does not have a material impact to the Company's consolidated financial statements.

In February 2016, the FASB issued ASU 2016-02, Leases, which is effective for fiscal years, and interim periods within those years with early adoption permitted. Under ASU 2016-02, lessees will be required to recognize for all leases at the commencement date a lease liability, which is a lessee's obligation to make lease payments arising from a lease measured on a discounted basis, and a right-to-use asset, which is an asset that represents the lessee's right to use or control the use of a specified asset for the lease term.

We adopted this standard on January 1, 2019 and are applying the transition guidance as of the date of adoption, under the current period adjustment method. As a result, we will recognize right-of-use assets and lease liabilities associated with our leases on January 1, 2019, with a cumulative-effect adjustment to the opening balance of accumulated earnings, while the comparable prior periods in our financial statements will continue to be reported in accordance with Topic 840, including the disclosures of Topic 840.

The standard includes a number of optional practical expedients under the transaction guidance. We have elected the package of practical expedients which allows us to not reassess prior conclusions about lease identification, lease classification, and initial direct costs. We also made accounting policy elections by class of underlying asset to not apply the recognition requirements of the standard to leases with terms of 12 months or less and to not separate non-lease components from lease components. Consequently, each separate lease component and the non-lease components associated with that lease component will be accounted for as a single lease component for lease classification, recognition, and measurement purposes.

Upon adoption of the standard, we expect to recognize a lease obligation liability ranging from $100 to $125 and a right-of-use asset ranging from $100 to $125. We believe that the standard will not have a material impact on our consolidated statements of income and comprehensive income or cash flows. In June 2018, the FASB issued ASU 2018-07, which simplifies the accounting for nonemployee share-based payment transactions. The amendments specify that Topic 718 applies to all share-based payment transactions in which a grantor acquires goods or services to be used or consumed in a grantor's own operations by issuing share-based payment awards. The standard will be effective in the first quarter of fiscal year 2020, although early adoption is permitted (but no sooner than the adoption of Topic 606). The Company is currently evaluating the effect the adoption of this ASU will have on its financial statements.

In January 2017, the FASB issued ASU No. 2017-01, Business Combinations (Topic 805) – Clarifying the Definition of a Business. This new guidance clarifies the definition of a business in a business combination. The guidance is effective beginning the first quarter of fiscal year 2018. Early adoption is permitted. The adoption of this standard did not have a material impact on the Company’s consolidated financial statements.

NOTE 3—DSIT SOLUTIONS, LTD. ("DSIT")

The assets and liabilities related to the deconsolidated operations of DSIT are reflected in the table below. The Due from Acorn balance at December 31, 2017 is comprised of a loan of $340 from DSIT and unreimbursed expenses of $999, both of which accrue interest at 3.15% per annum. Such balances were due the earlier of April 30, 2018 or the sale of Acorn's remaining shares in DSIT. In addition to the above balances, the Due from Acorn balance also included $285 with respect to provisions for severance and vacation for the Company's CFO who is an employee of DSIT. The loan from DSIT to Acorn is secured by the Company's shares of DSIT.

	December 31, 2017 (unaudited)
Current assets:	
Cash and cash equivalents	$ 112
Restricted deposits	353
Accounts receivable	7,601
Unbilled revenue	3,433
Inventory	755
Due from Acorn	1,624
Other current assets	1,051
Total current assets	14,929
Property and equipment, net	563
Severance assets	4,168
Restricted deposits	2
Other assets	348
Total assets	$ 20,010
Current liabilities:	
Short-term bank credit and current maturities of long-term bank debt	$ 339
Accounts payable	730
Accrued payroll, payroll taxes and social benefits	1,627
Deferred revenue	682
Other current liabilities	3,088
Total current liabilities	6,466
Accrued severance	5,383
Other long-term liabilities	106
Total liabilities	$ 11,955

On February 14, 2018, (the "Closing Date"), the Company closed on the sale of our remaining interest in DSIT to a group of Israeli investors for $5.8 million before transaction costs and withholding taxes. Accordingly, we adjusted our equity investment balance in DSIT to be equal to the gross proceeds received from the sale and recorded an impairment charge in 2017 of $308,000. In 2018, we recorded our 41.2% share of DSIT's income or loss through the closing of the 2018 DSIT Transaction as well as our estimated transaction costs and withholding taxes on the

transaction ($441,000 and $388,000, respectively) offset by $222,000, net of professional fees less interest income, refunded by the Israel Tax Authorities related to our 2016 Israeli tax return. From the proceeds, the Company also repaid $1,600 of amounts due to DSIT and $1,428 of loan principal and interest due to directors.

The Company's share of DSIT's net income for the period from January 1, 2018 to the Closing Date and the year-ended December 31, 2017 is shown below:

	Period from January 1, 2018 to the Closing Date	Year ended December 31, 2017
Revenue	$ 4,481	$ 17,245
Cost of sales	2,842	10,644
Gross profit	1,639	6,601
Net income	$ 160	$ 1,093
Acorn's share of net income in DSIT	$ 33	$ 450

The activity of the Company's Investment in DSIT for the period from January 1, 2018 to December 31, 2018 can be seen below:

	Equity Investment balance in DSIT
Balance at December 31, 2016	$ 5,658
Acorn's share of net income in DSIT for the year ended December 31, 2017	450
Impairment	(308)
Balance at December 31, 2017	5,800
Acorn's share of net income in DSIT for the period from January 1, 2018 to the Closing Date	33
Impairment	(33)
Sale of Investment in DSIT	(5,800)
Balance at December 31, 2018	$ —

In the Company's sale of its shares of DSIT Solutions Ltd. ("DSIT"), the Israel Tax Authorities ("ITA") withheld tax of NIS 1,008, NIS 146 and NIS 1,359 in 2016, 2017 and 2018, respectively. Such amounts were recorded as expense ($266, $41 and $388) in each of those years. In August 2018, the Company received back from the ITA NIS 1,087 ($293 at the then exchange rate) consisting of $266 of tax, $21 of interest income and $6 of exchange gain.

The Company received the refund following the filing of its 2016 Israeli tax return in which the Company claimed that it was due a refund of the withheld taxes in full as it believes that each of the sale transactions is exempt from tax under Israeli tax law. The ITA did not timely respond to the Company's refund claim for the 2016 tax withheld and under Israeli tax law was required to return the tax withheld in the 2016 transaction with interest. However, the Company had to provide a letter to the ITA stating that it understands that the return of the tax withheld resulting from its 2016 Israeli tax filing does not constitute the consent of the ITA to the method of reporting and the tax refund deriving from it and another letter whereby the Company committed not to transfer those funds received out of Israel until the end of the ITA's review. The ITA has requested documentation of the transaction to begin its review of Acorn's position.

The Company has recorded the $222, net of fees of $65 offset by interest income of $21, as part of the gain (loss) on sale of interest of DSIT in the third quarter of 2018 relating to the 2016 DSIT transaction withholding. This offsets the loss on the 2018 DSIT transaction which reduced the loss recorded in 2018 to $607. The Company does not believe it will have to return such funds to the ITA at the end of the ITA's review. However, as the Company committed not to transfer those funds out of Israel until the completion of the ITA's review, such funds are deemed to be restricted and are reflected as such on the Company's balance sheet as of September 30, 2018. By statute, the funds will no longer be restricted the earlier of December 31, 2022 or the completion of the ITA's review of the Company's tax position. The Company believes that the ITA will complete its review of the Company's tax position by the end of 2019. The amount received is reflected as restricted cash as of December 31, 2018.

The Company has filed its Israeli return for 2017 and requested a refund of the NIS 146 tax withheld (currently valued at $40 before interest) and plans to file its 2018 return and request a refund of the NIS 1,358 tax withheld (currently valued at $375 before interest). The Company will record a tax benefit on the tax withheld in 2017 and 2018 if and when those monies are remitted back to the Company by the ITA.

NOTE 4—Discontinued Operations

On April 21, 2016, the Company announced that it decided to cease operations of its GridSense subsidiary and initiate the liquidation of the GridSense assets. As a result of this decision, GridSense is being reported as a discontinued operation. Following the decision to cease GridSense operations, the Company wrote down all GridSense assets to their estimated realizable values at the time and accrued for estimated severance costs of $140 and lease commitments of $100 in GridSense's first 2016 quarter results.

On July 12, 2016, the Company and its GridSense subsidiary completed the sale of the GridSense assets to Franklin Fueling Systems, Inc., a wholly-owned subsidiary of Franklin Electric Co., Inc. for a gross sales price of $1,000 of which $100 was set aside as an indemnity escrow. In the second quarter of 2017, $50 of the escrow was released to GridSense. These funds were used to settle claims by both Acorn and OmniMetrix following the cessation of settlements with outside creditors (see below). The remaining $50 escrow balance was released in July 2017.

With the proceeds from the July 2016 sale, GridSense paid off approximately $240 of previously accrued severance and other payroll costs. GridSense recorded a gain of $944 (net of transaction costs) on this transaction as the value of the GridSense assets sold had previously been written down to nearly zero. Such gain was included in discontinued operations in the third quarter of 2016.

Also, following the sale, GridSense engaged a third-party liquidation officer to satisfy, to the extent of the funds available from the remaining proceeds, the claims of GridSense creditors, including Acorn which is GridSense's largest creditor. Through December 31, 2016, the third-party liquidator settled approximately $459 of outside creditor claims while disbursing approximately $47 to those creditors. At December 31, 2016, GridSense had approximately $19 of cash available (excluding escrow amounts) for satisfaction of remaining creditor claims of approximately $314.

During the nine months ended September 30, 2017, the liquidator settled $70 of claims while disbursing $7 to outside creditors. These settlements occurred in the first quarter of 2017 with no settlements with outside creditors being made subsequent to the first quarter of 2017.

On September 25, 2017 (the "Liquidation Date"), the Board of Directors of GridSense Inc. decided to dissolve and wind up the affairs of GridSense Inc. and adopted a Plan of Liquidation and Dissolution (the "Plan"). In accordance with the Plan, which was adopted on the same date, GridSense Inc. filed and executed Articles of Dissolution of the Corporation with the State of Colorado and established a liquidating trust to which all assets and liabilities of GridSense Inc. were transferred to in order to implement the winding up of the business. In addition, GridSense Pty Ltd. ("GPL"), the parent company of GridSense's former operating company in Australia, has been deregistered by the Australian Securities & Investments Commission ("ASIC"). As a result of the deregistration, which is akin to a Chapter

7 bankruptcy in the US, (i) GPL has ceased to exist as a legal entity and its property is deemed vested in ASIC, (ii) the former officers and directors of GPL no longer have the right to deal with property registered in GPL's name and (iii) legal proceedings against GPL cannot be commenced or continued.

Accordingly, following the two aforementioned events, GridSense (GridSense Inc. and GPL) has been deconsolidated from the books of the Company. The Company recorded a gain on the deconsolidation of GridSense comprised of the elimination of the net liabilities of GridSense of $914 (see below) and the Accumulated Other Comprehensive Loss of $254 associated with GridSense.

Assets and liabilities related to the discontinued operations of GridSense are as follows:

	As of the Liquidation Date*
Cash	$ 10
Other current assets and non-current assets	—
Total assets	$ 10
Accounts payable	$ 430
Accrued payroll, payroll taxes and social benefits	90
Other current and non-current liabilities	404
Total liabilities	$ 924
Net liabilities	$ 914

* Just prior to the deconsolidation

GridSense's operating results for the period from January 1, 2017 to the Liquidation Date are included in "Income (loss) from discontinued operations, net of income taxes" in the Company's Consolidated Statements of Operations. Selected financial information for GridSense's operations for those periods are presented below:

	Year ended December 31, 2017
Net income (loss)	$ 38
Gain on deconsolidation	660
Income (loss) from discontinued operations, net of income taxes	$ 698

NOTE 5—INVESTMENT IN OMNIMETRIX

On October 16, 2015, one of the Company's directors (such director resigned from the board on August 6, 2018) acquired a 10% interest in the Company's OmniMetrix Holdings, Inc. subsidiary ("Holdings") for $500 through the purchase of preferred stock. Holdings is the holder of 100% of the membership interests OmniMetrix, LLC through which the Company operates its M2M and pipeline monitoring activities. In the transaction, the director acquired 1,000 shares of Series A Preferred Stock (the "OmniMetrix Preferred Stock") of Holdings. Subsequently, on November 23, 2015, the director acquired an additional 1,000 shares of OmniMetrix Preferred Stock for an additional $500. The $1,000 investment by the director has been recorded as an increase in non-controlling interests.

A dividend of 10% per annum accrues on the OmniMetrix Preferred Stock. The dividend is payable on the first anniversary of the funding of the investment and quarterly thereafter for so long as the OmniMetrix Preferred Stock is outstanding and has not been converted to Common Stock. The dividend is payable in cash or the form of additional shares of OmniMetrix Preferred Stock at the election of the holder. Through December 31, 2016, a dividend payable of $115 was recorded with respect to the OmniMetrix Preferred Stock. On December 31, 2016, the director agreed to treat the $115 of accrued dividends as a loan to OmniMetrix which bears interest at 8% per year. Such loan is in addition to the $50 loan given by the director to OmniMetrix in December of 2016. During the year ended December 31, 2017, $100 of dividends accrued on the Preferred Stock and added to the loan balance. All amounts due (principal and interest) are due the later of April 30, 2018 or 90 days following the advance of any new loans (such as the quarterly dividend accrual). During the year ended December 31, 2017, the Company accrued $16 of interest with respect to these director loans.

On May 14, 2018, Holdings and the director entered into an agreement whereby effective May 1, 2018, the dividend on the Preferred Stock was reduced to 8%. In addition, all the amounts due to the director (accrued dividends, loan and accrued interest) and all future dividends that shall accrue on the Preferred Stock through June 30, 2020, will be paid by Holdings pursuant to an agreed-upon payment schedule which ends on June 30, 2020. During the year ended December 31, 2018, Holdings made payments of $100 in the aggregate in accordance with the agreed upon payment schedule and additional quarterly dividends of $87 in the aggregate were accrued. At December 31, 2018, the obligation to the director was $283, representing unpaid accrued dividends. This amount, in addition to all future dividends that shall accrue on the Preferred Stock, will be paid by Holdings to the director quarterly as follows:

In the year ending December 31, 2019	$250
In the six-month period ended June 30, 2020	$153

Dividends shall be paid only to the extent provided under Holdings' Amended and Restated Certificate of Incorporation and as permitted under applicable law.

The OmniMetrix Preferred Stock may convert at the option of the holder on a one-for-one basis into OmniMetrix common stock, subject to appropriate adjustments for corporate reorganizations, mergers, stock splits, etc. The OmniMetrix Preferred Stock has full ratchet anti-dilution protection and will not be diluted by any issuances below a pre-money equity valuation of $5,500 for OmniMetrix.

NOTE 6 — RESTRUCTURING AND RELATED CHARGES

In 2013, OmniMetrix restructured its operations to better align expenses with revenues following a change in management. The restructuring involved employee severance and termination benefits as well as a charge for a significant reduction in the utilization of its leased facility in Buford and a write-down of a majority of the remaining book value of leasehold improvements associated with the leased facility.

During the year ended December 31, 2017, OmniMetrix paid $46 of this liability and accrued an additional $16 which is included in Selling, general and administrative expense in the year ended December 31, 2017. The remaining accrued restructuring balance at December 31, 2017 of $129 is included in Other current liabilities ($64) and Other long-term liabilities ($65) in the Company’s Consolidated Balance Sheets.

During the year ended December 31, 2018, the liability was reduced by $64 of this liability. The remaining accrued restructuring balance at December 31, 2018 of $65 is included in Other current liabilities in the Company’s Consolidated Balance Sheets.

NOTE 7—INVENTORY

	As of December 31,	
	2018	2017
Raw materials	$152	$182
Finished goods	109	47
	$261	$229

At December 31, 2018 and 2017, the Company’s inventory reserve was $0 and $0, respectively.

NOTE 8—PROPERTY AND EQUIPMENT, NET

Property and equipment consists of the following:

	Estimated Useful Life (in years)	As of December 31, 2018	**2017**
Cost:			
Computer hardware and software	3 - 5	$55	$55
Equipment	7	145	145
Leasehold improvements	Term of lease	339	339
		539	539
Accumulated depreciation and amortization			
Computer hardware and software		55	55
Equipment		120	96
Leasehold improvements		291	249
		466	400
Property and equipment, net		$73	$139

Depreciation and amortization in respect of property and equipment amounted to $66 and $75 for 2018 and 2017, respectively.

NOTE 9—DEBT

(a) OmniMetrix

In February 2016, OmniMetrix signed a Loan and Security Agreement with a lender providing OmniMetrix with access to accounts receivable formula-based financing of up to $500. In connection with this financing arrangement, OmniMetrix granted the lender a security interest in OmniMetrix's receivables, inventory and certain other assets. Debt incurred under this financing arrangement bore interest at the greater of prime (3.75% at December 31, 2016) plus 2% or 6% per year. In addition, OmniMetrix was to pay a monthly service charge of 1.125% of the average aggregate principal amount outstanding for the prior month, for a current effective rate of interest on advances of 19.5%.

In September 2016, the abovementioned Loan and Security Agreement was amended to reflect a reduced monthly service charge of 1.0% and modified formula determining the amount available from 80% of eligible hardware invoices and 40% of eligible monitoring invoices to 75% of all eligible invoices. In return, OmniMetrix agreed to maintain a minimum loan balance of $150 in its line-of-credit with the lender for a minimum of one year beginning October 1, 2016.

In October 2017, OmniMetrix renewed its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1,000. Debt incurred under this financing arrangement bears interest at the greater of prime (4.50% at December 31, 2017) plus 2% or 6% per year. In addition, OmniMetrix is to pay a monthly service charge of 0.9% of the average aggregate principal amount outstanding for the prior month, for a current effective rate of interest on advances of 17.3%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150 in its line-of-credit with the lender for a minimum of one year beginning November 1, 2017. The line-of-credit expired in accordance with its terms on October 31, 2018 and OmniMetrix did not renew at that time. See Note 18, Subsequent Events, for recent update. OmniMetrix accounts receivable payments were applied to the outstanding balance until it was paid in full on November 6, 2018.

OmniMetrix had an outstanding balance of $0 and $313 as of December 31, 2018 and 2017, respectively, pursuant to the Loan and Security Agreement.

NOTE 10—OTHER CURRENT LIABILITIES

Other current liabilities consist of the following:

	As of December 31,	
	2018	2017
Taxes	$25	$90
Warranty provision	37	31
Restructuring liabilities	65	64
	$127	$185

NOTE 11—COMMITMENTS AND CONTINGENCIES

(a) Leases of Property

Office lease payments for 2018 and 2017 were $97 and $79, respectively. OmniMetrix leases office space and office equipment under operating lease agreements. This office space lease expires December 31, 2019. The office equipment lease is month to month. The future minimum lease payments on non-cancelable operating leases as of December 31, 2018 are $109.

NOTE 12—EQUITY

(a) General

At December 31, 2018 the Company had issued and outstanding 29,555,786 shares of its common stock, par value $0.01 per share. Holders of outstanding common stock are entitled to receive dividends when, as and if declared by the Board and to share ratably in the assets of the Company legally available for distribution in the event of a liquidation, dissolution or winding up of the Company. Holders of common stock do not have subscription, redemption, conversion or other preemptive rights. Holders of the common stock are entitled to elect all of the Directors on the Company's Board. Holders of the common stock do not have cumulative voting rights, meaning that the holders of more than 50% of the common stock can elect all of the Company's Directors. Except as otherwise required by Delaware General Corporation Law, all stockholder action is taken by vote of a majority of shares of common stock present at a meeting of stockholders at which a quorum (a majority of the issued and outstanding shares of common stock) is present in person or by proxy or by written consent pursuant to Delaware law (other than the election of Directors, who are elected by a plurality vote).

On August 6, 2018, the Company's stockholders approved an amendment to the Company's restated certificate of incorporation to authorize a reverse split of the Company's common stock at any time prior to August 6, 2019, at a ratio between one-for-ten and one-for-twenty, if and as determined by the Company's Board of Directors.

The Company is not authorized to issue preferred stock. Accordingly, no preferred stock is issued or outstanding.

(b) Shares issued in lieu of director's fees – See Note 15(a).

(c) Conversion of director loan to common stock – See Note 15(b).

(d) Summary Employee Option Information

The Company's stock option plans provide for the grant to officers, directors and other key employees of options to purchase shares of common stock. The purchase price may be paid in cash or at the end of the option term, if the option is "in-the-money", it is automatically exercised "net". In a net exercise of an option, the Company does not require a payment of the exercise price of the option from the optionee, but reduces the number of shares of common stock issued upon the exercise of the option by the smallest number of whole shares that has an aggregate fair market value equal to or in excess of the aggregate exercise price for the option shares covered by the option exercised. Each option is exercisable to one share of the Company's common stock. Most options expire within five to ten years from the date of the grant, and generally vest over three-year period from the date of the grant. At the annual meeting of stockholders on September 11, 2012, the Company's stockholders approved an Amendment to the Company's 2006 Stock Incentive Plan to increase the number of available shares by 1,000,000 and an Amendment to the Company's 2006 Stock Incentive Plan for Non-Employee Directors to increase the number of available shares by 200,000. In February 2019, the Company's Board extended the expiration date of the 2006 Stock Incentive Plan until December 31, 2024.

At December 31, 2018, 1,493,780 options were available for grant under the 2006 Amended and Restated Stock Incentive Plan and no options were available for grant under the 2006 Director Plan. In 2018 and 2017, 175,000 and 90,000 options were granted to directors and employees, respectively. In 2018, there were 5,000 grants to non-employees. In 2017, 1,500 options were granted to a non-employee. The fair value of the options issued was $43 and $18 in 2018 and 2017, respectively.

No options were exercised in the years ended December 31, 2018 or 2017. The intrinsic value of options outstanding and of options exercisable at December 31, 2018 was $13 and $13, respectively.

The Company utilized the Black-Scholes option-pricing model to estimate fair value, utilizing the following assumptions for the respective years (all in weighted averages):

	2018	2017
Risk-free interest rate	2.5 %	2.2 %
Expected term of options, in years	3.9	6.6
Expected annual volatility	123.6%	83 %
Expected dividend yield	— %	— %
Determined weighted average grant date fair value per option	$0.24	$0.18

The expected term of the options is the length of time until the expected date of exercising the options. With respect to determining expected exercise behavior, the Company has grouped its option grants into certain groups in order to track exercise behavior and establish historical rates. The Company estimated volatility by considering historical stock volatility over the expected term of the option. The risk-free interest rates are based on the U.S. Treasury yields for a period consistent with the expected term. The Company expects no dividends to be paid. The Company believes that the valuation technique and the approach utilized to develop the underlying assumptions are appropriate in determining the estimated fair value of the Company's stock options granted in the years ended December 31, 2018 and 2017. Estimates of fair value are not intended to predict actual future events or the value ultimately realized by persons who receive equity awards.

(e) Summary Option Information

A summary of the Company's option plans as of December 31, 2018 and 2017, as well as changes during each of the years then ended, is presented below:

	2018		2017	
	Number of Options (in shares)	Weighted Average Exercise Price	Number of Options (in shares)	Weighted Average Exercise Price
Outstanding at beginning of year	1,401,489	$ 3.45	2,050,369	$ 3.62
Granted at market price	175,000	0.32	91,500	0.25
Exercised	—	—	—	—
Forfeited or expired	(110,000)	4.32	(740,380)	3.54
Outstanding at end of year	1,466,489	3.01	1,401,489	3.45
Exercisable at end of year	1,386,489	$ 3.16	1,393,155	$ 3.47

Summary information regarding the options outstanding and exercisable at December 31, 2018 is as follows:

	Outstanding			Exercisable	
Range of Exercise Prices	Number Outstanding	Weighted Average Remaining Contractual Life	Weighted Average Exercise Price	Number Exercisable	**Weighted Average Exercise Price**
	(in shares)	(in years)		(in shares)	
$0.14 – $0.77	527,523	2.99	$ 0.45	447,523	$ 0.47
$0.97 – $2.49	422,785	1.53	$ 1.55	422,785	$ 1.55
$3.51 – $5.91	125,466	1.50	$ 4.24	125,466	$ 4.24
$6.31 – $7.57	227,356	.83	$ 6.79	227,356	$ 6.79
$7.60 - $11.42	163,359	.98	$ 8.82	163,359	$ 8.82
	1,466,489			1,386,489	

Stock-based compensation expense included in Selling, general and administrative expense in the Company's Consolidated Statements of Operations was $15 and $22 in the years ending December 31, 2018 and 2017, respectively.

The total compensation cost related to non-vested awards not yet recognized was $30 for the year ended December 31, 2018.

(f) Warrants

The Company has issued warrants at exercise prices equal to or greater than market value of the Company's common stock at the date of issuance. A summary of warrant activity follows:

	2018		2017	
	Number of shares underlying warrants	Weighted Average Exercise Price	Number of shares underlying warrants	Weighted Average Exercise Price
Outstanding at beginning of year	2,654,423	$ 1.46	2,654,423	$ 1.46
Granted	—	—	—	—
Exercised	—	—	—	—
Forfeited or expired	262,281	3.14	—	
Outstanding and exercisable at end of year	2,392,142	$ 1.28	2,654,423	$ 1.46

The warrants outstanding at December 31, 2018 have a weighted average remaining contractual life of 1.34 years.

NOTE 13—FINANCE EXPENSE, NET

Finance income (expense), net consists of the following:

	Year ended December 31,	
	2018	2017
Interest income	$6	$1
Interest expense*	(113)	(232)
Exchange gain, net	3	—
	$(104)	$(231)

* Interest expense includes $6 and $123 with respect to Loans from Directors in the years ended December 31, 2018 and 2017 and $84 and $31 in interest related to the OmniMetrix Loan and Security Agreement in the years ended December 31, 2018 and 2017, respectively.

NOTE 14—INCOME TAXES

(a) Composition of loss from continuing operations before income taxes is as follows:

	Year ended December 31,	
	2018	2017
Domestic	$(2,087)	$(2,142)
Foreign	—	—
	$(2,087)	$(2,142)

Income tax expense consists of the following:

	Year ended December 31,	
	2018	2017
Current:		
Federal	$ —	$ —
State and local	—	—
Foreign		41
		41
Deferred:		
Federal	—	—
State and local	—	—
Foreign	—	—
	—	—
Total income tax expense	$	$ 41

(b) Effective Income Tax Rates

Set forth below is a reconciliation between the federal tax rate and the Company’s effective income tax rates with respect to continuing operations:

	Year ended December 31,	
	2018	2017
Statutory Federal rates	21 %	34 %
Increase (decrease) in income tax rate resulting from:		
Tax on foreign activities		(2)
Other, net (primarily permanent differences)		(1)
Valuation allowance	(21)%	(37)
Effective income tax rates	%	(2)%

(c) Analysis of Deferred Tax Assets and (Liabilities)

	As of December 31,	
	2018	2017
Deferred tax assets (liabilities) consist of the following:		
Employee benefits and deferred compensation	$1,035	$1,089
Investments and asset impairments	1,818	1,772
Other temporary differences	(674)	(686)
Net operating loss and capital loss carryforwards	16,136	15,643
	18,315	17,818
Valuation allowance	(18,315)	(17,818)
Net deferred tax assets	$—	$—

Valuation allowances relate principally to net operating loss carryforwards related to the Company's consolidated tax losses as well as state tax losses related the Company's OmniMetrix subsidiary and book-tax differences related asset impairments and stock compensation expense of the Company. During the year ended December 31, 2018, the valuation allowance increased by $497. The increase was primarily the result of the increase in the net operating loss.

(d) Summary of Tax Loss Carryforwards

As of December 31, 2018, the Company had various operating loss carryforwards expiring as follows:

Expiration	Federal	Capital Loss	State
2023	$—	$9,356	$—
2024 – 2031*	1,511	—	—
2032 – 2037	58,549	—	14,898
Unlimited	2,896	—	938
Total	$62,956	$9,356	$15,836

* The utilization of a portion of these net operating loss carryforwards is limited due to limits on utilizing net operating loss carryforwards under Internal Revenue Service regulations following a change in control.

(e) Taxation in the United States

The Tax Cuts and Jobs Act (the "Act") was enacted on December 22, 2017. The Act reduces the U.S. federal corporate tax rate from 35% to 21%, requires companies to pay a one-time transition tax on earnings of certain foreign subsidiaries that were previously tax deferred and creates new taxes on certain foreign sourced earnings. The most significant impact of the legislation for the Company was a reduction of the value of the Company's net deferred tax assets (which represent future tax benefits) as a result of lowering the U.S. corporate income tax rate from 35% to 21% (see Note 17(c) above). The Act also includes a requirement to pay a one-time transition tax (the "Transition Tax") on the cumulative value of earnings and profits that were previously not repatriated for U.S. income tax purposes. The Company does not believe that it will be required to pay any Transition Tax on its previously unrepatriated earnings and profits of its previously consolidated foreign subsidiaries.

As a holding company without other business activity in Delaware, the Company is exempt from Delaware state income tax. Thus, the Company's statutory income tax rate on domestic earnings is the federal rate of 21%.

(f) Uncertain Tax Positions (UTP)

As of December 31, 2018 and 2017, no interest or penalties were accrued on the balance sheet related to UTP.

During the years ending December 31, 2018 and 2017, the Company had no changes in unrecognized tax benefits or associated interest and penalties as a result of tax positions made during the current or prior periods with respect to its continuing or discontinued operations.

The Company is subject to U.S. Federal and state income tax. As of January 1, 2018, the Company is no longer subject to examination by U.S. Federal taxing authorities for years before 2015, for years before 2014 for state income taxes.

NOTE 15—RELATED PARTY BALANCES AND TRANSACTIONS

a) Director Fees

The Company recorded fees to directors of $166 (including a bonus to the former board chairman of $50) and $94 for each of the years ended December 31, 2018 and 2017, respectively, all of which are included in Selling, general and administrative expenses.

Each Director of the Company may elect by written notice delivered on or before the first day of each calendar year whether to receive, in lieu of some or all of his or her retainer and board fees, that number of shares of Company common stock as shall have a value equal to the applicable retainer and board fees, based on the closing price of the Company's common stock on its then-current trading platform or exchange on the last trading day immediately preceding the first day of the applicable year. Once made, the election shall be irrevocable for such election year and the shares subject to the election shall vest and be issued one-fourth upon the first day of the election year and one-fourth as of the first day of each of the second through fourth calendar quarters thereafter during the remainder of the election year. For the 2017 calendar year, Messrs. Woolard and Jackson elected to receive Common Stock in lieu of retainer and board fees of $17 and $15, respectively which is included in the fees to directors above. Accordingly, Messrs. Woolard and Jackson were issued for 2017 94,444 and 83,333 shares of Common Stock, respectively. For the 2018 calendar year, Mr. Woolard elected to receive Common Stock in lieu of retainer and board fees of $13, which is included in the fees to directors above. Accordingly, Mr. Woolard was issued for 2018, 55,435 shares of common stock.

b) 2017 Director Loans

On February 16, 2017, the Company secured commitments for $1,900 in funding in the form of loans from members of the Company's Board of Directors, of which $900 was immediately funded and an additional $400 was funded in the third quarter of 2017. On February 22, 2018, following the receipt of the proceeds from the 2018 DSIT Transaction (see Note 3), the Company repaid in full $1,300 of principal and $128 accrued interest due through that date with respect to these loans.

Prior to the repayment of these loans on February 22, 2018, the Company accrued $21 of interest expense in the year ended December 31, 2018 compared to $107 of interest expense accrued in the year ended December 31, 2017 relating to these director loans.

c) See Note 5 for information related to the sale of OmniMetrix Preferred Stock to one of the Company's directors and a loan from the director to OmniMetrix.

d) The related party balance due to Acorn from OmniMetrix is $3,900 for amounts loaned, accrued interest and expenses paid by Acorn on Omni's behalf.

NOTE 16—SEGMENT REPORTING AND GEOGRAPHIC INFORMATION

(a) General Information

As of December 31, 2018, the Company operates in two reportable operating segments, both of which are performed though the Company's OmniMetrix subsidiary:

The PG segment provides wireless remote monitoring and control systems and services for critical assets as well as Internet of Things applications.

The CP segment provides for remote monitoring of cathodic protection systems on gas pipelines for gas utilities and pipeline companies.

The Company's reportable segments are strategic business units, offering different products and services and are managed separately as each business requires different technology and marketing strategies.

(b) Information about Profit or Loss and Assets

The accounting policies of all the segments are those described in the summary of significant accounting policies. The Company evaluates performance based on net income or loss before taxes.

The Company does not systematically allocate assets to the divisions of the subsidiaries constituting its consolidated group, unless the division constitutes a significant operation. Accordingly, where a division of a subsidiary constitutes a segment that does not meet the quantitative thresholds of applicable accounting principles, depreciation expense is recorded against the operations of such segment, without allocating the related depreciable assets to that segment. However, where a division of a subsidiary constitutes a segment that does meet the quantitative thresholds, related depreciable assets, along with other identifiable assets, are allocated to such division.

The following tables represent segmented data for the years ended December 31, 2018 and 2017. The Company does not currently break out total assets by reportable segment as there is a high level of shared utilization between the segments. Further, the Chief Decision Maker (CDM) does not review the assets by segment.

	PG	CP	Total
Year ended December 31, 2018:			
Revenues from external customers	$3,656	$1,431	$5,087
Intersegment revenues	—	—	—
Segment gross profit	2,524	598	3,122
Depreciation and amortization	48	18	66
Segment income (loss) before income taxes	117	(323)	(206)
Year ended December 31, 2017:			
Revenues from external customers	$3,355	$995	$4,350
Intersegment revenues	—	—	—
Segment gross profit	2,017	430	2,447
Depreciation and amortization	58	17	75
Segment loss before income taxes	(531)	(340)	(871)

The Company does not currently break out total assets by reportable segment as there is a high level of shared utilization between the segment. Also, the CDM does not review assets by segment.

(c) The following tables represent a reconciliation of the segment data to consolidated statement of operations and balance sheet data for the years ended and as of December 31, 2018 and 2017:

	Year ended December 31,	
	2018	2017
Total net loss before income taxes for reportable segments	$(206)	$(871)
Other operational segment net loss before income taxes	—	—
Segment loss before income taxes	(206)	(871)
Loss on sale of interest in DSIT, net of transaction costs	(607)	—
Unallocated net cost of corporate headquarters*	(1,274)	(1,271)
Consolidated net loss before taxes on income	$(2,087)	$(2,142)

* Includes $26 and $22 of stock compensation expense for the years ended December 31, 2018 and 2017, respectively. Also includes $26 and $107 of interest expense with respect to former director loans for the years ended December 31, 2018 and 2017, respectively.

	As of December 31,	
	2018	**2017**
Assets:		
Total assets for OmniMetrix subsidiary	$2,823	$2,931
Assets of corporate headquarters *	1,096	6,291
Total consolidated assets	$3,919	$9,222

* Includes the investment in DSIT of $5,800 at December 31, 2017.

Other Significant Items	Segment Totals	Adjustments	Consolidated Totals
Year ended December 31, 2018			
Depreciation and amortization	$ 66	$ —	$ 66
Year ended December 31, 2017			
Depreciation and amortization	$ 75	$ —	$ 75

	Year ended December 31,	
	2018	2017
Revenues based on location of customer:		
United States	$5,087	$4,327
Other		23
	$5,087	$4,350

All of the Company's long-lived assets are located in the United States.

(d) Revenues and Accounts Receivable Balances from Major Customers

Customers are related to OmniMetrix's CP segment.

	Revenue				Accounts Receivable**			
	2018		2017		2018		2017	
Customer	Balance	%	Balance	%	Balance	%	Balance	%
A	*	*	*	*	$115	17%	297	27

* Balance is not significant

NOTE 17—REVENUE

The core principle of ASC 606 is to recognize revenue when promised goods or services are transferred to customers in an amount that reflects the consideration that is expected to be received for those goods or services. ASC 606 defines a five-step process to achieve this core principle, which includes: (1) identifying contracts with customers, (2) identifying performance obligations within those contracts, (3) determining the transaction price, (4) allocating the transaction price to the performance obligation in the contract, which may include an estimate of variable consideration, and (5) recognizing revenue when or as each performance obligation is satisfied.

Sales of OmniMetrix monitoring systems include the sale of hardware ("HW") and of monitoring services ("Monitoring"). Sales of OmniMetrix equipment do not qualify as a separate unit of accounting. As a result, revenue (and related costs) associated with sale of equipment are recorded to deferred revenue (and deferred charges) upon shipment for PG and CP monitoring units. Revenue and related costs with respect to the sale of equipment are recognized over the estimated life of the units which are currently estimated to be three years (two years up to December 31, 2017). Revenues from the prepayment of monitoring fees (generally paid twelve months in advance) are initially recorded as deferred revenue upon receipt of payment from the customer and then amortized to revenue over the monitoring service period.

The following table disaggregates the Company's revenue for the years ended December 31, 2018 and 2017:

	HW	Monitoring	Total
Year ended December 31, 2018:			
PG Segment	$1,152	$ 2,504	$3,656
CP Segment	1,223	208	1,431
Total Revenue	$2,375	$ 2,712	$5,087

	HW	Monitoring	Total
Year ended December 31, 2017:			
PG Segment	$1,228	$ 2,127	$3,355
CP Segment	887	108	995
Total Revenue	$2,115	$ 2,235	$4,350

Deferred revenue activity for the year ended December 31, 2018 can be seen in the table below:

	HW	Monitoring	Total
Balance at December 31, 2017	$2,227	$ 1,337	$3,564

Additions during the period	2,374	3,004	5,378
Recognized as revenue	(2,169)	(2,712)	(4,881)
Balance at December 31, 2018	2,432	1,629	$4,061
Amounts to be recognized as revenue in the year ending:			
December 31, 2019	1,353	1,379	2,732
December 31, 2020	731	244	975
December 31, 2021 and thereafter	348	6	354
	$2,432	$ 1,629	$4,061

Other revenue of approximately $206 is related to accessories, repairs, and other miscellaneous charges that are recognized to revenue when sold and are not deferred.

Deferred revenue activity for the year ended December 31, 2017 can be seen in the table below:

	HW	Monitoring	Total
Balance at December 31, 2016	$1,655	$ 1,123	$2,778
Additions during the period	2,512	2,447	4,959
Recognized as revenue	(1,940)	(2,233)	(4,173)
Balance at December 31, 2017	2,227	1,337	$3,564
Amounts to be recognized as revenue in the year ending:			
December 31, 2018	1,603	1,150	2,753
December 31, 2019	624	181	805
December 31, 2020 and thereafter		6	6
	$2,227	$ 1,337	$3,564

Other revenue of approximately $177 is related to accessories, repairs, and other miscellaneous charges that are recognized to revenue when sold and are not deferred.

Deferred charges relate only to the sale of equipment. Deferred charges activity for the year ended December 31, 2018 can be seen in the table below:

Balance at December 31, 2017	$1,374
Additions during the period	1,462
Recognized as cost of sales	(1,398)
Balance at December 31, 2018	$1,438
Amounts to be recognized as cost of sales in the year ending:	
December 31, 2019	$803
December 31, 2020	428 *
December 31, 2021 and thereafter	207 *
	$1,438

* Amounts included in Other Assets in the Company’s Consolidated Balance Sheets at December 31, 2018.

Data costs (COGS) for monitoring services of approximately $445 and the COGS for the miscellaneous revenue from sales of accessories and repairs of approximately $123 are expensed as incurred and are not deferred.

Deferred charges relate only to the sale of equipment. Deferred charges activity for the year ended December 31, 2017 can be seen in the table below:

Balance at December 31, 2016	$1,134
Additions during the period	1,672
Recognized as cost of sales	(1,432)
Balance at December 31, 2017	$1,374
Amounts to be recognized as cost of sales in the year ending:	
December 31, 2018	$999
December 31, 2019	375 *
December 31, 2020 and thereafter	
	$1,374

* Amounts included in Other Assets in the Company's Consolidated Balance Sheets at December 31, 2018.

Data costs (COGS) for monitoring services of approximately $364 and the COGS for the miscellaneous revenue from sales of accessories and repairs of approximately $107 are expensed as incurred and are not deferred.

The Company pays its employees sales commissions for sales of HW and for first sales of monitoring services (not for renewals). In accordance with Topic 606, Revenue from Contracts with Customers, of the FASB Accounting Standards Codification ("ASC 606"), the Company capitalizes as a contract asset the sales commissions on these sales. Contract assets associated with HW are amortized over the estimated life of the units which are currently estimated to be three years (two years up to December 31, 2017). Contract assets associated with monitoring services are amortized over the expected monitoring life including renewals. The contract asset balance at December 31, 2017 of $152 has been recorded as an adjustment to retained earnings in adopting ASC 606 under the modified retrospective method.

The following table provides a reconciliation of the Company's sales commissions contract assets for the year ended December 31, 2018:

	HW	Monitoring	Total
Balance at December 31, 2017	$125	$ 27	$152
Additions during the period	91	21	112
Amortization of sales commissions	(109)	(12)	(121)
Balance at December 31, 2018	$107	$ 36	$143

The capitalized sales commissions are included in Other Current Assets ($76) and Other Assets ($67) in the Company's Consolidated Balance Sheets at December 31, 2018.

F-36

NOTE 18—SUBSEQUENT EVENTS

In March 2019, OmniMetrix reinstated its Loan and Security Agreement providing OmniMetrix with access to accounts receivable formula-based financing of the lesser of 75% of eligible receivables or $1,000. Debt incurred under this financing arrangement bears interest at the greater of 6% and prime (5.5% at March 22, 2019) plus 1.5% per year. In addition, OmniMetrix is to pay a monthly service charge of 0.75% of the average aggregate principal amount outstanding for the prior month, for a current effective rate of interest on advances of 16%. OmniMetrix also agreed to continue to maintain a minimum loan balance of $150 in its line-of-credit with the lender for a minimum of two years beginning March 1, 2019.

In February 2019, the Company’s Board extended the expiration date of the 2006 Stock Incentive Plan until December 31, 2024.