

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

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

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 No

Indicate by check mark whether the registrant has submitted electronically and posted on its corporate Web site, if any, every Interactive Data File required to be submitted and posted 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 and post such files). Yes 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.

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

Large accelerated filer Accelerated filer Non-accelerated filer Smaller reporting company

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

As of last day of the second fiscal quarter of 2016, the aggregate market value of the registrant's common stock held by non-affiliates of the registrant was approximately \$5.3 million based on the closing sale price on that date as reported on the OTCQB marketplace. As of March 22, 2017 there were 29,367,019 shares of Common Stock, \$0.01 par value per share, outstanding.

DOCUMENTS INCORPORATED BY REFERENCE:

None.

TABLE OF CONTENTS

	Page
<u>PART I</u>	
Item 1. <u>BUSINESS</u>	3
Item 1A. <u>RISK FACTORS</u>	13
Item 1B. <u>UNRESOLVED STAFF COMMENTS</u>	25
Item 2. <u>PROPERTIES</u>	26
Item 3. <u>LEGAL PROCEEDINGS</u>	26
<u>PART II</u>	
Item 5. <u>MARKET FOR REGISTRANT’S COMMON EQUITY, RELATED STOCKHOLDER MATTERS AND ISSUER PURCHASES OF EQUITY SECURITIES</u>	27
Item 7. <u>MANAGEMENT’S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS</u>	28
Item 7A. <u>QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK</u>	42
Item 8. <u>FINANCIAL STATEMENTS AND SUPPLEMENTARY DATA</u>	42
Item 9. <u>CHANGES IN AND DISAGREEMENTS WITH ACCOUNTANTS ON ACCOUNTING AND FINANCIAL DISCLOSURE</u>	43
Item 9A. <u>CONTROLS AND PROCEDURES</u>	43
Item 9B. <u>OTHER INFORMATION</u>	43
<u>PART III</u>	
Item 10. <u>DIRECTORS, EXECUTIVE OFFICERS AND CORPORATE GOVERNANCE</u>	44
Item 11. <u>EXECUTIVE COMPENSATION</u>	47

Item 12.	<u>SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT AND RELATED STOCKHOLDER MATTERS</u>	58
Item 13.	<u>CERTAIN RELATIONSHIPS, RELATED TRANSACTIONS AND DIRECTOR INDEPENDENCE</u>	60
Item 14.	<u>PRINCIPAL ACCOUNTING FEES AND SERVICES</u>	61
<u>PART</u>		
<u>IV</u>		
Item 15.	<u>EXHIBITS AND FINANCIAL STATEMENT SCHEDULES</u>	62

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. *AquaShield™*, *AquaShield ER™*, *PointShield™*, *SeaShield™*, *NetShield™*, *SonoBarrier™*, *Blackfish 567™*, *Blackfish 911™*, *StructureShield™*, *StructureSense™*, *PerimeterShield™*, *PipeSafe™*, *PAUSS™* and *LightLine™* are trademarks of DSIT Solutions Ltd.

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. Each of our businesses is focused on helping its customers achieve greater productivity, reliability, security and efficiency.

We provide the following services and products:

Power Generation (“PG”) and Corrosion Protection (“CP”) monitoring. These products and services are provided by our OmniMetrix™, LLC (“OmniMetrix”) subsidiary. OmniMetrix’s PG activities provide wireless remote monitoring and control systems and services for critical assets as well as Internet of Things applications. Its CP activities provide for remote monitoring of cathodic protection systems on gas pipelines for gas utilities and pipeline companies.

Energy & Security Sonar Solutions. We provide 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 such as Hull Mounted Sonar systems (“HMS”) for surface ships and real-time embedded hardware and software development and production through our DSIT Solutions Ltd. (“DSIT”) equity investment (see below).

During 2016, each of our PG, CP and Energy & Security Sonar Solutions activities represented a reportable segment. In addition, our “Other” segment represents certain information technology (“IT”) activities (protocol management software for cancer patients and billing software) and outsourced consulting activities performed by DSIT that do not meet the quantitative thresholds and which may be combined for reporting under applicable accounting principles.

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

We continually evaluate opportunities related to our portfolio companies 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 sale of assets.

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, 2016			
	DSIT*	OmniMetrix	Acorn	Total Continuing Operations
Revenues	\$5,074	\$ 3,585	\$—	\$ 8,659
Cost of Sales	3,443	1,691	—	5,134
Gross profit	1,631	1,894	—	3,525
Gross profit margin	32 %	53 %		41 %
R& D expenses, net	469	458	—	927
Selling, general and administrative expenses	1,063	2,626	1,962	5,651
Operating income (loss)	\$99	\$ (1,190)	\$(1,962)	\$ (3,053)

* Acorn ceased consolidating the results of DSIT following the close of the DSIT Transaction on April 21, 2016. Results reported above are for the period from January 1, 2016 to April 21, 2016.

	Year ended December 31, 2015			
	DSIT	OmniMetrix	Acorn	Total Continuing Operations
Revenues	\$13,501	\$ 3,047	\$—	\$ 16,548
Cost of Sales	9,125	1,256	—	10,381
Gross profit	4,376	1,791	—	6,167
Gross profit margin	32 %	59 %		37 %
R& D expenses, net	1,191	514	—	1,705
Selling, general and administrative expenses	3,162	2,830	3,640	9,632
Operating income (loss)	\$23	\$ (1,553)	\$(3,640)	\$ (5,170)

OMNIMETRIX – POWER GENERATION MONITORING and CORROSION PROTECTION MONITORING

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, pumps, pumpjacks, light towers, turbines,

compressors, as well as other industrial equipment) as well as corrosion protection for the pipeline industry (gas utilities and pipeline companies). Acorn currently owns 80% of OmniMetrix with one of Acorn's 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 engines. 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.

Customers and Markets

At its core, the OmniMetrix PG product can remotely monitor and control any industrial engine application, which includes standby generators, compressors, 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 ecosystem, whereby multiple sensing and monitoring devices are aggregated into one simple dashboard for customers, many large companies, including Google, Comcast, Verizon, and AT&T 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 uniquely 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 solution. At this phase service organizations could be efficient, as well as proactive, in their operations. 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' PG monitors have been installed on generators from original equipment manufacturers ("OEMs") such as Caterpillar, Kohler, Generac, Cummins, MTU Energy and other generator manufacturers. Based on both published and industrial sources, we estimate that the U.S. emergency power generation marketplace consists of at least 100,000 new industrial generators and 200,000 new residential generators per year. These new machines join an installed base of approximately two million generators. While new generators provide more useful diagnostic data thanks to their computerized controls, older machines have an ever greater need for basic monitoring due to their aging systems. Some estimates place the potential world market for monitoring at over 10 million installed generators.

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 that 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 as a result. While some larger dealers embraced OmniMetrix's business model (a recurring revenue model), it did not universally resonate within the dealer marketplace and the rate of anticipated adoption (and thus sales of monitors and monitoring subscriptions) was far slower than anticipated. 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. Whether these efforts will prove to be successful cannot be determined.

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. We believe that we offer an excellent product, but feel that our pricing strategy needs to become more aggressive in order to compete effectively with both our monitoring and OEM competitors. Whether any new pricing and marketing programs will provide sufficient margins and otherwise be effective cannot be determined.

In 2016, no single customer of OmniMetrix provided more than 10% of its revenue. 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 2017.

Competition

OmniMetrix is a vertical market company, deeply focused on 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 other competitors simply cannot match.

There are two types of competitors in the PG marketplace:

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.

- (1) 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. Following its acquisition by Acorn in 2012, OmniMetrix began an aggressive push into lower price offerings, while providing significantly higher performance than the competition.

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.

- (2) 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 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 two issued patents and is evaluating the benefit of completing additional applications currently in process. 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 expected underutilization of leasehold improvements in these facilities. OmniMetrix is attempting to sub-lease a portion of these facilities. It cannot be determined at this time whether OmniMetrix will be successful in its attempts to sub-lease the facilities.

DSIT SOLUTIONS LTD.

On April 21, 2016, we closed on a transaction (the “DSIT Transaction”) initially entered into on January 28, 2016 for the sale of nearly 50% of our interest in our DSIT Solutions, Ltd. business to Rafael Advanced Defense Systems Ltd.,

a major Israeli defense company. Following the sale, we own approximately 41.2% of DSIT with DSIT management owning approximately 8.8% and Rafael owning 50%. Following the closing, we no longer consolidate the results of DSIT, but rather report the results of DSIT using the equity method of accounting.

Following the partnering with Rafael, DSIT is looking to utilize this relationship to:

Leverage Rafael's wide network for DSIT's sales and marketing team

Take advantage of synergies in technology to enable DSIT to expand its product offerings and participate in larger scale programs

Expand project activities by increasing its sales to Rafael

Support further development and marketing of perimeter security solutions

Improve DSIT banking relationships

DSIT is a globally-oriented business based in Israel with expertise in sonar and acoustics and development capabilities in the areas of real-time and embedded systems. Based on these capabilities, DSIT offers a full range of sonar and acoustic-related solutions to strategic energy installations as well as defense and homeland security markets. In addition, based on expertise in fields such as signal acquisition and processing applications, telemetry and navigation technologies and command, control and communication management (“C3”) DSIT provides wide ranging solutions to both governmental and commercial customers.

In 2012, DSIT began to leverage its acoustic signal processing capabilities for land seismic security applications and to extend its current offering by developing and integrating into its existing line of naval products, a new sensor based on advanced fiber-optic sensing technology. This new sensor will enable DSIT to grow into new business domains, including maritime and land-based perimeter security applications, pipeline leak detection and Structural Health Monitoring (SHM) of airborne vehicles such as Unmanned Aerial Vehicles (“UAVs”).

Products and Services

DSIT’s Energy & Security Sonar Solutions activities are focused on two areas – sonar and acoustic solutions for energy and security markets, and other real-time and embedded hardware and software development and production.

Energy & Security Sonar Solutions. DSIT’s energy & security sonar solutions include a full range of sonar and acoustic-related solutions to the strategic energy installation, defense and homeland security markets. These solutions include:

AquaShield™ Diver Detection Sonar (“DDS”) – DSIT has developed an innovative, cost-effective DDS system, the AquaShield™, that provides critical coastal and offshore protection of sites through long-range detection, tracking, classification and warning of unauthorized divers for rapid deployment and effective response. DSIT’s AquaShield™ DDS system is fully automatic and customizable, and requires human intervention only for final decision and response to the threat. The DDS sensors can be integrated with other sensors into a comprehensive command and control (“C&C”) system to provide a complete tactical picture both above and below the water for more intelligent evaluation of and effective response to threats.

PointShield™ Portable Diver Detection Sonar (“PDDS”) – The PointShield™ PDDS is a medium range portable diver detection sonar aimed at protecting vessels at anchorage and covers restricted areas such as water canals and intakes. The PointShield™ is a cost-effective system tailored to meet the needs of customers, whose main concern is portability and flexibility.

AquaShield-ER™ – The AquaShield-ER™ (extended range) DDS is similar to the AquaShield™ DDS except that it is specially designed to enable detection, tracking and classification of targets at much longer ranges thus enabling better response time when this is required for operational considerations.

BlackFish - Hull Mounted Sonar systems for surface ships – DSIT started its sonar activity 25 years ago building part of the HMS for the Israeli Navy SAAR 5 corvettes. Since then, a large portion of the sonar functions can be achieved using software which has reduced costs. In addition, DSIT has created sonar building blocks (see below) that enable it to offer to customers and shipyards a cost effective Hull Mounted Sonar with solid performance at an affordable price.

Mobile/Portable Acoustic Range (“MAR/PAR”) – The MAR and PAR accurately measures a submarine’s or surface vessel’s radiated noise; thus enabling navies and shipyards to monitor and control the radiated noise and to silence their submarines and ships. By continuously tracking the measured vessel and transmitting the data to a measurement ship, the MAR system enables real-time radiated noise processing, analysis and display. The system also includes a platform database for measurement results management and provides playback and post analysis capability.

Generic Sonar Simulator (“GSS”) – DSIT has developed a GSS for the rapid and comprehensive training of Anti-Submarine Warfare (“ASW”), submarine, and mine detection sonar operators. This advanced, low-cost, PC-based training simulator is designed for all levels of sonar operators from beginners to the most experienced, including ship ASW teams. The simulator includes all aspects of sonar operation, with an emphasis on training in weak target detection in the presence of noise and reverberation, torpedo detection, audio listening and classification. Based on this technology, DSIT expanded the application to include a full scale submarine tactical trainer.

Underwater Acoustic Signal Analysis system (“UASA”) – DSIT’s UASA system processes and analyzes all types of acoustic signals radiated by various sources and received by naval sonar systems (submarine, surface and air platforms, fixed bottom moored sonar systems, etc.).

Sonar Building Blocks – based on our sonar capabilities and development of the DDS, DSIT has developed a number of generic building blocks of sonar systems such as Signal Processing Systems and Sonar Power Amplifiers. Some customers designing and building their own sonar systems have purchased these building blocks from us. These elements are specifically tailored and optimized for sonar systems and have advantages over generic standard building blocks.

Fiber Optic Solutions

DSIT is developing solutions for the perimeter fiber optic security market. In 2013 and 2014, DSIT and Ramot, the technology transfer company of Tel-Aviv University, were jointly awarded a two-stage grant of approximately NIS 2.5 million (approximately \$654,000 at the December 31, 2016 exchange rate) representing a 50% participation in DSIT’s expenses, from MEIMAD (a collaborative program between the Israeli Ministry of Defense and the Office of the Chief Scientist (“OCS”) at the Ministry of Economy, to jointly promote new ideas and new technologies that can serve both commercial applications and military needs) for the joint development of a next generation fiber-optic based Perimeter Security System Interrogator. The interrogator is the optics/electronics heart of the fiber optic sensing system. Through December 31, 2016, DSIT has received approximately NIS 1.7 million (approximately \$440,000 at the December 31, 2016 exchange rate) of this grant. These grants are subject to royalties to Ramot for the longer of 15 years or until the last of the patents expire on 2% of sales up the first NIS 531,000 (approximately \$138,000 at the December 31, 2016 exchange rate) of royalties and 3% thereafter.

In 2014 and 2015, DSIT and Ramot, were jointly awarded another two-stage grant from MEIMAD. This grant is for a 24-month project for the joint development of a fiber-optic based SHM Interrogator. This SHM Interrogator, based on Tel-Aviv University’s patented technology, will allow the use of standard communication fiber optic wires for structural health monitoring at high speeds and in real-time. With this new interrogator, DSIT will be able to penetrate the SHM market for specialized applications such as structural health monitoring of airborne structures (aircraft wings and fuselage). The total amount of the grant is approximately NIS 2.4 million (approximately \$635,000 at the December 31, 2016 exchange rate) representing a 50% participation in DSIT’s expenses, and is conditioned on budget availability at the OCS and achieving the project’s first phase milestone (a working prototype of an Interrogator). Through December 31, 2016, DSIT has received approximately NIS 1.5 million (approximately \$385,000 at the December 31, 2016 exchange rate) of this grant. These grants are subject to royalties to Ramot for the longer of 15 years or until the last of the patents expire on 8% of sales up the first \$75,000 of royalties and 4% thereafter. There is a minimum annual \$15,000 year royalty payment beginning in 2018. Both this and the above grant are also subject to

royalties to the OCS at 3% for the first three years of sales; at 4% for the next three years of sales; and at 5% thereafter until the grant amount is repaid with interest.

With a prototype of the first Interrogator, based on Dynamic Optical Frequency Domain Interferometry already showing promising results in field trials, DSIT believes that this Interrogator when developed can be used for long range perimeter security applications and for underwater passive detection of divers, swimmers and boats.

Other Real-Time and Embedded Solutions

Additional areas of development and production in real-time and embedded hardware and software include:

Weapon/C&C Operating Consoles - DSIT specializes in Weapon/C&C Operating Consoles for unique naval and air applications, designed through synergistic interaction with the end-user. Weapon/C&C Consoles utilize Human-Machine Interface ("HMI") prototyping supported on a variety of platforms as an integral part of the HMI definition and refinement process. Weapon/C&C Console specific applications driven by HMI include signal processing and data fusion and tracking.

Computerized Vision Systems for the Semiconductor Industry - DSIT cooperates with global leaders of state-of-the-art semiconductor wafer inspection systems in developing cutting edge technologies to enable the semiconductor industry to detect defects in the manufacture of silicon wafers. DSIT develops and manufactures hardware and embedded software for computerized vision systems as a subcontractor. The activity is multi-disciplinary and includes digital and analog technologies, image processing and intricate logic development.

Modems, data links, navigation and telemetry systems – DSIT works with major defense companies in Israel such as Rafael and Israel Aerospace Industries Ltd. to develop modems, advanced wide-band data links and telemetry and navigation systems for airborne and missile systems. DSIT provides development and production services of hardware and embedded signal processing software with high quality control standards.

DSIT's other operations include IT activities (protocol management software for cancer patients and billing software) and outsourced consulting activities.

Customers and Markets

A significant amount of the world's oil output comes from offshore production. An enormous amount of capital investment has gone into creating this underwater energy infrastructure. This includes the oil platforms that drill, extract and temporarily store oil and gas, as well as the oil and gas wellheads, pipelines, single point mooring buoys and pumps required to transfer the product from its location to shore. While this infrastructure was built with the assumption that it would be able to weather natural disasters, much of this infrastructure comprises what is known in the military as "soft" targets from beneath the water that would not require much in the way of explosives to cause significant and perhaps catastrophic damage.

This vulnerability, combined with the development and proliferation of technologies such as mini-submarines which can submerge to depths of a few dozen feet making detection difficult, unmanned underwater vehicles, divers with underwater scooters, swimmer delivery vehicles as well as conventional scuba divers threaten the underwater economy with significant damage resulting from lost energy resources, damaged infrastructure and environmental degradation should an attack occur. DSIT looks to sell to potential customers in such areas that have significant underwater energy assets and infrastructure.

All of DSIT's operations (excluding product delivery, set-up and service) take place in Israel. A significant portion of DSIT's revenues are derived from outside of Israel (50% and 43% in 2016 (the entire year) and 2015, respectively). Such non-Israeli revenue is driven by the large project orders received such as the \$14.5 million order received in 2013 for the supply of an advanced underwater acoustic monitoring system to a navy in Asia and the \$15.4 million order received in 2015 for four Hull Mounted Sonar (HMS) systems and an Anti-Submarine Warfare (ASW) Trainer

for an undisclosed navy as well as a 2016 order for \$7.1 million for its Blackfish HMS systems. DSIT continues to invest considerable efforts to penetrate Asian, European and South American markets in order to broaden its geographic sales base with respect to its sonar technology solutions. DSIT has significant customer relationships with some of Israel's largest companies in its defense and electronics industries as well as relationships with some of the biggest Asian defense integrators. DSIT continues to explore cooperation opportunities in Asia.

In 2017, DSIT has expanded its sales and marketing team from three to five people and accordingly expects to expand its sales and marketing efforts for its entire portfolio of naval solutions including its Shield family of products - AquaShield™, AquaShield-ER™ (Extended Range), PointShield™ - and its Mobile Acoustic Range (MAR) as well as other naval and fiber-optic solutions. In some cases DSIT also offers a complete solution including above-water optical and radar sensors from third-party integrators into a complete C&C system. DSIT is currently in discussions with a number of energy, commercial and governmental customers seeing an increasing awareness of potential underwater threats to coastal and offshore critical infrastructure as well as vessels, canals and intakes. DSIT is also leveraging its capability to offer HMS to navies who are building new ships or upgrading existing vessels.

In 2017, DSIT also expects to begin recording sales of its fiber-optic solutions having received an initial order to provide an Eastern European country with 22 kilometers of border protection as part of a larger project through a defense integrator.

For the year ending December 31, 2016, four customers accounted for approximately 77% of DSIT's revenues (34%, 18%, 15% and 10%). The loss of any one or more of these customers and/or the lack of a replacement project upon the completion of projects to these customers could have a material adverse effect on DSIT's operations.

Competition

DSIT's naval solutions activities faces competition from several competitors, large and small, operating in worldwide markets such as Sonardyne International Ltd. and Atlas Elektronik (both based in the United Kingdom) and the Kongsberg group of companies (based in Norway) with substantially greater financial and marketing resources. DSIT believes that its wide range of experience and long-term relationships with large businesses as well as the strategic partnerships that it is developing will enable it to compete successfully and obtain future business. In product demonstrations to potential customers, DSIT's AquaShield™ has consistently achieved better performance regarding detection range and automatic classification than its competitors. DSIT has sold its AquaShield™ DDS system to the Israeli Navy following a comprehensive review and evaluation process in which the Navy investigated competing systems and selected those of DSIT. DSIT anticipates additional orders from the Israeli Navy for additional systems. DSIT also faces competition from other competitors such as Whitehead Sistemi Subacquei (WASS) in Italy and Ultra Electronics in the UK in the area of portable acoustic ranges and the Thales group of companies based in France in the area of HMS.

DSIT's fiber-optic solutions activities also faces competition from competitors, large and small, operating in worldwide markets (such as OptaSense (a QinetiQ company based in the United Kingdom) Future Fibre Technologies Limited (based in Australia) and Senstar Corporation (a Magal S³ company based in Canada)) with substantially greater history and financial and marketing resources. DSIT believes that its high-quality, low-cost product combined with the relationships it has developed with defense and homeland security integrators as well as the strong backing from Rafael will enable it to compete successfully and obtain future business.

Intellectual Property

DSIT rigorously attempts to protect its proprietary technologies, processes and other intellectual property.

DSIT's systems are heavily based on software implementing advanced acoustic signal processing algorithms. The foundation of the systems and DSIT's competitive edge lies in these algorithms. DSIT's strategy is to identify these key intellectual property elements developed in order to protect them in a timely and effective manner, and to continually use such intellectual property to our competitive advantage in the marketplace.

DSIT keeps the detailed description of these core algorithms as proprietary information and accordingly they are not disclosed to the public or to customers. DSIT uses contractual measures such as non-disclosure agreements and special contract terms to protect this intellectual and proprietary information. It is uncommon for companies such as DSIT to rely heavily on patents, as the patent itself may disclose critical information. Nonetheless, in certain cases the benefits of patent protection can outweigh the risks.

Under the framework of fiber-optic sensing Linear Infrastructure Monitoring technology development, DSIT has filed two Patent Cooperation Treaty patent applications and a one provisional patent. As DSIT works on this technology in cooperation and under an agreement with Tel Aviv University (TAU), after being granted these patents will be assigned to TAU and DSIT will get from TAU a worldwide, exclusive license to these patents.

Under the framework of fiber-optic SHM technology development, in addition to an already granted U.S Patent for which DSIT received a license from TAU, DSIT has filed a provisional patent. When this provisional patent is granted, DSIT will assign it to TAU and get a worldwide, exclusive license.

Under the fiber-optic Shape Sensing Technology, DSIT has filed a single U.S patent as well as provisional patents covering applications all in the area of fiber-optic Shape Sensing.

A significant portion of our know-how is protected as commercial secrets and supported through agreements with our employees, suppliers, partners and customers.

Employees

At December 31, 2016, DSIT employed a total 82 full-time equivalent employees all of which were in Israel and of which 65 were in production, engineering and technical support, three were in marketing and sales and 14 were in management, administration and finance.

Facilities

DSIT's activities are conducted in approximately 23,000 square feet of space in the Tel Aviv metropolitan area under a lease that expires in January 2019. Such space includes an additional 2,000 square feet of space recently taken for additional storage and production. The current annual rent is approximately \$324,000. DSIT believes that its premises are sufficient to handle any expected near-term growth.

GRIDSENSE

On April 21, 2016, we announced our decision to cease operations of our GridSense subsidiary and initiate the liquidation of the GridSense assets. As a result of this decision, GridSense is being reported as a discontinued operation effective with our first quarter 2016 report. On July 12, 2016, Acorn Energy, Inc. and GridSense sold the GridSense assets to Franklin Fueling Systems, Inc., a wholly-owned subsidiary of Franklin Electric Co., Inc. for a gross sales price of \$1.0 million of which \$100,000 was set aside as an indemnity escrow.

GridSense is 100% owned by Acorn, and until the cessation of its operations, developed and marketed remote monitoring systems to electric utilities and industrial facilities worldwide.

BACKLOG

As of December 31, 2016, our backlog of work to be completed and the amounts expected to be completed in 2017 were as follows (amounts in millions of U.S. dollars):

	Backlog at December 31, 2016	Amount expected to be completed in 2017
DSIT Solutions *	\$ 18.6	\$ 9.4
OmniMetrix (primarily deferred revenue)	2.8	2.1
Total	\$ 21.4	\$ 11.5

* Following the closing of the DSIT Transaction, we no longer consolidate the results of DSIT, but rather report on our investment in DSIT on the equity method.

RESEARCH AND DEVELOPMENT EXPENSE, NET

Research and development expense recorded for the years ended December 31 2016 and 2015 for each of our consolidated subsidiaries in continuing operations is as follows (amounts in thousands of U.S. dollars):

	Years ended December 31,	
	2016	2015
DSIT Solutions *	\$469	\$1,191
OmniMetrix	458	514
Total	\$927	\$1,705

Research and development expense recorded is net of participation by third parties in the research and development costs as well as credits arising from qualifying research and experimental development expenditures.

* Acorn ceased consolidating the results of DSIT following the close of the DSIT Transaction on April 21, 2016. Results reported above are for the period ending April 21, 2016.

EMPLOYEES

At December 31, 2016, we employed a total of 21 employees – all of which were full-time employees employed by OmniMetrix in the U.S. Our CEO is hired as a consultant to us and our CFO is an employee of DSIT, a portion of whose salary is allocated to us.

Twelve of OmniMetrix's 21 employees are engaged in production, engineering and technical support, six in marketing and sales and three in management, administration and finance. 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 20 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 operating entities and corporate overhead, and have used significant amounts of cash to fund our operating activities over the years. In 2016 and 2015, we had operating losses of \$3.1 million and \$5.2 million, respectively plus losses from discontinued operations of \$0.3 million and \$5.1 million, respectively. Cash used in operating activities of continuing operations in 2016 was \$3.6 million while in 2015 operating activities of continuing operations provided \$2.2 million. An additional \$1.0 million and \$3.2 million were used in the operating activities of discontinued operations in 2016 and 2015.

As of December 31, 2016, we had less than \$100,000 of non-escrow corporate cash and cash equivalents and did not have sufficient cash flow for the next twelve months. In February 2017, we borrowed \$900,000 from three of our directors and received a commitment from a director that would allow us to borrow up to an additional \$1.0 million on or after July 7, 2017 under certain conditions (see Recent Developments). Such cash together with the expected October 2017 receipt of escrowed funds from the DSIT Transaction and reduced cash need from OmniMetrix based on their expected continued growth, is expected to finance our operations through at least the first quarter of 2018. The abovementioned director loans are due to be repaid at the earlier of April 30, 2018 or upon the sale of our remaining 41.2% interest DSIT which we are currently pursuing.

Based on the above, we have sufficient cash to finance our operations for the next year. However, we may need to seek additional sources of funding if both of the following were to occur: (i) a failure by OmniMetrix to grow at the rate anticipated that necessitates additional funds for their operations, and (ii) the receipt of the escrowed funds from the DSIT sale is less than we anticipate. Additional sources of funding may include additional loans from related and/or non-related parties, a sale of our DSIT investment, a sale, partial sale 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, Benny Sela, Walter Czarnecki and Michael Barth. 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 of these employees. 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 approved for quotation 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 makers 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.

Our awards of stock options to employees may not have their intended effect.

A portion of our total compensation program for our executive officers and key personnel has historically included the award of options to buy our common stock or the common stock of our subsidiaries. If the price of our common stock performs poorly, such performance may adversely affect our ability to retain or attract critical personnel. In addition, any changes made to our stock option policies, or to any other of our compensation practices, which are made necessary by governmental regulations or competitive pressures could affect our ability to retain and motivate existing personnel and recruit new personnel.

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 for our subsidiaries. Although we do not presently foresee making such acquisitions in the near term unless they support our existing businesses, 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.

Our strategy is to continue to integrate any newly acquired companies and grow the businesses of all of our companies. 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.

In order to grow, one or more of our companies may decide to pursue growth through acquisitions, although we do not currently plan any significant acquisitions. Any significant acquisition by one or more of our operating companies 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.

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. The conflict minerals reporting requirement discussed above is a direct consequence of our public status.

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, 2016 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.

Our operating companies 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. 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.

Third parties may claim that we are infringing their intellectual property, and we could suffer significant litigation or licensing expenses or be prevented from selling products and services if these claims are successful. We also may incur significant expenses in affirmatively protecting our intellectual property rights.

In recent years, there has been significant litigation involving patents and other intellectual property rights in many technology-related industries and we believe that the industries in which certain of our subsidiaries operate have a significant amount of patent activity. Third parties may claim that the technology or intellectual property that we incorporate into or use to develop, manufacture or provide our current and future products, systems or services infringe, induce or contribute to the infringement of their intellectual property rights, and we may be found to infringe, induce or contribute to the infringement of those intellectual property rights and may be required to obtain a license to use those rights. We may also be required to engage in costly efforts to design our products, systems and services around the intellectual property rights of others or incur additional marketing costs if we are prevented from using existing product names. The intellectual property rights of others may cover some of our technology, products, systems and services. In addition, the scope and validity of any particular third party patent may be subject to significant uncertainty.

Litigation regarding patents or other intellectual property rights is costly and time consuming, and could divert the attention of our management and key personnel from our business operations. The complexity of the technology involved and the uncertainty of intellectual property litigation increase these risks. Claims of intellectual property infringement might also require us to enter into costly royalty or license agreements or to indemnify our customers. However, we may not be able to obtain royalty or license agreements on terms acceptable to us or at all. Any inability on our part to obtain needed licenses could delay or prevent the development, manufacture and sale of our products, systems or services. We may also be subject to significant damages or injunctions against development, manufacture and sale of our products, systems or services. We also may be required to incur significant time and expense in pursuing claims against companies we believe are infringing or have misappropriated our intellectual property rights.

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 both as a corporate risk management strategy and to satisfy the requirements of many of our contracts. 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.

The timing and amount of revenue generated both from new customer orders and backlog fulfillment are subject to substantial volatility

Recognition of revenue from sales to certain customers can be subject to delays beyond our control, such as timing of the receipt of component parts, change orders issued by the customer and delays in customers' scheduled installation dates, all of which we generally accommodate at no cost to the customer as part of our marketing efforts to them for repeat business.

Concentrations 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, cash equivalents and escrow deposits were deposited primarily with U.S. banks and brokerage firms and amounted to \$801,000 at December 31, 2016. The Company does not believe there is significant risk of non-performance by these counterparties. Approximately 28% of the accounts receivable at December 31, 2016 was due from one customer who pay their 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.

RISKS RELATED TO OMNIMETRIX

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

OmniMetrix has generated losses since our acquisition in 2012 including losses of \$1.2 million in 2016 and \$1.6 million in 2015. While OmniMetrix has reduced its losses and its cash needs from us, particularly in the latter half of 2016 (OmniMetrix has not needed funding from us since September 2016), 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 invested approximately \$14.0 million and through March 22, 2017 have lent \$2,362,000 net of repayments (of which \$618,000 (net of repayments) was in 2016) to OmniMetrix. OmniMetrix has reduced its borrowings from Acorn and has not borrowed from Acorn since September 2016, but will continue to need working capital in 2017 to support its growth and working capital needs.

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 \$500,000 (such financing was initially limited to \$300,000 and subsequently increased to \$500,000). 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 bears 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 \$150,000 in its line-of-credit with the lender for a minimum of one year beginning October 1, 2016.

We have no assurance that this financing arrangement will provide sufficient liquidity for OmniMetrix's working capital needs in 2017. 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 cathodic protection systems. OmniMetrix has no ability to control the rate at which new generators or cathodic protection systems are acquired. When 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 the 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 can 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 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 DSIT SOLUTIONS

Failure to accurately forecast costs of fixed-priced contracts could reduce DSIT's margins.

When working on a fixed-price basis, DSIT undertakes to deliver software or integrated hardware/software solutions to a customer's specifications or requirements for a particular project. The profits from these projects are primarily determined by DSIT's success in correctly estimating and thereafter controlling project costs. Costs may in fact vary substantially as a result of various factors, including underestimating costs, difficulties with new technologies and economic and other changes that may occur during the term of the contract. If, for any reason, DSIT's costs are substantially higher than expected, it may incur losses on fixed-price contracts.

DSIT recognizes revenue on contracts using the percentage-of-completion method of accounting. Under the percentage-of-completion method of accounting, it records revenue as work on the contract progresses. The cumulative amount of revenues recorded on a contract at a specific point in time is that percentage of total estimated revenues that man-months incurred to date bear to estimated man-months for the entire project. Accordingly, contract revenues and total cost estimates are reviewed and revised as the work progresses. Adjustments are reflected in contract revenues in the period when such estimates are revised. Estimates are based on management's reasonable assumptions and experience, but are only estimates. Variation of actual results from assumptions on an unusually large project or on a number of average size projects could be material. DSIT is also required to immediately recognize the full amount of the estimated loss on a contract when estimates indicate such a loss. Such adjustments and accrued losses could result in reduced profitability, which would negatively impact its cash flow from operations.

Conditions in Israel may affect DSIT's operations.

Political, economic and military conditions in Israel directly affect our operations. Since the establishment of the State of Israel, a number of armed conflicts have taken place between Israel and its Arab neighbors. An ongoing state of hostility, varying in degree and intensity has led to security and economic problems for Israel. For a number of years there have been continuing hostilities between Israel and the Palestinians including with the Islamic movement Hamas in the Gaza Strip, which have adversely affected the peace process and at times have negatively influenced Israel's economy as well as its relationship with several other countries. Israel also faces threats from Hezbollah militants in Lebanon, from the government of Iran and other potential threats from neighboring countries, some of whom have recently undergone or are undergoing significant political changes, such as Egypt and Syria. In recent years there has also been a change in the relations between Israel and Turkey. These political, economic and military conditions in Israel could have a material adverse effect on our business, financial condition, results of operations and future growth. Furthermore, the mandatory military commitments of some DSIT personnel may temporarily impact our ability to produce our products on a timely basis if such personnel are called into service in connection with hostilities or otherwise.

Exchange rate fluctuations could increase the cost of DSIT's operations.

A majority of DSIT's sales are based on contracts or orders which are in U.S dollars or are in New Israeli Shekels ("NIS") linked to the U.S. dollar. At the same time, most of DSIT's expenses are denominated in NIS (primarily labor costs) and are not linked to any foreign currency. The net effect of a devaluation of the U.S. dollar relative to the NIS is that DSIT's costs in dollar terms increases more than its revenues. At times, DSIT enters into forward contracts to try to mitigate its exposures to exchange rate fluctuations; however, no assurance can be provided that such controls will be implemented successfully. In 2016 the NIS strengthened in relation to the U.S. dollar by 1.5%.

DSIT is substantially dependent on a small number of customers and the loss of one or more of these customers may cause revenue and cash flow to decline.

In 2016, approximately 77% of DSIT's total revenue was concentrated in four customers. These customers are expected to continue to make up a significant portion of DSIT's revenue and cash flow in 2017. While DSIT does expect future follow on orders from each of these customers, the timing and amounts cannot be predicted. A significant reduction of future orders or delay in milestone payments from any of these customers could have a material adverse effect on the performance of DSIT.

Reduction in Israeli government spending or changes in priorities for defense products may adversely affect our earnings.

The Israeli Ministry of Defense is a significant customer of DSIT. The Israeli government may reduce its expenditures for defense items or change its defense priorities in the coming years. In addition, the Israeli defense budget may be adversely affected by any reductions in U.S. foreign military assistance. There is no assurance that DSIT's programs will not be affected in the future if there is a reduction in Israeli government defense spending for our programs or a change in priorities to products other than those of DSIT.

Political relations could limit our ability to sell or buy internationally.

DSIT could be adversely affected by the interruption or reduction of trade between Israel and its trading partners. Some countries, companies and organizations continue to participate in a boycott of Israeli firms and others doing business with Israel or with Israeli companies. Foreign government defense export policies towards Israel could also make it more difficult for us to obtain the export authorizations necessary for our activities. Also, over the past several years there have been calls in Europe and elsewhere to reduce trade with Israel. There can be no assurance that restrictive laws, policies or practices directed towards Israel or Israeli businesses will not have an adverse impact on DSIT's business.

DSIT is a project-based business which is dependent on large orders from customers who typically have long acquisition cycles.

DSIT is a project-based business which is dependent on large orders from customers who typically have long acquisition cycles. DSIT must constantly replace its pipeline of opportunities given what typically averages to at least an 18-month sales cycle.

DSIT is dependent on meeting milestones to provide cash flow for its operations.

DSIT's operations place a great reliance on it meeting project milestones in order to generate cash flow to finance its operations. Should DSIT encounter difficulties in meeting significant project milestones, resulting cash flow difficulties could have a material adverse effect on its operations.

DSIT must at times provide significant guarantees in order to secure projects. These guarantees are often collateralized by restricted deposits.

Some of the projects DSIT performs require significant performance and/or bank guarantees. At December 31, 2016, DSIT had approximately \$7.3 million of performance and bank guarantees outstanding. In addition, DSIT had on deposit at two Israeli banks approximately \$3.3 million collateralizing some of these guarantees. These deposits are restricted and, accordingly, DSIT cannot use these funds for operations until the guarantees which are being collateralized are released. At times, this can create cash flow difficulties which could have a material adverse effect on its operations.

If DSIT is unable to keep pace with rapid technological change, its results of operations, financial condition and cash flows may suffer.

Some of DSIT's solutions are characterized by rapidly changing technologies and industry standards and technological obsolescence. DSIT's competitiveness and future success depends on its ability to keep pace with changing technologies and industry standards on a timely and cost-effective basis. A fundamental shift in technologies could have a material adverse effect on its competitive position. A failure to react to changes in existing technologies could materially delay DSIT's development of new products, which could result in technological obsolescence, decreased revenues, and/or a loss of market share to competitors. To the extent that DSIT fails to keep pace with technological change, its revenues and financial condition could be materially adversely affected.

DSIT is dependent on a number of suppliers who provide it with components for some of its products.

A number of DSIT's suppliers provide it with major components for some of its Naval Solutions products. Some of these components are long-lead items. If for some reason, the suppliers cannot provide DSIT with the component when it is needed and DSIT cannot easily find substitute suppliers on similar terms, DSIT may have increased costs and/or delays in delivering a product to a customer and incur penalties and lose customer confidence. In addition, project delays can also slow down revenue recognition and our financial condition could be materially adversely affected. While DSIT is constantly attempting to develop secondary suppliers for these components, it can provide no assurance that it will be successful in doing so on acceptable terms.

DSIT 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 DSIT's current and potential competitors have longer operating histories, significantly greater resources and broader name recognition than it does. As a result, these competitors may have greater credibility with DSIT'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.

DSIT has committed resources to enter the fiber optic security arena.

DSIT has in prior years and is currently investing significant amounts of capital in creating the infrastructure to support its entrance into the fiber optic security market.

In September 2013, DSIT and Ramot, the technology transfer company of Tel-Aviv University, were jointly awarded a grant from MEIMAD. MEIMAD provides funding money for projects involving joint innovation and development between Israeli industrial companies and universities. This grant is for a two stage project for the joint development of a next generation fiber-optic based Perimeter Security System Interrogator. The total amount of the grant is approximately NIS 2.5 million (approximately \$654,000 at the December 31, 2016 exchange rate) representing a 50% participation in DSIT's expenses.

In mid-2014, DSIT and Ramot were jointly awarded another grant from MEIMAD. This grant is for another two stage project for the development of a fiber optic sensing system to be used in structural health monitoring of airborne structures (such as planes and UAV's). The total amount of the grant is approximately NIS 2.4 million (approximately \$635,000 at the December 31, 2016 exchange rate) representing a 50% participation in DSIT's expenses.

Both grants are conditioned on budget availability at the Office of the Chief Scientist ("OCS") in the Ministry of the Economy in Israel and achieving the project's first milestones. If OCS funds are unavailable and/or the projects' milestones are not met on a timely basis, DSIT may not be able to access some or all of the grant funding.

Sales of our products to companies in the energy industry and defense departments may be impacted by the continued low price of oil and reduced defense budgets.

Depressed oil prices have led to reduced spending by oil and other companies other companies in the energy industry. In addition, defense departments worldwide have generally been reducing expenditures. A continuation of low oil prices and reduced defense spending could negatively impact on our ability to receive orders from companies in the energy industry and defense departments who in the past have been amongst some of our significant customers. While DSIT is constantly striving to expand its customer base, there can be no assurance that DSIT will be successful in doing so.

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 2016, our common stock traded at prices as low as \$0.07 and as high as \$0.49 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, including the continued volatility in the energy industry and the general economy;

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.

In addition, the market prices of securities of energy related companies have been and remain volatile. This volatility has significantly affected the market prices of securities of many companies for reasons frequently unrelated to the operating performance of the specific companies.

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, 2017, 29,367,019 shares of our common stock were issued and outstanding. As of that date we had 2,654,423 warrants outstanding and exercisable with a weighted average exercise price of \$1.46 and 1,405,404 options outstanding and exercisable with a weighted average exercise price of \$3.79 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, 2017, 109,585 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 April 2016, we sold of a portion of our interest in DSIT and received gross proceeds of approximately \$4.9 million which was used to repay our Leap Tide debt and provide working capital for us and OmniMetrix. In February 2017, we borrowed \$900,000 from three of our directors and received a commitment from a director that would allow us to borrow up to an additional \$1.0 million on or after July 7, 2017 (see Recent Developments) under certain conditions. Such cash together with the expected October 2017 receipt of escrowed funds from the DSIT Transaction and reduced cash need from OmniMetrix based on their expected continued growth is expected to finance our operations through at least the first quarter of 2018. The abovementioned director loans are due to be repaid at the earlier of April 30, 2018 or upon the sale of our remaining 41.2% interest DSIT which we are currently pursuing. Despite all 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 will incur additional dilution in the value of their shares.

ITEM 1B. UNRESOLVED STAFF COMMENTS

None.

25

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 rents ranging from approximately \$104,000 in 2017 to \$109,000 in 2019. OmniMetrix is currently utilizing only a portion of these leased facilities and has taken an impairment charge in connection with its restructuring in 2013 with respect to expected underutilization of leasehold improvements in these facilities. OmniMetrix is attempting to sub-lease a portion of these facilities. It cannot be determined at this time whether OmniMetrix will be successful in its attempts to sub-lease the facilities.

ITEM 3. LEGAL PROCEEDINGS

None.

26

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 currently traded under the symbol "ACFN" on the OTCQB marketplace, where it began trading on July 24, 2015. Prior to July 24, 2015, our common stock was traded on NASDAQ. The following table sets forth, for the periods indicated, the high and low reported sales prices per share of our common stock on the NASDAQ Global Market (January 1, 2015 through May 7, 2015) and the NASDAQ Capital Market (May 8, 2015 through July 23, 2015), and the high and low bid prices on the OTCQB marketplace (beginning on July 24, 2015).

	High	Low
2015:		
First Quarter	\$0.79	0.25
Second Quarter	0.69	0.35
Third Quarter	0.46	0.10
Fourth Quarter	0.23	0.09
2016:		
First Quarter	\$0.20	\$0.07
Second Quarter	0.49	0.10
Third Quarter	0.25	0.14
Fourth Quarter	0.22	0.14

As of March 22, 2017, the last reported sales price of our common stock on the OTCQB marketplace was \$0.32, there were 96 record holders of our common stock and we estimate that there were approximately 4,300 beneficial owners of our common stock.

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

RECENT DEVELOPMENTS

Director Loans

On February 16, 2017, we secured commitments for \$1.9 million in funding in the form of loans from members of our Board of Directors, including \$900,000 immediately funded. We expect to repay the loans, which mature at the end of April 2018 and accrue interest at the rate of 12.5% (16.5% after February 15, 2018) per annum, payable at maturity, with proceeds from a future sale of our 41.2% ownership in its DSIT Solutions Ltd.

In addition to the \$900,000 already funded, a director agreed to loan up to an additional \$1,000,000 to us on or after July 7, 2017 on substantially identical terms as the currently funded loans. The amount of any such additional financing would be reduced to the extent that other additional liquidity is provided to us in the form of loans from the directors or other lenders with a maturity date no earlier than April 2018, or from any net proceeds from the sale of any of our DSIT shares. We are required to apply the net proceeds from the sale of any of our DSIT shares in repayment of the principal of the directors' loans and all interest accrued.

Extension of CEO Consulting Agreement

On February 21, 2017, we entered into a new consulting agreement effective January 8, 2017 between Acorn and Jan Loeb extending the arrangements for compensation of Mr. Loeb for his services as President and CEO of the Company. The previous agreement expired on January 7, 2017. Pursuant to the new consulting agreement, Mr. Loeb will continue to receive cash compensation of \$17,000 per month. Mr. Loeb also received a grant of options to purchase 35,000 shares of Acorn 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 the new agreement was entered into). These options vest and become exercisable on the same terms as the stock options granted to directors of Acorn, 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 Acorn. The new consulting agreement expires on January 7, 2018 unless extended.

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 through our OmniMetrix subsidiary:

Power Generation (“PG”) monitoring (formerly known as Machine-to-Machine Critical Asset Monitoring & Control). The PG segment provides wireless remote monitoring and control systems and services for critical assets as well as Internet of Things applications.

Corrosion Protection (“CP”) monitoring. The CP segment provides for remote monitoring of cathodic protection systems on gas pipelines for gas utilities and pipeline companies.

In addition, up to the closing of the DSIT Transaction, we reported activities in the Energy & Security Sonar Solutions segment. This segment, whose activities were performed by 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 acoustic systems and real-time embedded hardware and software development and production. “Other” operations include certain IT activities (protocol management software for cancer patients and billing software) and outsourced consulting activities performed by the Company’s DSIT subsidiary that did not meet the quantitative thresholds under applicable accounting principles.

Following the closing of the DSIT Transaction, the Company is no longer consolidating the results of DSIT, but rather is reporting on its investment in DSIT on the equity method. Accordingly, effective April 21, 2016, the Company no longer consolidates the results of DSIT's Energy & Security Sonar Solutions segment or the activities of its "Other" segment.

The following analysis should be read together with the segment information provided in Note 20 to our Consolidated Financial Statements included in this report.

OmniMetrix

Following the emergence of machine-to-machine and Internet of Things applications whereby companies aggregate multiple sensors and monitors into a simplified dashboard for customers, OmniMetrix believes it can play a key role in this new economic ecosystem. In addition, OmniMetrix sees a rapidly growing need for backup power infrastructure to secure critical military and government assets against emergency events including terrorist attacks, natural disasters, and cybersecurity threats. As residential and industrial standby generators as well as turbines, compressors, pumps, pumpjacks, light towers and other industrial equipment that 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 to be a competitive participant in this new market.

OmniMetrix has two divisions: Power Generation ("PG") and Corrosion Protection ("CP"). In 2016, OmniMetrix recorded revenue of \$3,585,000 (\$2,903,000 in its PG activities and \$682,000 in its CP activities) as compared to revenue of \$3,047,000 recorded in 2015 (\$2,513,000 in its PG activities and \$534,000 in its CP activities). Increased revenue in 2016 was driven by hardware revenue which increased from \$1,022,000 in 2015 to \$1,689,000 in 2016. The increase in hardware revenue was partially offset by a decrease in monitoring revenue which dropped from \$2,025,000 in 2015 to \$1,896,000 in 2016. The decrease is the result of a one-time adjustment of \$130,000 made in the second quarter of 2016 with respect to a previous understatement of deferred revenue. Fourth quarter 2016 revenue of \$1,041,000 reflects an increase of 16% to as compared to fourth quarter 2015 revenue of \$898,000 and an increase of 11% from third quarter 2016 revenue of \$942,000.

Gross profit during 2016 was approximately \$1,894,000 reflecting a gross margin of 53% on revenues compared with a gross profit of \$1,791,000 reflecting a 59% gross margin in 2015. The increased gross profit in 2016 was entirely due to increased revenue. The decrease in the gross margin was due in part to the one-time adjustment in the second quarter noted above as well as to increased monitoring costs. Despite this, gross margins on monitoring revenue remained strong at 84% during 2016 as compared to 86% in 2015. As monitoring revenue grows, we expect OmniMetrix's margins to increase in the long term as fixed costs are spread over a greater revenue base and the deferred costs associated with the provision of units to certain customers below cost are fully amortized.

During 2016, OmniMetrix recorded approximately \$458,000 of R&D expense as compared to \$514,000 in 2015. The decrease in R&D expense in 2016 was due to staff changes and product certification costs incurred in 2015. We expect R&D costs to approximate their current levels as we continue to work on certain initiatives to redesign products to reduce their costs in order to increase our future margins.

During 2016, OmniMetrix recorded approximately \$2,626,000 of SG&A costs. Such costs were below 2015 SG&A costs of \$2,830,000 (a decrease of \$204,000 or 7%). The decrease in SG&A expense was due to decreased salary costs associated with changes in OmniMetrix personnel. Fourth quarter 2016 SG&A costs of \$689,000 were \$45,000 less than that of fourth quarter 2015 costs of \$734,000 and was \$40,000 more than third quarter 2016's G&A costs of \$649,000. We anticipate that our SG&A costs in 2017 will remain roughly at the levels in the third and fourth quarters of 2016.

On October 16, 2015, one of the Company's directors acquired a 10% interest in Acorn's 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, 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 \$500,000 and currently owns a 20% interest in Holdings.

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 Common Stock. The dividend is payable in cash or the form of additional shares of OmniMetrix Preferred Stock at the election of the holder of the Preferred Stock. Through December 31, 2016, a dividend payable of \$115,000 was recorded with respect to the OmniMetrix Preferred Stock. On December 31, 2016, the director agreed to treat the \$115,000 of accrued dividends (and may agree to treat future accrued dividends) as a loan to OmniMetrix which bear interest at 8% per year. All amounts due (principal and interest) are due the later of April 30, 2018 or 90 days following the advance of a new loan (quarterly dividend accrual). In December 2016, the director provided OmniMetrix with a \$50,000 loan under the same terms as the abovementioned accrued dividends.

The OmniMetrix Preferred Stock may convert at the option of the holder of the OmniMetrix Preferred Stock on a one-for-one basis into 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.

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 \$500,000 (such financing was initially limited to \$300,000 and subsequently increased to \$500,000). 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 bears 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 \$150,000 in its line-of-credit with the lender for a minimum of one year beginning October 1, 2016.

During 2016, Acorn lent OmniMetrix a total of \$790,000 and OmniMetrix repaid loans of \$172,000, in part from borrowings under the abovementioned Loan and Security Agreement. OmniMetrix will continue to need working capital in 2017 to support its growth and working capital needs.

We have no assurance that this financing arrangement will provide sufficient liquidity for OmniMetrix's working capital needs in 2017 or that it will be extended beyond September 30, 2017. 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.

DSIT Solutions

On April 21, 2016, we closed on the sale of nearly 50% of our interest in our DSIT Solutions, Ltd. business to Rafael Advanced Defense Systems Ltd. As DSIT has grown, we came to recognize the value of it having a strong strategic partner with the size, resources and scope of Rafael's capabilities. We believe this partnership will accelerate DSIT's growth by leveraging Rafael's technological capabilities and reputation as well as its impressive global sales reach in support of DSIT's industry-leading sonar technology and its fiber-optic based sensing solutions. We believe that DSIT's global reach and sales potential is significantly enhanced through our partnership with Rafael. Following the closing of the DSIT Transaction, we no longer consolidate the results of DSIT, but rather are reporting on our investment in DSIT on the equity method recognizing our share (approximately 41.2%) of DSIT's net income or loss.

In June, DSIT announced that it received a new \$7.1 million order for its Blackfish Hull Mounted Sonar (HMS) systems to be delivered over a two-year period. The Blackfish is an advanced, medium-frequency Hull Mounted Sonar designed for littoral (near shore) as well as deep water Anti-Submarine Warfare (ASW) operations.

DSIT revenue of \$16.9 million in 2016 (\$5.1 million through the closing of the DSIT Transaction) was \$3.4 million or 25% above its revenue for 2015 (\$13.5 million). Fourth quarter 2016 revenue (\$5.0 million) increased 45% (\$1.5 million) over fourth quarter 2015 revenue and increased approximately \$1.0 million or 24% as compared to third quarter 2016 revenue. Gross profit, operating and net income all improved for DSIT in 2016.

The increase in revenue in 2016 as compared to 2015 is wholly attributable to increased revenue in DSIT's Energy & Sonar Security Solutions activities (\$3.4 million). Such increase was primarily due to revenue recorded with respect to DSIT's \$15.4 million project received in the first quarter of 2015 for Hull Mounted Sonar (HMS) systems and the \$7.1 million ASW project for an unnamed navy noted above. DSIT's IT and consulting revenue in 2016 decreased slightly (less than \$50,000 or approximately 3%).

DSIT's gross profit increased 28% from \$4.4 million in 2015 to \$5.6 million in 2016. The increase in gross profit was almost entirely attributable to the increase in revenue as DSIT's gross margin increased from 32.4% in 2015 to 33.3% in 2016. DSIT's fourth quarter gross profit of \$2.0 million reflected an increase of \$1.1 million as compared to fourth quarter of 2015's gross profit of \$0.9 million and an increase of \$0.9 million (76%) as compared to the third quarter of 2016. The fourth quarter increase in gross profit was due to both increased revenue and increased gross margins in the quarter as compared to the parallel and previous quarter.

The increase in fourth quarter gross margins as compared to both the fourth quarter of 2015 and the third quarter of 2016 was due to receipt of a high margin project during the quarter and favorable adjustments with respect to the total expected costs of certain Naval projects.

During 2016, DSIT recorded \$1.1 million of net R&D expense as compared to \$1.2 million in 2015. R&D expense in 2016 was net of participation from MEIMAD (\$310,000) for fiber-optic activities and from the Israeli Ministry of Defense (\$95,000) for naval activities. R&D expense in 2015 was net of participation from MEIMAD (\$443,000) for fiber-optic activities and from the Israeli Ministry of Defense (\$73,000) for naval activities. DSIT does not expect a material change in net annual R&D expense for 2017.

During 2016, DSIT recorded \$3.8 million of SG&A expense, 20% above the \$3.2 million recorded in 2015. The increase from 2015 was due to certain one-time costs associated with the sale to Rafael as well as a large (\$431,000) bad debt write-off recorded in the fourth quarter.

At December 31, 2015, DSIT had a backlog of approximately \$20.6 million. During 2016, DSIT received new orders totaling approximately \$13.7 million, and at the end of December 2016 had a backlog of approximately \$18.6 million.

DSIT net income for 2016 was \$716,000 of which \$654,000 was recorded during the period from the closing of the DSIT Transaction to December 31, 2016. As noted above, we no longer consolidate the results of DSIT. After the closing of the DSIT Transaction, we account for our investment in DSIT under the equity method. The initial balance of our investment in DSIT (approximately \$5.4 million) was determined based on our 41.2% holding in DSIT post-closing and the \$13.1 million value attributed to DSIT in the DSIT Transaction. In the period following the Closing Date, we recorded \$268,000 as our 41.2% share of DSIT's net income for the period from the Closing Date to December 31, 2016 (\$166,000 in the fourth quarter of 2016).

GridSense

On April 21, 2016, we announced our decision to cease operations of our GridSense subsidiary and initiate the liquidation of the GridSense assets. As a result of this decision, GridSense is being reported as a discontinued operation.

On July 12, 2016, Acorn Energy, Inc. and GridSense sold the GridSense assets to Franklin Fueling Systems, Inc., a wholly-owned subsidiary of Franklin Electric Co., Inc. for a gross sales price of \$1.0 million of which \$100,000 was set aside as an indemnity escrow. Under the terms of the escrow, if there were no pending indemnifiable claims, \$50,000 was to be released to GridSense on January 7, 2017, with the balance to be released to GridSense on July 7, 2017. The buyers refused to authorize the escrow agent to release the \$50,000 on January 7, 2017 and, subsequent to that date, submitted purported third-party indemnifiable claims which we believe to be both untimely and without merit. This dispute has yet to be resolved.

Following the sale, GridSense paid off approximately \$240,000 of previously accrued severance and other payroll costs. GridSense recorded a gain of \$944,000 (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 is included in discontinued operations in the third quarter of 2016.

Subsequently, GridSense engaged a third-party liquidation officer to satisfy, to the extent of the funds available from the remaining proceeds, the claims of GridSense outside creditors as well as Acorn which is GridSense's largest creditor. Through December 31, 2016, the liquidator settled approximately \$459,000 of outside creditor claims while disbursing approximately \$47,000 to those creditors (see below for settlements with Acorn). 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.

Corporate

Corporate general and administrative expense of \$1,962,000 in 2016 reflected a decrease of \$1,678,000 or 46% from the \$3,640,000 of expense reported in 2015. The decrease in corporate general and administrative expense was primarily due to significantly decreased professional fees (approximately \$950,000) as well as decreased board costs (approximately \$150,000) and non-cash stock compensation expense (approximately \$490,000) following a restructure of the composition of compensation made to Board members. Corporate general and administrative expense in 2016 includes \$460,000 of severance and related costs following the resignation of John A. Moore, our former CEO. Excluding this one-time charge, corporate general and administrative expense would have decreased by \$2,138,000 or 59%.

Fourth quarter 2016 corporate general and administrative expense was \$117,000 reflecting a decrease of \$723,000 compared to the fourth quarter of 2015 and a decrease of \$248,000 as compared to the third quarter of 2016. The decrease in fourth quarter 2016 corporate general and administrative expense compared to fourth quarter 2015's balance was primarily due reduced professional fees following the winding down of USSI affairs in 2015, reduced board costs and non-cash stock compensation following the aforementioned restructure of Board compensation and decreased salaries primarily due to the resignation of Mr. Moore.

We believe corporate general and administrative quarterly expense in 2017 will approximate our fourth quarter 2016 expense, depending upon the level of professional fees incurred. We continue to seek ways to further reduce our operating expenses going forward.

In April 2016, we closed on the sale of nearly 50% of our interest in our DSIT Solutions, Ltd. business to Rafael Advanced Defense Systems Ltd., a major Israeli defense company. At closing, we received gross proceeds of approximately \$4.9 million before escrow, fees and taxes. From the gross proceeds, we deposited approximately \$579,000 to satisfy the escrow requirements in the sale. We expect to be able access those funds, net of any disbursements, in October 2017. We also paid an Israeli withholding tax of approximately \$266,000 and incurred transaction costs of approximately \$184,000. In connection with this sale, we recorded a gain of approximately \$3.5 million (of which approximately \$2.6 million was related to the step-up in value of our retained non-controlling investment) in the second quarter. We are also eligible to receive our pro-rata share (approximately 82.4%) of a \$1.0 million earn-out over a three-year period. We did not receive the earn-out eligible to us based on DSIT's 2016 results. Following the sale, we own approximately 41.2% of DSIT with DSIT management owning approximately 8.8% and Rafael owning 50%.

Following the receipt of the net proceeds from the DSIT Transaction, we repaid in full the \$2.0 million of principal and approximately \$15,000 of accrued interest in full satisfaction of the cash due under the Loan and Security Agreement with Leap Tide Capital Partners III, LLC (“Leap Tide”). In addition, following the receipt of the net proceeds from the DSIT Transaction, we repaid in full \$275,000 of loans from directors (\$200,000 from one director and \$75,000 from another director) under promissory notes plus interest equal to 15% of the amounts borrowed under the promissory notes. Remaining proceeds from the DSIT Transaction were used for corporate expenses and financing the operations of OmniMetrix.

Following the sale of the GridSense assets to Franklin Fueling Systems, Inc. (see above), 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. In addition to settling the claims of outside creditors, through December 31, 2016, GridSense distributed \$500,000 to Acorn in satisfaction of \$5.6 million of Acorn’s claims against GridSense. GridSense still owes Acorn approximately \$400,000. At December 31, 2016, GridSense had approximately \$19,000 of cash available (excluding escrow amounts) for satisfaction of remaining creditor claims. Acorn cannot determine with certainty the amount, if any, of these remaining proceeds or escrow amounts that may be available to it.

As of December 31, 2016, we had less than \$100,000 of non-escrow corporate cash and cash equivalents. In February 2017, we borrowed \$900,000 from three of our directors and received a commitment from a director that would allow us to borrow up to an additional \$1.0 million on or after July 7, 2017 under certain conditions (see Recent Developments). Such cash together with the expected October 2017 receipt of escrowed funds from the DSIT Transaction and reduced cash need from OmniMetrix based on their expected continued growth, is expected to finance our operations through at least the first quarter of 2018. The abovementioned director loans are due to be repaid at the earlier of April 30, 2018 or upon the sale of our remaining 41.2% interest DSIT which we are currently pursuing.

Based on the above, we have sufficient cash to finance our operations for the next year. However, we may need to seek additional sources of funding if both of the following were to occur: (i) a failure by OmniMetrix to grow at the rate anticipated that necessitates additional funds for their operations, and (ii) the receipt of the escrowed funds from the DSIT sale is less than we anticipate. Additional sources of funding may include additional loans from related and/or non-related parties, a sale of our DSIT investment, a sale, partial sale 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.

As of March 22, 2017, Acorn's corporate operations (excluding cash at our subsidiaries and escrow cash) held a total of approximately \$612,000 in unrestricted cash and cash equivalents.

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; business combinations, 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 2015, we had no cost basis or equity method investments. However, following the sale of a portion of our interest in DSIT in the second quarter of 2016, we account 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.

Revenue Recognition

Revenue from time-and-materials service contracts, maintenance agreements and other services is recognized as services are provided, all significant contractual obligations have been satisfied and collections assured.

In the year ended December 31, 2016, we recorded approximately \$5.1 million of revenue in DSIT up to the date of the DSIT Transaction representing approximately 59% of our consolidated revenue for the year. Of that revenue, DSIT derived approximately \$4.5 million or 89% of its revenues from fixed-price type contracts (approximately \$15.0 million or 89% of DSIT's full-year 2016 revenue was also from fixed-price type contracts). Fixed-price type contracts require the accurate estimation of the cost, scope and duration of each engagement. Revenue and the related costs for these projects are recognized for a particular period, using the percentage-of-completion method as direct labor is incurred, with revisions to estimates reflected in the period in which changes become known. If DSIT does not accurately estimate the resources required or the scope of work to be performed, or does not manage its projects properly within the planned periods of time or satisfy our obligations under the contracts, then future revenue and margins may be significantly and negatively affected and losses on existing contracts may need to be recognized. Any such resulting changes in revenues and reductions in margins or contract losses could be material to DSIT's results of operations.

Sales of OmniMetrix monitoring systems have multiple elements which include the sale of equipment and of monitoring services. Sales of OmniMetrix equipment do not qualify as a separate unit of accounting. As a result, revenues (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 customer relationship. Revenues from the prepayment of monitoring fees (generally paid 12 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.

Foreign Currency Transactions

The currency of the primary economic environment in which our corporate headquarters and our U.S. subsidiaries operate is the United States dollar (“dollar”). Accordingly, the Company and all of its U.S. subsidiaries use the dollar as their functional currency.

DSIT’s functional currency is the New Israeli Shekel (“NIS”). DSIT’s financial statements have been translated using the exchange rates in effect at the balance sheet date. Statements of operations amounts have been translated using the average exchange rate for the year or the specific exchange rate on the date of a specific transaction. All exchange gains and losses denominated in non-functional currencies are reflected in finance expense when they arise.

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 2016 was based on the historical volatility of the market price of the Company’s 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. Recognition of stock-based compensation expense had, and will likely continue to have, a material effect on our selling, general and administrative and other items within our consolidated statements of operations and also may have a material effect on our deferred income taxes and additional paid-in capital line items within our consolidated balance sheets. We are also required to use judgment in estimating the amount of stock-based awards that are expected to be forfeited. If actual forfeitures differ significantly from the original estimate, stock-based compensation expense and our results of operations could be materially impacted.

The option plan for our DSIT subsidiary allowed for vesting either upon the occurrence of an initial public offering of DSIT, a corporate transaction involving DSIT or upon the option grantee achieving 25 years of service with DSIT. In the fourth quarter of 2015, the likelihood of a corporate transaction involving DSIT was deemed to be probable and accordingly, all options that had not previously vested as a result of the option grantee achieving 25 years of service with DSIT were deemed to be fully vested. As a result, DSIT recorded stock compensation expense of \$79,000 during the year ended December 31, 2015.

For each of the years ended December 31, 2016 and 2015, we incurred stock compensation expense with respect to options of approximately \$0.1 million and \$0.7 million, respectively. Such amounts in 2015 include the abovementioned stock compensation expense associated with DSIT.

See Note 16 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, 2015 and 2016 and consolidated balance sheet data as of December 31, 2015 and 2016 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, 2012, 2013 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,				
	2016	2015	2014	2013	2012
	(in thousands, except per share data)				
Revenue	\$8,659	\$16,548	\$15,067	\$15,262	\$14,293
Cost of sales	5,134	10,381	9,726	9,587	9,037
Gross profit	3,525	6,167	5,341	5,675	5,256
Research and development expenses, net	927	1,705	1,618	2,158	1,389
Selling, general and administrative expenses	5,651	9,632	9,280	12,938	10,985
Impairments	—	—	—	6,731	—
Restructuring and related charges	—	—	97	795	—
Operating loss	(3,053)	(5,170)	(5,654)	(16,947)	(7,118)
Finance income (expense), net	(572)	(327)	190	97	233
Loss from operations before taxes on income	(82)	(5,497)	(5,464)	(16,850)	(6,885)
Income tax benefit (expense)	(19)	(209)	(163)	(156)	2,956
Loss from continuing operations	(101)	(5,706)	(5,627)	(17,006)	(3,929)
Gain on sale of interest in DSIT, net of transaction costs	3,543	—	—	—	—
Share of income in DSIT	268	—	—	—	—
Loss from discontinued operations, net of income taxes	(286)	(5,096)	(23,972)	(13,983)	(13,806)
Net loss	(119)	(10,802)	(29,599)	(30,989)	(17,735)
Non-controlling interest share of (income) loss – continuing operations	264	105	47	62	(84)
Non-controlling interest share of loss - discontinued operations	—	98	2,407	1,213	1,108
Net income (loss) attributable to Acorn Energy, Inc. shareholders	\$145	\$(10,599)	\$(27,145)	\$(29,714)	\$(16,711)
Basic net income (loss) per share attributable to Acorn Energy, Inc. shareholders:					

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

Income (loss) from continuing operations	\$0.02	\$(0.21)	\$(0.25)	\$(0.89)	\$(0.22)
Loss from discontinued operations	(0.01)	(0.19)	(0.94)	(0.68)	(0.71)
Net income (loss) per share attributable to Acorn Energy, Inc. shareholders	\$0.01	\$(0.40)	\$(1.19)	\$(1.57)	\$(0.93)
Weighted average number of shares outstanding attributable to Acorn Energy, Inc. shareholders – basic	28,488	26,803	22,844	18,916	17,891
Diluted net income (loss) per share attributable to Acorn Energy, Inc. shareholders:					
Income (loss) from continuing operations	\$0.02	\$(0.21)	\$(0.25)	\$(0.89)	\$(0.22)
Loss from discontinued operations	(0.01)	(0.19)	(0.94)	(0.68)	(0.71)
Net income (loss) per share	\$0.01	\$(0.40)	\$(1.19)	\$(1.57)	\$(0.93)
Weighted average number of shares outstanding attributable to Acorn Energy, Inc. shareholders – diluted	28,531	26,803	22,844	18,916	17,891

The following table sets forth certain information with respect to revenues and profits of our reportable business segments for the years ended December 31, 2016 and 2015, including the percentages of revenues attributable to such segments. (See Note 20 to our Consolidated Financial Statements for the definitions of our reporting segments).

	PG	CP	Energy & Security Sonar Systems*	Other*	Total
Year ended December 31, 2016:					
Revenues from external customers	\$2,903	\$682	\$4,620	\$454	\$8,659
Percentage of total revenues from external customers	34 %	8 %	53 %	5 %	100 %
Segment gross profit	1,516	378	1,517	114	3,525
Year ended December 31, 2015:					
Revenues from external customers	\$2,513	\$534	\$12,093	\$1,408	\$16,548
Percentage of total revenues from external customers	15 %	3 %	73 %	9 %	100 %
Segment gross profit	1,472	319	3,834	542	6,167

* Acorn ceased consolidating the results of DSIT following the close of the DSIT Transaction on April 21, 2016. Results reported above for the year ended December 31, 2016 are for the period ending April 21, 2016.

2016 COMPARED TO 2015

Revenue. Consolidated revenue of \$8.7 million during 2016 reflected a decrease of \$7.9 million or 48% as compared to 2015 revenues of \$16.5 million. Revenue at DSIT decreased \$8.4 million or 62% from \$13.5 million during 2015 to \$5.1 million in 2016 as we only consolidated DSIT's revenue up to the date of the DSIT Transaction (April 21, 2016). Thereafter, DSIT's results are reported on the equity method (see below). OmniMetrix's revenue increased 18% from \$3.0 million during 2015 to \$3.6 million in 2016. OmniMetrix recorded increased revenue in both its PG and CP activities. PG revenue increased from \$2.5 million in 2015 to \$2.9 million in 2016 (16%) while CP revenue increased from \$0.5 million in 2015 to \$0.7 million in 2016 (28%). Increased revenue in both segments was the result of increased hardware sales and resultant monitoring revenue.

Gross profit. Gross profit of \$3.5 million during 2016 reflects a \$2.6 million or 43% decrease compared to 2015 gross profit of \$6.2 million. Gross profit at DSIT decreased \$2.7 million or 63% in 2016 as compared to 2015 while gross profit at OmniMetrix increased \$103,000 or 6% to \$1.9 million. The decrease in DSIT's reported gross profit was due to the fact that 2016's results only include DSIT's gross profit up to the date of the DSIT Transaction (April 21, 2016). Thereafter, DSIT's results are reported on the equity method (see below). The increase in OmniMetrix's gross profit was attributable to its increased revenue as gross margins decreased from 59% in 2015 to 53% in 2016. The decrease in OmniMetrix's gross margin was due in part to a one-time revenue adjustment in the second quarter and increased

monitoring costs.

Research and development (“R&D”) expense. R&D expense decreased \$0.8 million (46%) from \$1.7 million in 2015 to \$0.9 million in 2016. The decreased R&D expense was attributable to DSIT whose reported R&D expense decreased from \$1.2 million in 2015 to \$0.5 million in 2016. The decrease in DSIT’s reported R&D expense was due to the fact that 2016’s results only include DSIT’s R&D expense up to the date of the DSIT Transaction (April 21, 2016). Thereafter, DSIT’s results are reported on the equity method (see below). OmniMetrix’s R&D expense decreased from \$514,000 in 2015 to \$458,000 in 2016. The decrease in R&D expense at OmniMetrix was due to staff changes and product certification costs incurred in 2015.

Selling, general and administrative expense (“SG&A”). SG&A expense in 2016 decreased by \$4.0 million (41%) as compared to 2015. DSIT recorded approximately \$1.1 million of SG&A expense in 2016 as compared to \$3.2 million in 2015. The decrease in DSIT’s reported SG&A expense was due to the fact that 2016’s results only include DSIT’s SG&A expense up to the date of the DSIT Transaction (April 21, 2016). Thereafter, DSIT’s results are reported on the equity method (see below). OmniMetrix recorded approximately \$2.6 million of SG&A expense or approximately \$0.2 million (7%) less than 2015 SG&A expense due to decreased salary costs associated with changes in OmniMetrix personnel. Corporate general and administrative expense in 2016 decreased dramatically to approximately \$2.0 million from \$3.6 million in 2015. The decrease in corporate general and administrative expense was primarily due to significantly decreased professional fees (approximately \$950,000) as well as decreased board costs (approximately \$150,000) and non-cash stock compensation expense (approximately \$490,000) following a restructure of the composition of compensation made to Board members. Corporate general and administrative expense in 2016 includes \$460,000 of severance and related costs following the resignation of John A. Moore, our former CEO.

Finance expense, net. Finance expense in 2016 is primarily comprised of interest expense of \$446,000 (\$381,000 of which was non-cash interest related to the accretion of discount and the value of shares given in the borrowing) recorded in connection with our borrowings from Leap Tide Capital Partners III, and \$56,000 of interest to directors of Acorn as a result of their loans to us in early 2016.

Sale of DSIT. In April 2016, we closed on the sale of nearly 50% of our interest in our DSIT Solutions, Ltd. Business. As a result of the sale, we recorded a gain of approximately \$3.5 million in 2016.

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 following the close of the transaction was approximately \$268,000.

Loss from discontinued operations, net of income taxes. During 2016, GridSense recorded losses net of income tax of \$286,000. During 2015, GridSense recorded losses net of income tax of \$3,923,000 while USSI recorded a loss of \$1,173,000.

Net loss attributable to Acorn Energy. We had net income attributable to Acorn Energy of \$145,000 in 2016 as compared with a net loss of \$10.6 million in 2015. Our 2016 results are comprised of losses of \$0.3 million at GridSense which is included in discontinued operations, corporate expenses of \$2.5 million and a loss at OmniMetrix of \$1.2 million. These losses were offset by the gains we reported on the sale of a portion of our interests in DSIT and our share of DSIT’s net income following the sale (\$3.8 million) and \$264,000 of non-controlling interests share in our losses. Corporate expenses include approximately \$460,000 of severance and related costs associated with resignation of our former CEO. Corporate expenses also include approximately \$0.5 million of interest expense associated with our borrowings from Leap Tide and our directors.

LIQUIDITY AND CAPITAL RESOURCES

As of December 31, 2016, we had working capital of \$3.5 million (\$4.4 million in continuing operations). This amount includes our \$5.7 million investment in DSIT which we plan to sell in the coming year in order to repay the recently received director loans (see Recent Developments) and invest in OmniMetrix. Our working capital also included \$0.2 million of cash and cash equivalents and an escrow deposit of \$0.6 million as well as \$2.1 million of deferred revenue in OmniMetrix. Such deferred revenue does not require significant cash outlay in order for the revenue to be recognized. Net cash increased during the year ended December 31, 2016 by \$69,000. During 2016, \$4.5 million of cash was used in operating activities (of which approximately \$3.6 million was used in continuing operations and approximately \$1.0 million in discontinued operations).

Our corporate headquarters used approximately \$1.6 million during 2016 while our OmniMetrix subsidiary used \$0.7 million of cash for its operations during 2016. DSIT used approximately \$1.2 million in its operations during 2016 up through the date of the DSIT Transaction. Our discontinued operations (GridSense) used \$1.0 million in their operating activities in 2016.

Cash provided by investing activities of \$5.1 million was primarily due to the \$3.4 million of proceeds from the sale of a portion of our interests in DSIT (net of transaction costs, DSIT cash divested and amounts set aside for escrow) and \$0.8 million from net release of cash in restricted deposits at DSIT prior to our sale. In addition, our discontinued GridSense operations generated \$0.9 million of cash from the \$1.0 million of proceeds from the sale of its assets less \$100,000 that was set aside as an indemnity escrow.

Net cash of \$0.5 million was used in financing activities during 2016. During 2016, we repaid the \$2.0 million we had borrowed from Leap Tide and \$275,000 of director loans. These uses of cash were offset by borrowings from directors of \$425,000 and \$1,156,000 of cash provided from short-term credit facilities. Approximately \$780,000 of the cash provided from short-term credit facilities was from DSIT prior to the closing of the DSIT Transaction. DSIT also received \$391,000 of proceeds from the exercise of options prior to the closing of the DSIT Transaction. In addition, our discontinued operations at GridSense paid off their remaining short-term borrowings of \$138,000.

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 \$500,000. 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 bears interest at the greater of (i) prime (3.75% at December 31, 2016) plus 2% or (ii) 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%. At the time, the Loan and Security Agreement reflected a \$500,000 credit line and the lender imposed a sublimit of \$300,000 and had sole discretion as to when to remove the sublimit.

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. The \$300,000 sublimit was also removed. In return, OmniMetrix 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 October 1, 2016.

As of December 31, 2016, OmniMetrix had an outstanding balance of approximately \$376,000 pursuant to the amended Loan and Security Agreement and a balance of approximately \$185,000 as of March 22, 2017.

In October, 2015, one Acorn's directors acquired a 10% interest in Acorn's OmniMetrix Holdings, Inc. subsidiary ("Holdings") through the purchase of preferred stock (the "OmniMetrix Preferred Stock") for \$500,000. Holdings is the holder of 100% of the membership interests OmniMetrix, LLC. Subsequently, in November, 2015, the director acquired an additional 10% interest in Holdings through the purchase of additional OmniMetrix Preferred Stock for an additional \$500,000 and currently owns a 20% interest in Holdings.

A dividend of 10% per annum accrues on the OmniMetrix Preferred Stock. A 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 Common Stock. The dividend is payable in cash or the form of additional shares of OmniMetrix Preferred Stock at the election of the holder of the Preferred Stock.

We have no assurance that OmniMetrix's credit facility will provide sufficient liquidity for all of OmniMetrix's working capital needs in 2017 or that the facility will be renewed beyond its expiration date of September 30, 2017. Additional financing for OmniMetrix may be in the form of a bank line, new 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.

On April 21, 2016, we announced our decision to cease operations of our GridSense subsidiary and initiate the liquidation of the GridSense assets. As a result of this decision, GridSense is being reported as a discontinued operation. On July 12, 2016, Acorn Energy, Inc. and GridSense sold the GridSense assets to Franklin Fueling Systems, Inc., a wholly-owned subsidiary of Franklin Electric Co., Inc. for a gross sales price of \$1.0 million of which \$100,000 was set aside as an indemnity escrow. Under the terms of the escrow, if there were no pending indemnifiable claims, \$50,000 was to be released to GridSense on January 7, 2017, with the balance to be released to GridSense on July 7, 2017. The buyers refused to authorize the escrow agent to release the \$50,000 on January 7, 2017 and, subsequent to that date, submitted purported third-party indemnifiable claims which we believe to be both untimely and without merit. This dispute has yet to be resolved.

Following the sale, GridSense paid off approximately \$240,000 of previously accrued severance and other payroll costs. Subsequently, 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 liquidator settled approximately \$6.0 million of GridSense creditor claims (\$5.6 million from Acorn), while disbursing approximately \$547,000 to the creditors of GridSense (\$500,000 to Acorn). At December 31, 2016, GridSense had approximately \$19,000 of cash available (excluding escrow amounts) for satisfaction of remaining creditor claims. Acorn cannot determine with certainty the amount, if any, of these remaining proceeds or the escrow amounts that may be available to it.

As of December 31, 2016, we had less than \$100,000 of non-escrow corporate cash and cash equivalents and did not have sufficient cash flow for the next twelve months. In February 2017, we borrowed \$900,000 from three of our directors and received a commitment from a director that would allow us to borrow up to an additional \$1.0 million in July 2017 under certain conditions (see Recent Developments). Such cash together with the expected October 2017 receipt of escrowed funds from the DSIT Transaction and reduced cash need from OmniMetrix based on their expected continued growth is expected to finance our operations through at least the first quarter of 2018. The abovementioned director loans are due to be repaid at the earlier of April 30, 2018 or upon the sale of our remaining 41.2% interest DSIT which we are currently pursuing.

Based on the above, we have sufficient cash to finance our operations for the next year. However, we may need to seek additional sources of funding if both of the following were to occur: (i) a failure by OmniMetrix to grow at the rate anticipated that necessitates additional funds for their operations, and (ii) the receipt of the escrowed funds from the DSIT sale is less than we anticipate. Additional sources of funding may include additional loans from related and/or non-related parties, a sale of our DSIT investment, a sale, partial sale 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.

As of March 22, 2017, Acorn's corporate operations (excluding cash at our subsidiaries and escrow cash) held a total of approximately \$612,000 in unrestricted cash and cash equivalents.

Contractual Obligations and Commitments

The table below provides information concerning obligations under certain categories of our contractual obligations as of December 31, 2016.

40

CASH PAYMENTS DUE TO CONTRACTUAL OBLIGATIONS**Years Ending December 31,****(in thousands)**

	Total	2017	2018-2019	2020-2021	2022 and thereafter
Bank and other debt	\$376	\$376	\$ —	\$ —	\$ —
Operating leases	326	107	219	—	—
Due to DSIT	1,171	—	1,171	—	—
Potential severance obligations	279	279	—	—	—
Total contractual cash obligations	\$2,152	\$762	\$ 1,390	\$ —	\$ —

We expect to finance the contractual commitments for continuing operations from cash currently on hand and cash generated from operations.

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, escrow deposits and trade accounts receivable. The Company's cash, cash equivalents and escrow deposits were deposited primarily with U.S. banks and brokerage firms and amounted to \$801,000 at December 31, 2016. The Company does not believe there is significant risk of non-performance by these counterparties. Approximately 28% of the accounts receivable at December 31, 2016 was due from one customer who pay their 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.

Interest Rate Risk

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 \$500,000. Debt incurred under this financing arrangement bears 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 \$150,000 in its line-of-credit with the lender for a minimum of one year beginning October 1, 2016.

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, 2016.

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, 2016 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, 2016.

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 subsidiaries are 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, including employee turnover 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, 2016.

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 quarter 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
Christopher E. Clouser	65	Director, Chairman of the Board and member of our Audit Committee
Jan H. Loeb	58	Director, President and Chief Executive Officer
Mannie L. Jackson	77	Director
Edgar S. Woolard Jr.	82	Director and member of our Audit Committee
Samuel M. Zentman	71	Director and Chairman of our Audit Committee
Michael Barth	56	Chief Financial Officer of the Company and DSIT
Walter Czarnecki	38	President and CEO of OmniMetrix

Christopher E. Clouser was appointed to the Board in November 2011 and became Chairman in November 2012. He is also a member of our Audit Committee and serves on each of our subsidiary boards of directors or managers. Mr. Clouser has held senior level positions including: President of Burger King Brands; President and CEO of Preview Travel; CEO of the Minnesota Twins Major League Baseball Club; Senior Vice President & Chief Communications Officer of Northwest Airlines; Corporate Vice President of Public Affairs and Communications of Hallmark Cards; and Senior Vice President and Chief Administrative Officer of Sprint. In addition, he has served on the corporate Boards of Directors of Piper Jaffray Inc., Gibson Guitar/Baldwin Corp., Mall of America, Pepsi Americas, Marquette Bancshares, Delta Beverage and Mesaba Aviation. He is the immediate past chair of the Board and executive committee of the International Tennis Hall of Fame. He serves on the Advisory Boards Fila, Northstar, Mall of America and VML corporations. Prior to his current positions, he was President of the Association of Tennis Professions (ATP), where he also served as Chairman of ATP Properties and Chair of the ATP Foundation.

Key Attributes, Experience and Skills. Mr. Clouser brings to Acorn a wealth of operational and managerial experience culled from decades of service in key roles at major corporations. He has particular skills in marketing and business development, which will enable the Board to better position our companies for customer growth.

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 DSIT subsidiary in August 2015 pursuant to the terms of the Leap Tide Loan Agreement. 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 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.

Mannie L. Jackson was elected to the Board in September 2012. Mr. Jackson played professional basketball for a brief time before starting his business career at General Motors, Inc. He later served as President and General Manager of Honeywell's Telecommunications Business and then as Corporate Executive VP of worldwide Sales and Marketing before retiring as a Corporate Officer and Senior Vice President in 1993. Mr. Jackson helped found and chaired the Executive Leadership Council which represents the most senior African American corporate executives in Fortune 500 companies and previously served on the Board of Directors of several Fortune 500 companies, including Ashland Inc., Reebok International, Stanley Works, Jostens and True North. Mr. Jackson is currently Chairman of privately held Boxcar Holdings, LLC, and a former owner and Chairman of the Board of the Harlem Globetrotters. He is also former Chairman of the Board of Trustees of the Naismith Basketball Hall of Fame and is a member of the University of Illinois Foundation Board of Directors.

Key Attributes, Experience and Skills. Mr. Jackson brings to the Board deep operational, strategic planning and senior managerial experience; as well as access to a network of domestic and international business relationships.

Edgar S. Woolard Jr. joined the Board in November 2014 and serves as a member of our Audit Committee. Mr. Woolard served as chairman and chief executive officer of DuPont from 1989 to 1995 and as chairman until 1997. He remained a director until his retirement from the board effective January 1, 2000. He also served as non-executive chairman of DuPont's Conoco Inc. subsidiary where he oversaw that company's IPO in 1998 and initiated its merger with Phillips Petroleum. He has served on the boards of the New York Stock Exchange, Inc., Telex Communications Inc., Apple Computer Inc., Citigroup, Inc., IBM, and Bell Atlantic, Delaware. He is also a former Chairman of the Business Council. He is a member of the National Academy of Engineering and the American Philosophical Society.

Key Attributes, Experience and Skills. Mr. Woolard brings to Acorn a distinguished background of operational and managerial experience at the highest levels of the energy industry, in addition to his outstanding and extensive service record of corporate management and oversight as a member of the boards of several major corporations.

Samuel M. Zentman has been one of our directors since November 2004 and currently serves as Chairman of our Audit Committee. 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.

Michael Barth has been our Chief Financial Officer and the Chief Financial Officer of DSIT since December 2005. For the six years prior, he served as Deputy Chief Financial Officer and Controller of DSIT. Mr. Barth holds an MBA in Accounting from Bernard M. Baruch College of the City University of New York. He is a Certified Public Accountant in both the U.S. and Israel and has over twenty-five years of experience in public and private accounting.

Walter Czarnecki serves as President and CEO of OmniMetrix. Mr. Czarnecki has over a decade 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 Partners, a Chinese investment bank with over \$26 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. In 2015, Walter was named in Wharton's 40 Under 40 list.

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, Christopher E. Clouser and Edgar S. Woolard Jr. 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.

Compliance with Section 16(a) of the Securities Exchange Act of 1934

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 2016 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 at <http://www.acornenergy.com/rsc/docs/55.pdf>. 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, at the Internet address specified above.

ITEM 11. EXECUTIVE COMPENSATION

EXECUTIVE AND DIRECTOR COMPENSATION

Compensation Discussion and Analysis

The following discussion and analysis of compensation arrangements of our named executive officers for the year ended December 31, 2016 should be read together with the compensation tables and related disclosures set forth below. This discussion contains forward looking statements that are based on our current plans, considerations, expectations and determinations regarding future compensation programs. Actual compensation programs that we adopt may differ materially from currently planned programs as summarized in this discussion.

Compensation determinations. Our executive compensation was previously administered by the Compensation Committee of the Board of Directors (the “Committee”). The members of the Committee in 2015 were Christopher E. Clouser (Chairman) and Mannie L. Jackson, both of whom were independent in accordance with NASDAQ’s requirement for independent Director oversight of executive officer compensation. The Committee was dissolved in October 2015. We believe that not using a committee of the Board in setting compensation policies and making compensation decisions fosters fuller active participation of all our directors in the process. In fulfilling its role, the Board (1) reviews periodically and approves the Company’s general philosophy concerning executive compensation and the components of the Company’s executive compensation program to align them with the Company’s compensation philosophy; (2) reviews and approves goals and objectives that it considers relevant to the compensation of the Company’s chief executive officer, evaluates his performance and sets the terms of his compensation; and (3) establishes the compensation of each of the Company’s other executive officers, as well approves employment agreements, severance agreements and change in control agreements for the Company’s chief executive officer and other executive officers. In addition, the Board administers and periodically evaluates the Company’s long-term and short-term incentive plans and employee benefit plans, together with the Company’s methodology for awarding equity-based and other incentive compensation to all non-executive employees (including new hires) and other service providers and the levels of such compensation. All action with respect to the compensation of our executive officers is also approved or recommended for approval by a majority of our independent directors.

Compensation objectives and philosophy. Our executive compensation programs are designed to motivate and reward sustainable long-term performance, and a key component of our executive compensation is long-term incentives. This ensures that executive compensation aligns appropriately with long-term stockholder interests and the Company’s performance. We periodically evaluate our executive compensation programs and make changes when necessary to ensure alignment with stockholder interests. The Board believes that the objectives of our executive compensation program are appropriate for a company of our size and stage of development and that our compensation policies and practices help meet those objectives.

Compensation program. The elements of our compensation program include base salary and performance-based cash bonuses, as well as long-term compensation in the form of stock options. The Board believes that our executive compensation program achieves an appropriate balance between fixed compensation and variable incentive compensation and pays for performance. The Board also believes that the Company's executive compensation program effectively aligns the interests of our executive officers with those of our stockholders by tying a significant portion of their compensation to the Company's performance and by providing a competitive level of compensation needed to recruit, retain and motivate talented executives critical to the Company's long-term success. The costs of our compensation programs are a significant determinant of our competitiveness. Accordingly, we are focused on ensuring that the balance of the various components of our compensation program is optimized to motivate employees to achieve our corporate objectives on a cost-effective basis.

In March 2012, the Compensation Committee engaged an independent compensation consultant ("Consultant") to assist it in reviewing our current executive compensation practices and recommend an overall compensation strategy for the executive officers of the Company, including assistance in reviewing the compensation to be included in a new employment agreement for Mr. Moore for 2013.

Executive compensation for 2016. Changes in each named executive officer's base compensation for 2016, together with the methodology for determining their respective bonuses, if any, are described below. The Boards of Directors of our subsidiary companies (DSIT, GridSense and OmniMetrix) determined the compensation of their own executive officers and other employees.

Jan H. Loeb. On January 28, 2016, Jan H. Loeb was appointed President and CEO of the Company, replacing outgoing President and CEO, John A. Moore, who resigned from those positions as of that date. Concurrent with the appointment of Mr. Loeb as President and CEO, the Company entered into a consulting arrangement with Leap Tide Capital Management LLC pursuant to which Leap Tide Capital Management LLC received 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. Mr. Loeb is the sole owner and manager of Leap Tide Capital Management LLC. Pursuant to the consulting arrangement, on March 16, 2016, the Company issued to Leap Tide Capital Management LLC, for nominal consideration, warrants exercisable for 35,000 shares of the Company's common stock. The exercise price of the warrants is \$0.13 per share. One-fourth of the warrants were immediately exercisable; the remainder became exercisable in equal increments on each of June 16, 2016, September 16, 2016 and December 16, 2016. The warrants expire on the earlier of (a) March 16, 2023 and (b) 18 months from the date Mr. Loeb ceases to be a director, officer, employee or consultant of the Company.

John A. Moore. Effective January 1, 2013, Mr. Moore and the Company entered into a new five-year Employment Agreement (the "2013 Agreement"). The Compensation Committee contracted in late 2011 with a compensation consultant previously utilized by the Board to assist in developing compensation under the extension of Mr. Moore's previous employment agreement, but ultimately decided as a part of a more comprehensive review of executive and Board compensation to interview and ultimately hire a different party. The original consultant's report was reviewed but not relied upon in developing Mr. Moore's compensation under the 2013 Agreement. As of March 1, 2012, the term of Mr. Moore's existing employment agreement had been amended to continue on a month-to-month basis in anticipation of negotiating and finalizing a new employment agreement. Mr. Moore offered a proposal for the terms of a new employment agreement and the end result was the product of arms' length negotiations between Mr. Moore and the Compensation Committee. The Compensation Committee retained outside legal counsel in connection with the negotiations with Mr. Moore, in addition to conferring with our then General Counsel concerning the agreement. Because Mr. Musanti (at the time, a member of the Compensation Committee) had been retained by the Company for services to be performed in 2013 (as CFO and COO of GridSense and CFO of USSI) shortly before the date at which the 2013 Agreement was scheduled for approval by the Compensation Committee, Mr. Musanti recused himself from final deliberations regarding the 2013 Agreement. Since his recusal left the Committee with a single member, the 2013 Agreement was also considered and ratified by the Corporation's independent directors. The Consultant and our Compensation Committee used peer group benchmarking to assist in setting Mr. Moore's compensation. In so doing, they focused exclusively on market capitalization as the most representative statistic in developing the peer group comparison within the Energy Services Company sector for benchmarking Mr. Moore's position. As noted above, the Committee found the peer groups in the Consultant's report to be more relevant to the Company's business model. The Consultant relied on a regression analysis technique which adjusted the sample so that it was able to provide the Committee with more direct and relevant comparisons of data. Benchmarked items include salary, total cash compensation and total direct compensation. The data was used to ensure that Mr. Moore is paid at approximately the 50th percentile of benchmarked companies. Benchmarked companies included the following:

USEC Inc. (USU)

EnerNOC, Inc. (ENOC)

Echelon Corporation (ELON)

Warren Resources, Inc. (WRES)

Panhandle Oil and Gas Inc. (PHX)

Callon Petroleum Company (CPE)

Dawson Geophysical Company (DWSN)

Safeguard Scientifics, Inc. (SFE)

Endeavour International Corporation (END)

Goodrich Petroleum Corporation (GDP)

Oyo Geospace (GEOS)

Bill Barrett Corp. (BBG)

Itron Inc. (ITRI)

Ultra Petroleum Corp. (UPL)

Harris & Harris Group (TINY)

Hercules Technology Growth Capital (HTGC)

Energy Partners Ltd. (EPL)

The 2013 Agreement provided that Mr. Moore was to receive an annual cash bonus with respect to each year of up to one hundred percent (100%) of his aggregate base salary in such year, based upon the attainment of agreed upon personal and Company performance goals and milestones for the preceding fiscal year, as mutually determined by the Compensation Committee and Mr. Moore. The actual amount of any bonus payable by the Company to Mr. Moore was to be determined on a sliding scale based upon his attainment of such targets for the applicable fiscal year, such that the amount of any bonus payable by the Company would be directly proportional to the percentage of such target attained by Mr. Moore during the applicable year as reasonably determined by the Board in its good faith judgment. Mr. Moore agreed to reduce his salary to \$318,750 per annum effective October 16, 2013. Effective October 1, 2015, Mr. Moore agreed to defer payment of 30% of his salary until the completion of the sale of DSIT to Rafael. In 2015, \$23,906 of Mr. Moore's salary was deferred under this arrangement. Mr. Moore did not receive a bonus for 2014 or 2015.

In connection with his resignation as the Company's President and CEO on January 28, 2016, Mr. Moore entered into a letter agreement, dated as of such date, with the Company pursuant to which it was agreed that (i) the Company would pay Mr. Moore an aggregate of \$425,000 in severance payments between July 2016 and July 2017 in accordance with the Company's regular payroll practices; (ii) for the twelve-month period commencing on the date of the letter agreement, the Company will reimburse Mr. Moore up to \$1,400 per month for costs associated with obtaining medical insurance; (iii) Mr. Moore will continue to serve on the Company's Board of Directors until the next annual stockholders' meeting and shall receive compensation for such service in accordance with the Company's compensation policy for non-employee directors; (iv) consistent with the terms of his employment agreement, Mr. Moore received accelerated vesting of all unvested options that otherwise would have vested within 24 months of the date of his resignation, with such accelerated options and all other vested and unexercised options granted by the Company as of the date of his resignation becoming exercisable for a period of one year from the date of his resignation; and (v) other than the payments and benefits set forth in the letter agreement and notwithstanding any provisions of his employment agreement, Mr. Moore would not be entitled to any further compensation or benefits.

Michael Barth. Mr. Barth's base compensation for 2016 increased by approximately \$1,000 due to currency exchange rates and contractual cost of living adjustments. He is due to receive a cash bonus of \$8,494 for 2016 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 2015 and no bonus from Acorn in 2015 or 2016.

Walter Czarnecki. Mr. Czarnecki received no increase in his base compensation for 2016. He did not receive a bonus in either 2015 or 2016. In 2015, Mr. Czarnecki received \$17,500 for relocation expenses.

Joseph E. Musanti. Effective January 1, 2013, Mr. Musanti and GridSense entered into an Employment Agreement pursuant to which Mr. Musanti initially served as GridSense's CFO and COO and later became its President and CEO effective May 10, 2013. Pursuant to a letter agreement between GridSense and USSI, Mr. Musanti also served as USSI's CFO and USSI reimbursed GridSense for an agreed upon portion of Mr. Musanti's employee costs. A similar informal arrangement was in place between GridSense and OmniMetrix pursuant to which Mr. Musanti served as OmniMetrix's CEO through April 22, 2015. Mr. Musanti was named the COO of the Company effective January 7,

2014 and received a \$25,000 annual raise in his base compensation in connection with such election, which amount (together with associated employee costs) is funded entirely by Acorn. Mr. Musanti's employment is on an "at-will" basis and the Employment Agreement has no fixed term. It provides that GridSense's Board of Directors will set Mr. Musanti's base salary (which was \$250,000 for 2013, increased to \$275,000 for 2014) and contains an opportunity for him to earn an annual bonus which would be payable in arrears based on a targeted increase in gross profits for the combined (i.e., US and Australian affiliate) GridSense business over prior year (or a base year) results (which formula is subject to change by the Board in the future). He was also eligible under a letter agreement with USSI to a bonus based on the percentage, if any, by which USSI exceeded its projected gross revenues and operating income targets as set in its annual budget. Mr. Musanti did not receive a bonus from any company for 2015 or 2016.

In connection with his resignation as the Company's COO and Chief Financial Officer of GridSense on July 11, 2016, Mr. Musanti entered into a letter agreement, dated as of such date, with the Company pursuant to which it was agreed that Mr. Musanti would receive a one-time severance payment of \$137,500 which was paid in July 2016.

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 cclouser@acornenergy.com to express their views on executive compensation matters.

Summary Compensation Table

Name and Principal Position	Year	Salary (\$)	Bonus (\$)	Option Awards (\$)	All Other Compensation (\$)	Total (\$)
Jan H. Loeb President and CEO (1)	2016	200,161(4)	—	2,886 (5)	—	203,047
John A. Moore Former President and CEO (2)	2016	177,039(6)	—	978 (7)	950 (8)	178,967
	2015	318,750	—	250,000(9)	12,000 (8)	580,750
Michael Barth CFO and CFO of DSIT	2016	184,364	8,494(10)	—	28,625 (11)	221,483
	2015	183,568	—	—	28,463 (11)	212,031
Walter Czarnecki CEO and President of OmniMetrix	2016	200,000	—	—	—	200,000
	2015	200,000	—	—	17,500 (12)	217,500
Joseph Musanti Former COO of Acorn, Former CEO and President of GridSense, Former CEO of OmniMetrix (3)	2016	326,117(13)	—	—	—	326,117
	2015	275,000	—	—	—	275,000

(1) Mr. Loeb was appointed as President and CEO on January 28, 2016.

(2) Mr. Moore resigned as President and Chief Executive Officer on January 28, 2016.

(3) Mr. Musanti served as CEO of OmniMetrix through April 22, 2015 and resigned as COO of Acorn and CEO and President of GridSense on July 11, 2016.

(4) Represents the consulting fee paid to Leap Tide Capital Management LLC for provision of Mr. Loeb's services to the Company as President and CEO.

(5) Represents the grant date fair value calculated in accordance with applicable accounting principles with respect to 35,000 warrants granted on March 16, 2016 with an exercise price of \$0.13. 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 1.79% (ii) an expected term of 7.0 years (iii) an assumed volatility of 78% and (iv) no dividends.

(6) Represents \$17,664 of salary for the period January 1, 2016 to January 28, 2016 and \$159,375 of severance payments.

(7) Represents the grant date fair value calculated in accordance with applicable accounting principles with respect to 10,000 stock options granted on April 1, 2016 (as a director – see Director Compensation below) with an exercise price of \$0.14. 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 1.56% (ii) an expected term of 6.4 years (iii) an assumed volatility of 79% and (iv) no dividends.

(8) Consists of automobile expense allowance.

(9) Represents the grant date fair value calculated in accordance with applicable accounting principles with respect to 469,131 stock options granted on January 1, 2015 with an exercise price of \$0.77. 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 2.17% (ii) an expected term of 9.5 years (iii) an assumed volatility of 62% and (iv) no dividends.

(10) Consists of a bonus from DSIT.

(11) Consists of automobile fringe benefits and the gross-up value of income taxes on such benefits.

(12) Consists of a relocation allowance.

(13) Represents \$148,954 of salary for the period January 1, 2016 to July 11, 2016, \$39,663 for vacation pay and \$137,500 of severance payments.

Grants of Plan Based Awards

Name	Grant Date	Number of Shares of Common Stock Underlying Options	Exercise Price of Options Awards (Per Share)	Grant Date Fair Value of Options Awards
John A. Moore	April 1, 2016	10,000	(1) \$ 0.14	\$ 978

- (1) The options vested 5,000 immediately on the grant date and 2,500 on July 1, 2016. The 2,500 options that were to vest on October 1, 2016 were forfeited as Mr. Moore's last day on the Board was July 21, 2016.

Grants of Warrants

Name	Grant Date	Number of Shares of Common Stock Underlying Warrants	Exercise Price of Warrants Awards (Per Share)	Grant Date Fair Value of Warrants Awards
Leap Tide Capital Management LLC (1)	March 16, 2016	35,000	(2) \$ 0.13	\$ 2,886

- (1) Issued pursuant to the Consulting Agreement with Leap Tide Capital Management LLC as partial consideration for provision of Mr. Loeb's services to the Company as President and CEO. One-fourth of the warrants were immediately exercisable; the remainder became exercisable in equal increments on each of June 16, 2016, September 16, 2016 and December 16, 2016. The warrants expire on the earlier of (a) (2) March 16, 2023 and (b) 18 months from the date Mr. Loeb ceases to be a director, officer, employee or consultant of the Company.

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 became our President and Chief Executive Officer on January 28, 2016. Concurrent with the appointment of Mr. Loeb as President and CEO, Acorn entered into a consulting arrangement with Leap Tide Capital

Management LLC pursuant to which Leap Tide Capital Management LLC received a monthly fee of \$17,000 and provided the services of Mr. Loeb to Acorn as President and CEO and such other services as mutually agreed upon with Acorn. Leap Tide Capital Management LLC also received 35,000 warrants as described above. Mr. Loeb is the sole owner and manager of Leap Tide Capital Management LLC. Mr. Loeb is not an employee of Acorn and did not receive any cash compensation from Acorn in connection with his service as President and CEO in 2016. On February 21, 2017, the Company entered into a new consulting agreement effective January 8, 2017 between the Company and Mr. Loeb extending its arrangements for compensation of Mr. Loeb for his services as President and CEO of the Company. The previous agreement expired on January 7, 2017. Pursuant to the new consulting agreement, Mr. Loeb will continue to receive cash compensation of \$17,000 per month. Mr. Loeb also received a grant 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 the new agreement was entered into). These options vest and become 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 Acorn.

John A. Moore became our President and Chief Executive Officer in March 2006. Under the terms of the 2013 Agreement, Mr. Moore's initial base salary was set at \$425,000 per annum, and had been scheduled to increase to \$450,000 per annum on January 1, 2014, \$475,000 per annum on January 1, 2015, and \$500,000 on January 1, 2016 and was to remain at that amount through the end of the term. Effective for the pay period commencing October 16, 2013, Mr. Moore and the Company amended the 2013 Agreement to provide for a fixed annual salary of \$318,750 (which amount represented a 25% reduction from his original 2013 base salary). The 2013 Agreement provided that commencing on January 1, 2014, and for each subsequent anniversary date of the term through the fourth anniversary (January 1, 2017), stock option awards having a value of \$250,000, based on a Black-Scholes model, were to be awarded to Mr. Moore. The 2013 Agreement also provided that in addition to annual stock option awards, the registrant and Mr. Moore were to discuss the terms of a mutually agreeable grant by the registrant to Mr. Moore of "Challenge Options" or "Challenge Shares" under the Corporation's 2006 Stock Incentive Plan based upon the future increase in the market capitalization of the Corporation's Common Stock. Any such grant was to be reflected in a separate contract executed between Mr. Moore and us. Under the 2013 Agreement, Mr. Moore was also entitled to (i) the employee benefits generally made available to the registrant's executive officers, (ii) short-term and long-term disability insurance for the benefit of Mr. Moore, and (iii) a monthly automobile expense allowance of \$1,000. In addition, we were required to contribute for each calendar year an amount equal to three percent (3%) of Mr. Moore's aggregate base salary to his 401(k) Plan, subject to applicable statutory limits. The Company reimbursed Mr. Moore \$15,000 for his legal expenses in connection with executing the 2013 Agreement.

The 2013 Agreement provided that Mr. Moore was to receive an annual cash bonus with respect to each year of up to one hundred percent (100%) of his aggregate base salary in such year, based upon the attainment of agreed upon personal and Company performance goals and milestones for the preceding fiscal year, as mutually determined by the Compensation Committee and Mr. Moore. The actual amount of any bonus payable by the Company to Mr. Moore was to be determined on a sliding scale based upon his attainment of such targets for the applicable fiscal year, such that the amount of any bonus payable by the Company was to be directly proportional to the percentage of such target attained by Mr. Moore during the applicable year as reasonably determined by the Board in its good faith judgment. Mr. Moore agreed to reduce his salary to \$318,750 per annum effective October 16, 2013. Mr. Moore further agreed to defer 30% of his salary effective October 1, 2015 until the consummation of the sale of DSIT to Rafael. Mr. Moore did not receive a bonus for 2014 or 2015. Mr. Moore resigned as President and Chief Executive Officer on January 28, 2016.

In connection with his resignation as the Company's President and CEO on January 28, 2016, Mr. Moore entered into a letter agreement, dated as of such date, with the Company pursuant to which it was agreed that (i) the Company would pay Mr. Moore an aggregate of \$425,000 in severance payments between July 2016 and July 2017 in accordance with the Company's regular payroll practices; (ii) for the twelve-month period commencing on the date of the letter agreement, the Company will reimburse Mr. Moore up to \$1,400 per month for costs associated with obtaining medical insurance; (iii) Mr. Moore will continue to serve on the Company's Board of Directors until the next annual stockholders' meeting and shall receive compensation for such service in accordance with the Company's compensation policy for non-employee directors; (iv) consistent with the terms of his employment agreement, Mr. Moore received accelerated vesting of all unvested options that otherwise would have vested within 24 months of the date of his resignation, with such accelerated options and all other vested and unexercised options granted by the Company as of the date of his resignation becoming exercisable for a period of one year from the date of his resignation; and (v) other than the payments and benefits set forth in the letter agreement and notwithstanding any provisions of his employment agreement, Mr. Moore would not be entitled to any further compensation or benefits.

Michael Barth has served as Chief Financial Officer of the Company and Chief Financial Officer of DSIT beginning December 1, 2005. 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 is 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) is shared by an arrangement between Acorn (75%) and DSIT (25%). Effective January 1, 2014, Mr. Barth agreed to a \$10,000 reduction in his salary of the annual portion payable by Acorn. Effective June 1, 2014, Acorn reinstated Mr. Barth's \$10,000 salary reduction. Mr. Barth's current annual salary following such linkage adjustments is approximately \$184,000. 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 2015 and 2016, Mr. Barth did not receive any bonus from Acorn nor did he receive a bonus from DSIT for 2015. For 2016, Mr. Barth is to receive a bonus of \$8,494 based on DSIT's 2016 performance.

Walter Czarnecki. Mr. Czarnecki has served as President and COO of OmniMetrix since March 2014 and as CEO since March 2015. Mr. Czarnecki has no employment agreement and is employed on an “at-will” basis. Mr. Czarnecki’s salary for 2015 was \$200,000 and was unchanged for 2016. Mr. Czarnecki did not receive a bonus for 2015 or 2016. Mr. Czarnecki received \$17,500 for reimbursement of relocation expenses in 2015.

Joseph E. Musanti. Effective January 1, 2013, Mr. Musanti and GridSense entered into an Employment Agreement pursuant to which Mr. Musanti initially served as GridSense’s CFO and COO and later became its President and CEO effective May 10, 2013. Pursuant to a letter agreement between GridSense and USSI, Mr. Musanti also served as USSI’s CFO and USSI reimbursed GridSense for an agreed upon portion of Mr. Musanti’s employee costs. A similar informal arrangement was in place between GridSense and OmniMetrix pursuant to which Mr. Musanti served as OmniMetrix’s CEO through April 22, 2015. Mr. Musanti was named the COO of the Company effective January 7, 2014 and received a \$25,000 annual raise in his base compensation in connection with such election, which amount (together with associated employee costs) is funded entirely by Acorn. Mr. Musanti’s employment is on an “at-will” basis and the Employment Agreement has no fixed term. It provides that GridSense’s Board of Directors will set Mr. Musanti’s base salary (which was \$250,000 for 2013, increased to \$275,000 for 2014) and contains an opportunity for him to earn an annual bonus which would be payable in arrears based on a targeted increase in gross profits for the combined (i.e., US and Australian affiliate) GridSense business over prior year (or a base year) results (which formula is subject to change by the Board in the future). He was also eligible under a letter agreement with USSI to a bonus based on the percentage, if any, by which USSI exceeded its projected gross revenues and operating income targets as set in its annual budget. Mr. Musanti did not receive a bonus from any company for 2015 or 2016.

In connection with his resignation as the Company’s COO and Chief Financial Officer of GridSense on July 11, 2016, Mr. Musanti entered into a letter agreement, dated as of such date, with the Company pursuant to which it was agreed that the Company would pay Mr. Musanti a one-time severance payment of \$137,500.

Outstanding Equity Awards at 2016 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, 2016.

OPTIONS TO PURCHASE ACORN ENERGY, INC. STOCK

Name	Number of	Number of	Option Exercise	Option Expiration
	Securities	Securities		
	Underlying	Underlying	Price (\$)	Date
	Unexercised	Unexercised		
	Options (#)	Options (#)		
	Exercisable	Unexercisable		

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

Jan H. Loeb	8,333	16,667	(1)	0.20	August 13, 2022
John A. Moore	200,000	—		5.11	January 28, 2017(3)
	50,000	—		7.57	January 28, 2017(3)
	7,500	—		0.14	January 21, 2018
	68,902	—		4.07	January 28, 2017(3)
	281,478	—		0.77	January 28, 2017(3)
Michael Barth	10,000	—		4.09	December 28, 2017
	25,000	—		7.57	December 13, 2019
	26,666	13,334	(2)	1.68	October 2, 2021
Walter Czarnecki	25,000	—		11.42	May 21, 2019
	10,000	—		7.57	December 13, 2019
Joseph Musanti	10,000	—		5.00	June 10, 2017
	10,000	—		5.37	January 11, 2018(4)
	10,000	—		8.83	January 11, 2018(4)
	13,333	—		1.68	January 11, 2018(4)

(1) The options vest 8,333 and 8,334 on August 13, 2017 and 2018, respectively.

(2) The options vest on October 2, 2017.

(3) The options expired on January 28, 2017 in accordance with Mr. Moore's separation agreement (see above).

(4) The options expire on January 11, 2018 in accordance with Mr. Musanti's separation agreement.

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	—	0.13	March 16, 2023
John A. Moore	—	—	—	—
Michael Barth	—	—	—	—
Walter Czarnecki	—	—	—	—
Joseph Musanti	—	—	—	—

Option and Warrant Exercises

On April 21, 2016, Mr. Barth exercised on a cashless basis a total of 16,734 options to purchase common stock of DSIT. He surrendered 2,943 option shares having a fair market value of \$5.99 per share to satisfy the \$1.05 exercise price to purchase 16,734 shares and was issued a net of 13,791 shares of DSIT common stock. None of Messrs. Loeb, Moore, Czarnecki or Musanti exercised any options or warrants during 2016.

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, 2016.

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	\$ —	\$ —	\$ —	\$ —	\$ —
John A. Moore	—	—	—	—	—

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

Michael Barth	—	38,888	(1)	7,655	(2)	—	429,311 (3)
Walter Czarnecki	—	—		—		—	—
Joseph Musanti	—	—		—		—	—

- (1) Represents a contribution to a manager's insurance policy. Such contributions are made on substantially the same basis as those made on behalf of other Israeli executives.

- Represents the dollar value by which the aggregate balance of the manager's insurance policy as of December 31, 2016 is more than the sum of (i) the balance of the manager's insurance policy as of December 31, 2015, and (ii) the employer and employee contributions to the manager's insurance policy during 2016. (Such amounts are estimated – accurate amounts are currently unavailable)

- (3) Represents the aggregate balance of the manager's insurance policy as of December 31, 2016 (such amounts are estimated – accurate amounts are currently unavailable). Such amounts may be withdrawn only at retirement, death or upon termination under certain circumstances.

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.

Michael Barth

Under the terms of the employment arrangement with Mr. Barth, our Chief Financial Officer, we are obligated to make certain payments to fund in part our severance obligations to him. We would be required to pay Mr. Barth an amount equal to 120% of his last month's salary multiplied by the number of years (including partial years) that Mr. Barth worked DSIT. This severance obligation, which is customary for executives of Israeli companies, would be reduced by the amount contributed to certain Israeli pension and severance funds pursuant to Mr. Barth's employment arrangement. As of December 31, 2016, the unfunded portion of these payments was \$78,005. In addition, the arrangement with Mr. Barth provides for an additional payment equal to six times his last month's total compensation, payable at the end of his employment.

The following table describes the potential payments and benefits upon termination of employment for Mr. Barth, as if his employment terminated as of December 31, 2016, 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

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

	Voluntary resignation	Termination not for cause	Change of control	Death or disability
Compensation:				
Base salary	\$30,629 (1)	\$91,887 (2)	\$ —	\$91,887 (2)
Benefits and perquisites:				
Perquisites and other personal benefits	234,911 (3)	312,916 (4)	—	312,916 (4)
Total	\$265,540	\$404,803	\$ —	\$404,803

(1) The \$30,629 represents a lump sum payment of two months' salary due to Mr. Barth.

(2) The \$91,887 represents a lump sum payment of 6 months' salary due to Mr. Barth upon termination without cause or by death or disability.

(3) Includes \$237,201 of severance pay based on the amounts funded in for Mr. Barth's severance in accordance with Israeli labor law. Also includes accumulated, but unpaid vacation days (\$37,014), car benefits (\$2,000) and payments for pension and education funds (\$6,696) less \$48,000 of benefits waived in support of DSIT's operations in 2007.

(4) Includes \$315,206 of severance pay based in accordance with Israeli labor law calculated based on his last month's salary multiplied by the number of years (including partial years) that Mr. Barth worked for us multiplied by 120% in accordance with his contract. Of the \$315,206 due Mr. Barth, we have funded \$237,201 in an insurance fund. Also includes accumulated, but unpaid vacation days (\$37,014), car benefits (\$2,000) and payments for pension and education funds (\$6,696) less \$48,000 of benefits waived in support of DSIT's operations in 2007.

Walter Czarnecki

There are no amounts due to Mr. Czarnecki under any termination scenario.

Compensation of Directors

Compensation of Directors in 2016 and Future Years

In January 2016, the Board of Directors of the Company adopted a revised compensation policy for its non-employee Directors for 2016 and future years, which provides for drastically reduced cash and equity compensation. The Board intends to review non-employee director compensation on an annual basis.

The non-executive Chairman receives 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 non-executive Chairman also receives an annual payment in the amount of \$22,200 per annum to be utilized to pay for an administrative assistant in connection with his duties.

Each non-employee Director (other than the non-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 and to the non-executive Chairman 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 will receive an additional annual retainer of \$10,000; each Audit Committee member other than the chair will receive 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 2016 calendar year, none of the Board members made this election. For the 2017 calendar year, Messrs. Woolard and Jackson elected to receive 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, 2016 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 2016

Name	Fees Earned or Paid in Cash (\$)	Option Awards (\$) (1)	All Other Compensation (\$)	Total (\$)
Christopher E. Clouser	37,000	(2) 3,032	—	40,032
Mannie L. Jackson	15,000	(3) 978	—	15,978
John A. Moore (4)	7,188	(5) 978	—	8,166
Edgar S. Woolard Jr.	17,000	(6) 978	—	17,978
Samuel M. Zentman	25,000	(7) 978	—	25,978

- On April 1, 2016, Christopher E. Clouser, Mannie L. Jackson, John A. Moore, Edgar S. Woolard Jr. and Samuel M. Zentman were each granted 10,000 options to acquire stock in the Company. The options have an exercise price of \$0.14 and expire on January 1, 2023. 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 1.56% (ii) an expected term of 6.4 years (iii) an assumed volatility of 79% and (iv) no dividends. On September 12, 2016,
- (1) Christopher E. Clouser was granted 15,000 options to acquire stock in the Company. The options have an exercise price of \$0.19 and expire on September 12, 2023. 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 1.50% (ii) an expected term of 6.7 years (iii) an assumed volatility of 81% and (iv) no dividends. All options awarded to directors in 2016 remained outstanding at fiscal year-end. As of December 31, 2016, the number of stock options held by each of the above persons was: Christopher E. Clouser, 269,477; Mannie L. Jackson, 193,933; John A. Moore, 607,880; Edgar S. Woolard Jr., 200,187; and Samuel M. Zentman, 130,424.
- (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.
- (3) Represents the annual retainer of \$15,000 as a non-employee director.
- (4) Mr. Moore retired from the Board effective July 21, 2016.
- (5) Represents pro-rata annual director fees from the time Mr. Moore became a non-employee member of the Board until his resignation from the Board.
- (6) 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.
- (7) 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.

Executive Compensation Developments in 2017

Jan H. Loeb

As described above, concurrent with the appointment of Mr. Loeb as President and CEO on January 28, 2016, the Company entered into a consulting arrangement with Leap Tide Capital Management LLC pursuant to which Leap Tide Capital Management LLC provided the services of Mr. Loeb to the Company as President and CEO and such other services as mutually agreed upon with the Company. On February 21, 2017, the Company entered into a new consulting agreement effective January 8, 2017 between the Company and Mr. Loeb extending its arrangements for compensation of Mr. Loeb for his services as President and CEO of the Company. The previous agreement expired on January 7, 2017. Pursuant to the new consulting agreement, Mr. Loeb will continue to receive cash compensation of \$17,000 per month. Mr. Loeb also received a grant 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 the new agreement was entered into). These options vest and become 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 Acorn.

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, 2017 (except as otherwise set forth herein), 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)	(3)	(4)
Jan H. Loeb	1,117,313	3.8	(3)	%
Mannie L. Jackson	884,287	3.0	(5)	%
Samuel M. Zentman	196,869	*	(6)	
Christopher E. Clouser	571,727	1.9	(7)	%
Edgar S. Woolard, Jr.	873,075	3.0	(8)	%
Michael Barth	155,972	*	(9)	
Walter Czarnecki	35,000	—	(10)	
All executive officers and directors of the Company as a group (7 people)	3,834,243	12.7	(13)	%

* 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, 3844 Kennett Pike, Wilmington, Delaware 19807.

(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 29,367,019 shares outstanding as of March 22, 2017.

(3) Consists of 1,056,480 shares held by Mr. Loeb, 25,833 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 each of Leap Tide Capital Partners III, LLC and Leap Tide Capital Management LLC, with sole voting and dispositive power over the securities held by each entity. Mr. Loeb disclaims beneficial ownership of the securities except to the extent of his pecuniary interest therein.

(5) Consists of 685,354 shares (88,100 of which are held in a trust) and 198,933 shares underlying currently exercisable options.

- (6) Consists of 61,445 shares and 135,424 shares underlying currently exercisable options.
- (7) Consists of 293,500 shares (77,862 of which are held in a trust) and 278,227 shares underlying currently exercisable options.

Consists of 701,222 shares and 171,853 shares underlying currently exercisable options. Mr. Woolard also owns
- (8) 2,000 shares of Series A Preferred Stock of OMX Holdings Inc. representing a 20% interest in OMX Holdings Inc.
- (9) Consists of 94,306 shares and 61,666 shares underlying currently exercisable options. Mr. Barth also owns 36,731 shares of DSIT representing approximately 1.7% of DSIT's shares.
- (10) Consists solely of currently exercisable options.
- (11) Consists of 2,892,307 shares, 906,936 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, 2016.

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	1,809,990	\$ 3.52	979,650
Equity Compensation Plans Not Approved by Security Holders	2,894,802	\$ 1.71	—
Total	4,704,792	\$ 2.40	979,650

The grants made under our equity compensation plans not approved by security holders includes 200,000 options which were granted under our 2006 Stock Incentive Plan during the period from the adoption of such plan in January 2007 and the date of the approval of such plan by stockholders in November 2008, and 40,379 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 three year period and expire five to ten years from the date of the grant. The grants made under our equity compensation plans not approved by security holders also includes 2,654,423 warrants issued as compensation to underwriters for services provided in connection capital raise transactions.

ITEM 13. CERTAIN RELATIONSHIPS, RELATED TRANSACTIONS AND DIRECTOR INDEPENDENCE

Transactions With Related Persons

Loans from Directors

In January 2016, Acorn borrowed a total of \$300,000 from two of its directors (\$200,000 from Edgar S. Woolard, Jr., and \$100,000 from an LLC owned by Mannie L. Jackson) under promissory notes which mature three days following the receipt of proceeds from the closing of the DSIT Transaction. In March 2016, Acorn borrowed, on similar terms, an additional \$75,000 from its Chairman, Christopher E. Clouser. Upon maturity, Acorn is to pay to each director a single payment equal to 115% of the amounts borrowed under the promissory notes. Mr. Clouser agreed to lend the Company up to an additional \$75,000 upon request by the Company under similar terms.

On April 29, 2016, following the receipt of the net proceeds from the DSIT Transaction, the Company repaid in full \$275,000 (\$200,000 from Mr. Woolard and \$75,000 from Mr. Clouser) the principal amount of the promissory notes plus interest equal to 15% (\$30,000 and \$11,250, respectively) of the amounts borrowed under the promissory notes. In addition, the LLC owned by Mannie L. Jackson, elected to convert the \$100,000 of principal and the \$15,000 of interest due into Common Stock of the Company. In accordance with the terms of the promissory note, the director received 465,587 shares of Common Stock of the Company.

OmniMetrix

On October 16, 2015, Mr. Woolard acquired a 10% interest in Acorn's 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.

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 Common Stock. The dividend is payable in cash or in the form of additional shares of OmniMetrix Preferred Stock at the election of the holder of the Preferred Stock. 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 may agree to treat future accrued dividends) as a loan to OmniMetrix which bear interest at 8% per year. All amounts due (principal and interest) are 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 as his pro-rata share of Acorn loans to OmniMetrix under the same terms as the abovementioned accrued dividends.

The OmniMetrix Preferred Stock may convert at the option of the holder of the OmniMetrix Preferred Stock on a one-for-one basis into 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.

See Recent Developments for new Director Loans to Acorn.

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.

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, 2016 and 2015.

	2016	2015
Audit Fees	\$ 160,000	\$ 190,000
Audit - Related Fees	15,000	13,000
All Other Fees	—	—
Total	\$ 175,000	\$ 203,000

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 2016 and 2015.

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, 2015 and 2016	F-2
Consolidated Statements of Operations	F-3
Consolidated Statements of Comprehensive Loss	F-4
Consolidated Statements of Changes in Equity	F-5
Consolidated Statements of Cash Flows	F-6
Notes to Consolidated Financial Statements	F-8

(a)(3) List of Exhibits

No.

- #3.1 Amended and Restated Certificate of Incorporation of the Registrant.
- 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 Promissory Note, dated January 14, 2016, of Acorn Energy, Inc., in favor of Edgar S. Woolard (incorporated herein by reference to Exhibit 4.2 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
- 4.9 Promissory Note, dated January 15, 2016, of Acorn Energy, Inc., in favor of Visionary Enhancement, LLC (incorporated herein by reference to Exhibit 4.3 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
- 4.10 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).
- 4.11

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

Promissory Note, dated March 28, 2016, of Acorn Energy, Inc., in favor of Christopher Clouser (incorporated herein by reference to Exhibit 4.5 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).

4.12 Promissory Note Amendment, dated March 28, 2016, to Promissory Note dated January 14, 2016, of Acorn Energy, Inc., in favor of Edgar S. Woolard (incorporated herein by reference to Exhibit 4.6 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).

4.13 Promissory Note Amendment, dated March 28, 2016, to Promissory Note dated January 15, 2016, of Acorn Energy, Inc., in favor of Visionary Enhancement, LLC (incorporated herein by reference to Exhibit 4.7 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. 2006 Stock Incentive Plan (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).*
- 10.3* Forms of Option Award Certificate and Option Award Agreement under the Registrant's Amended and Restated 2006 Stock Incentive Plan (incorporated herein by reference to Exhibit 10.52 to Registrant's Annual Report on Form 10-K for the year ended December 31, 2009).
- 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 Amended and Restated Investors Rights Agreement by and among the Registrant, US Sensor Systems Inc. and other parties named therein dated as of February 23, 2010 (incorporated herein by reference to Exhibit 10.4 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2010).
- 10.6* 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).
- 10.7* 2012 Stock Plan for US Seismic Systems, Inc. (incorporated herein by reference to Exhibit 10.5 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2012).
- 10.8* Form of US Seismic Systems, Inc. 2012 Stock Plan Notice of Incentive Stock Option Grant (incorporated herein by reference to Exhibit 10.6 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2012).
- 10.9* Form of US Seismic Systems, Inc. 2012 Stock Plan Notice of Non-Statutory Stock Option Grant (incorporated herein by reference to Exhibit 10.7 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2012).
- 10.10 Amended and Restated Stockholders' Agreement by and among US Seismic Systems, Inc., Registrant and the other parties named therein dated March 19, 2012 (incorporated herein by reference to Exhibit 10.8 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2012).
- 10.11* Employment Agreement, dated as of December 13, 2012, by and between Acorn Energy, Inc. and John A. Moore (incorporated herein by reference to Exhibit 10.68 to Registrant's Annual Report on Form 10-K for the year ended December 31, 2012).
- 10.12* GridSense Employee Incentive Plan (incorporated herein by reference to Exhibit 10.1 of Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2013).
- 10.13* Form of award for GridSense Employee Incentive Plan (incorporated herein by reference to Exhibit 10.2 of Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2013).

10.14* GridSense Employment Agreement with Joseph Musanti (incorporated herein by reference to Exhibit 10.2 of Registrant's Quarterly Report on Form 10-Q for the quarter ended June 30, 2013).

64

- 10.15* Secondment of Joseph Musanti to US Seismic Systems, Inc. (incorporated herein by reference to Exhibit 10.3 of Registrant's Quarterly Report on Form 10-Q for the quarter ended June 30, 2013).
- 10.16* Amendment to Employment Agreement - Benny Sela (amendment to Hebrew-language original summarized under Item 11 in this Annual Report) (incorporated herein by reference to Exhibit 10.4 of Registrant's Quarterly Report on Form 10-Q for the quarter ended June 30, 2013).
- 10.17* 2006 DSIT Key Employee Option plan - As Amended (incorporated herein by reference to Exhibit 10.5 of Registrant's Quarterly Report on Form 10-Q for the quarter ended June 30, 2013).
- 10.18* Form of Stock Option Agreement to employees under the DSIT 2006 Key Employee Share Option Plan (incorporated herein by reference to Exhibit 10.6 of Registrant's Quarterly Report on Form 10-Q for the quarter ended June 30, 2013).
- 10.19* Amendment to Employment Agreement between the Registrant and John A. Moore, effective as of November 11, 2013 (incorporated herein by reference to Exhibit 10.33 to the Registrant's Annual report on Form 10-K for the year ended December 31, 2013).
- 10.20* 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).
- 10.21* 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, 2014).
- 10.22 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).
- 10.23 Form of Lockup Agreement (incorporated herein by reference to Exhibit 10.2 of the Registrant's Current Report on Form 8-K/A filed November 6, 2014).
- 10.24 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).
- 10.25 Loan and Security Agreement by and between Square 1 Bank and GridSense Inc. dated as of November 2, 2012 (incorporated herein by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.26 First Amendment to Loan and Security Agreement by and between Square 1 Bank and GridSense Inc. dated as of February 26, 2013 (incorporated herein by reference to Exhibit 10.2 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.27 Second Amendment to Loan and Security Agreement by and between Square 1 Bank and GridSense Inc. dated as of August 13, 2013 (incorporated herein by reference to Exhibit 10.3 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.28

Subordination Agreement by and between the Registrant and Square 1 Bank dated as of August 13, 2013 (incorporated herein by reference to Exhibit 10.4 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).

10.29 Third Amendment to Loan and Security Agreement by and between Square 1 Bank and GridSense Inc. dated as of November 8, 2013 (incorporated herein by reference to Exhibit 10.5 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).

- 10.30 Fourth Amendment to Loan and Security Agreement by and between Square 1 Bank and GridSense Inc. dated as of December 30, 2013 (incorporated herein by reference to Exhibit 10.6 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.31 Unconditional Guaranty of the Registrant in favor of Square 1 Bank dated as of December 30, 2013 (incorporated herein by reference to Exhibit 10.7 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.32 Fifth Amendment to Loan and Security Agreement by and between Square 1 Bank and GridSense Inc. dated as of June 30, 2014 (incorporated herein by reference to Exhibit 10.8 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.33 Sixth Amendment to Loan and Security Agreement by and between Square 1 Bank and GridSense Inc. dated as of July 16, 2014 (incorporated herein by reference to Exhibit 10.9 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.34 Financing Agreement by and between GridSense Inc. and Square 1 Bank dated as of July 16, 2014 (incorporated herein by reference to Exhibit 10.10 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.35 Seventh Amendment to Loan and Security Agreement by and between Square 1 Bank and GridSense Inc. dated as of April 23, 2015 (incorporated herein by reference to Exhibit 10.11 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.36 Amendment to and Affirmation of Unconditional Guaranty of the Registrant in favor of Square 1 Bank dated as of April 23, 2015 (incorporated herein by reference to Exhibit 10.12 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.37 Affirmation of Subordination Agreement by and between the Registrant and Square 1 Bank dated as of April 23, 2015 (incorporated herein by reference to Exhibit 10.13 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.38 Pledge and Security Agreement by and between the Registrant and Square 1 Bank dated as of April 23, 2015 (incorporated herein by reference to Exhibit 10.14 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.39 Letter Agreement by and among Square 1 Bank, the Registrant and GridSense Inc. dated as of April 30, 2015 (incorporated herein by reference to Exhibit 10.15 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2015).
- 10.40 Loan and Security Agreement, dated as of August 13, 2015, by and between the Registrant, GridSense Inc., OMX Holdings Inc., OmniMetrix, LLC, Leap Tide Capital Partners III, LLC and the Guarantors as defined therein (incorporated herein by reference to Exhibit 10.1 to Amendment No.1 on Form 10-Q/A to the Registrant's Quarterly Report on Form 10-Q for the quarter ended September 30, 2015, filed on February 3, 2016).
- 10.41 Intellectual Property Security Agreement, dated as of August 13, 2015, by and between the Registrant, GridSense Inc., OmniMetrix, LLC, and Leap Tide Capital Partners III, LLC (incorporated herein by reference

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

to Exhibit 10.2 to Amendment No.1 on Form 10-Q/A to the Registrant's Quarterly Report on Form 10-Q for the quarter ended September 30, 2015, filed on February 3, 2016).

10.42 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).

10.43* Consulting Agreement, dated as of January 8, 2016, by and between Acorn Energy, Inc. and Leap Tide Capital Management LLC (incorporated herein by reference to Exhibit 10.2 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).

- 10.44 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).
- 10.45* Separation Agreement between John A. Moore and Acorn Energy, Inc., dated as of January 28, 2016 (incorporated herein by reference to Exhibit 10.4 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
- 10.46 Letter Agreement, dated as of March 28, 2016, between Acorn Energy, Inc. and Christopher Clouser (incorporated herein by reference to Exhibit 10.5 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2016).
- 10.47 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).
- 10.48 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).
- 10.49 Asset Purchase Agreement, dated as of July 11, 2016, between Acorn Energy, Inc., GridSense, Inc. and Franklin Fueling Systems, Inc. (incorporated by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q for the quarter ended September 30, 2016).
- #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, 2016, filed on March 29, 2017, 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 29, 2017.

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
<i>/s/ Jan H. Loeb</i> Jan H. Loeb	President; Chief Executive Officer; and Director (Principal Executive Officer)	March 29, 2017
<i>/s/ Michael Barth</i> Michael Barth	Chief Financial Officer (Principal Financial Officer and Principal Accounting Officer)	March 29, 2017
<i>/s/ Christopher E. Clouser</i> Christopher E. Clouser	Director and Chairman of the Board	March 29, 2017
<i>/s/ Mannie L. Jackson</i> Mannie L. Jackson	Director	March 29, 2017
<i>/s/ Edgar S. Woolard Jr.</i> Edgar S. Woolard Jr.	Director	March 29, 2017
<i>/s/ Samuel M. Zentman</i> Samuel M. Zentman	Director	March 29, 2017

ACORN ENERGY, INC. AND SUBSIDIARIES

INDEX TO CONSOLIDATED FINANCIAL STATEMENTS

<u>Report of Independent Registered Public Accounting Firm</u>	F-1
<u>Consolidated Balance Sheets</u>	F-2
<u>Consolidated Statements of Operations</u>	F-3
<u>Consolidated Statements of Comprehensive Income (Loss)</u>	F-4
<u>Consolidated Statements of Changes in Equity</u>	F-5
<u>Consolidated Statements of Cash Flows</u>	F-6
<u>Notes to Consolidated Financial Statements</u>	F-8

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Board of Directors and Shareholders of

Acorn Energy, Inc.

We have audited the accompanying consolidated balance sheets of Acorn Energy, Inc. and its subsidiaries (the “Company”) as of December 31, 2016 and 2015 and the related consolidated statements of operations, comprehensive (income) loss, changes in equity, and cash flows for each of the years in the two-year period ended December 31, 2016. The Company’s management is responsible for these financial statements. Our responsibility is to express an opinion on these financial statements based on our audits.

We conducted our audits in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. The Company is not required to have, nor were we engaged to perform, an audit of its internal control over financial reporting. Our audit included consideration of internal control over financial reporting as a basis for designing audit procedures that are appropriate in the circumstances, 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. An audit also includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the financial statements referred to above present fairly, in all material respects, the financial position of the Company as of December 31, 2016 and 2015 and the results of its operations and its cash flows for each of years in the two-year period ended December 31, 2016 in conformity with accounting principles generally accepted in the United States of America.

/s/ Friedman LLP
East Hanover, New Jersey
March 29, 2017

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

	As of	
	December 31,	
	2016	2015
ASSETS		
Current assets:		
Cash and cash equivalents	\$222	\$124
Restricted deposits	—	2,172
Escrow deposit	579	100
Accounts receivable, net	1,005	6,389
Unbilled revenue	—	3,849
Inventory, net	202	506
Other current assets	932	1,633
Investment in DSIT	5,658	—
Current assets – discontinued operations	119	1,079
Total current assets	8,717	15,852
Property and equipment, net	214	954
Severance assets	—	3,558
Restricted deposits	—	2,951
Goodwill	—	516
Other assets	309	470
Non-current assets – discontinued operations	—	29
Total assets	\$9,240	\$24,330
LIABILITIES AND EQUITY		
Current liabilities:		
Short-term bank credit and current maturities of long-term debt	\$376	\$1,916
Leap Tide loan payable, net of discount	—	1,900
Accounts payable	708	2,346
Accrued payroll, payroll taxes and social benefits	327	1,320
Deferred revenue	2,149	5,251
Other current liabilities	629	2,260
Current liabilities – discontinued operations	997	1,827
Total current liabilities	5,186	16,820
Long-term liabilities:		
Accrued severance	—	4,984
Other long-term liabilities	831	849
Due to Acorn director	165	—
Due to DSIT	1,171	—
Non-current liabilities – discontinued operations	—	19
Total long-term liabilities	2,167	5,852
Commitments and contingencies (Note 15)		

Equity:

Acorn Energy, Inc. shareholders		
Common stock - \$0.01 par value per share:		
Authorized – 42,000,000 shares; Issued – 30,124,494 and 28,127,511 shares at December 31, 2016 and 2015, respectively	301	281
Additional paid-in capital	99,767	98,977
Warrants	1,600	1,597
Accumulated deficit	(97,046)	(97,191)
Treasury stock, at cost – 801,920 shares at December 31, 2016 and 2015	(3,036)	(3,036)
Accumulated other comprehensive loss	(254)	(262)
Total Acorn Energy, Inc. shareholders' equity	1,332	366
Non-controlling interests	555	1,292
Total equity	1,887	1,658
Total liabilities and equity	\$9,240	\$24,330

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,	
	2016	2015
Revenue	\$8,659	\$16,548
Cost of sales	5,134	10,381
Gross profit	3,525	6,167
Operating expenses:		
Research and development expenses, net	927	1,705
Selling, general and administrative expenses	5,651	9,632
Total operating expenses	6,578	11,337
Operating loss	(3,053)	(5,170)
Finance expense, net	(572)	(327)
Gain on sale of interest in DSIT, net of transaction costs	3,543	--
Loss before income taxes	(82)	(5,497)
Income tax expense	(19)	(209)
Net loss after income taxes	(101)	(5,706)
Share of income in DSIT	268	--
Income (loss) before discontinued operations	167	(5,706)
Loss from discontinued operations, net of income taxes	(286)	(5,096)
Net loss	(119)	(10,802)
Non-controlling interest share of loss – continuing operations	264	105
Non-controlling interest share of loss - discontinued operations	--	98
Net income (loss) attributable to Acorn Energy, Inc. shareholders.	\$145	\$(10,599)
Basic and diluted net income (loss) per share attributable to Acorn Energy, Inc. shareholders:		
From continuing operations	\$0.02	\$(0.21)
From discontinued operations	(0.01)	(0.19)
Net income (loss) per share attributable to Acorn Energy, Inc. shareholders	\$0.01	\$(0.40)
Weighted average number of shares outstanding attributable to Acorn Energy, Inc. shareholders – basic	28,488	26,803
Weighted average number of shares outstanding attributable to Acorn Energy, Inc. shareholders –diluted	28,531	26,803

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

F-3

ACORN ENERGY, INC. AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME (LOSS)

(IN THOUSANDS)

	Year ended December 31,	
	2016	2015
Net income (loss) attributable to Acorn Energy, Inc. shareholders	\$ 145	\$(10,599)
Other comprehensive income (loss):		
Foreign currency translation adjustments	6	(36)
Comprehensive income (loss)	151	(10,635)
Other comprehensive income (loss) attributable to non-controlling interests	2	(14)
Comprehensive income (loss) attributable to Acorn Energy, Inc. shareholders	\$ 153	\$(10,649)

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

F-4

ACORN ENERGY, INC. AND SUBSIDIARIES

CONSOLIDATED STATEMENTS OF CHANGES IN 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' Equity	Non-controlling interests	Total Equity
Balances as of December 31, 2014	27,278	\$ 272	\$ 97,607	\$ 1,641	\$ (86,592)	\$ (3,036)	\$ (212)	\$ 9,680	\$ (3,287)	\$ 6,393
Net loss	—	—	—	—	(10,599)	—	—	(10,599)	(203)	(10,802)
Differences from translation of subsidiaries' financial statements	—	—	—	—	—	—	(50)	(50)	14	(36)
Deconsolidation of USSI (see Note 4(b))	—	—	541	—	—	—	—	541	3,700	4,241
Expiration of warrants	—	—	44	(44)	—	—	—	—	—	—
Initial shares in Leap Tide transaction (see Note 5)	850	9	153	—	—	—	—	162	—	162
Reversal of adjustment for insufficient authorized shares	—	—	50	—	—	—	—	50	—	50
Investment in OmniMetrix preferred shares	—	—	—	—	—	—	—	—	1,000	1,000
Accrued dividend in OmniMetrix preferred shares	—	—	—	—	—	—	—	—	(15)	(15)
Stock option compensation	—	—	582	—	—	—	—	582	—	582
	—	—	—	—	—	—	—	—	83	83

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

Stock option compensation of subsidiaries										
Balances as of December 31, 2015	28,128	281	98,977	1,597	(97,191)	(3,036)	(262)	366	1,292	1,658
Net income (loss)	—	—	—	—	145	—	—	145	(264)	(119)
Differences from translation of subsidiaries' financial statements	—	—	—	—	—	—	8	8	(2)	6
Conversion of loan to Common Stock (see Note 19)	466	5	110	—	—	—	—	115	—	115
Shares issued in connection with loan from Leap Tide (see Note 5)	1,531	15	352	—	—	—	—	367	—	367
Deconsolidation of DSIT (see Note 3)	—	—	242	—	—	—	—	242	(371)	(129)
Accrued dividend in OmniMetrix preferred shares	—	—	—	—	—	—	—	—	(100)	(100)
Warrants issued	—	—	(3)	3	—	—	—	—	—	—
Stock option compensation	—	—	89	—	—	—	—	89	—	89
Balances as of December 31, 2016	30,125	\$ 301	\$ 99,767	\$ 1,600	\$ (97,046)	\$ (3,036)	\$ (254)	\$ 1,332	\$ 555	\$ 1,887

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

ACORN ENERGY, INC. AND SUBSIDIARIES**CONSOLIDATED STATEMENTS OF CASH FLOWS****(IN THOUSANDS)**

	2016	2015
Cash flows used in operating activities:		
Net loss	\$(119)	\$(10,802)
Adjustments to reconcile net loss to net cash used in operating activities (see Schedule A)	(3,444)	12,989
Net cash provided by (used in) operating activities – continuing operations	(3,563)	2,187
Net cash used in operating activities – discontinued operations	(956)	(3,168)
Net cash used in operating activities	(4,519)	(981)
Cash flows provided by (used in) investing activities:		
Acquisitions of property and equipment	(33)	(159)
Restricted deposits	(75)	(5,071)
Release of restricted deposits	868	1,065
Proceeds from the sale of interests in DSIT, net of transaction costs and cash divested	3,947	—
Escrow deposits	(579)	(100)
Release of escrow deposits	100	—
Amounts funded for severance assets	(69)	(164)
Net cash provided by (used in) investing activities – continuing operations	4,159	(4,429)
Net cash provided by investing activities – discontinued operations	900	720
Net cash provided by (used in) investing activities	5,059	(3,709)
Cash flows provided by (used in) financing activities:		
Short-term bank credit, net	1,156	(590)
Proceeds from Leap Tide transaction	—	2,000
Repayment of Leap Tide loan	(2,000)	—
Proceeds from director loans	425	—
Repayment of director loans	(275)	—
Proceeds from outside investment in OmniMetrix	—	1,000
Proceeds from the exercise of DSIT options	391	—
Repayments of long-term debt	(43)	(129)
Net cash provided by (used in) financing activities – continuing operations	(346)	2,281
Net cash used in financing activities – discontinued operations	(138)	(2,182)
Net cash provided by (used in) financing activities	(484)	99
Effect of exchange rate changes on cash and cash equivalents – continuing operations	(5)	50
Effect of exchange rate changes on cash and cash equivalents – discontinued operations	18	(160)
Net increase (decrease) in cash and cash equivalents	69	(4,701)
Cash and cash equivalents at beginning of year – discontinued operations	48	192
Cash and cash equivalents at beginning of year – continuing operations	124	4,681
Cash and cash equivalents at end of year – discontinued operations	19	48
Cash and cash equivalents at end of year – continuing operations	\$222	\$124

Supplemental cash flow information:

Cash paid during the year for:

Interest	\$323	\$223	
Income taxes, net of refunds	\$4	\$(26)

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

F-6

ACORN ENERGY, INC. AND SUBSIDIARIES**CONSOLIDATED STATEMENTS OF CASH FLOWS****(IN THOUSANDS)**

	2016	2015
A. Adjustments to reconcile net loss to net cash provided by (used in) operating activities:		
Loss from discontinued operations	\$286	\$4,695
Depreciation and amortization	146	314
Accretion of Leap Tide discount	100	62
Common stock issued for Leap Tide interest accrued	281	—
Conversion to common stock of interest due to director	15	—
Gain on sale of interests in DSIT, net of income taxes and transaction costs	(3,543)	—
Share of income in DSIT	(268)	—
Change in deferred taxes	18	258
Inventory write-down	9	22
Increase in liability for accrued severance	67	245
Stock-based compensation	89	661
Deconsolidation of USSI	—	401
Other	35	(2)
Changes in operating assets and liabilities:		
Decrease (increase) in accounts receivable	218	(2,235)
Decrease (increase) in unbilled revenue	(949)	4,041
Increase in inventory	(2)	(19)
Decrease (increase) in other current assets and other assets	(170)	55
Increase (decrease) in deferred revenue	(863)	3,640
Increase in accounts payable, accrued payroll, payroll taxes and social benefits, other current and non-current liabilities	1,087	851
	\$(3,444)	\$12,989
B. Non-cash investing and financing activities:		
Adjustment of paid-in-capital and non-controlling interest from the deconsolidation of DSIT	\$242	
Conversion of director loan and interest to common stock	\$115	
Investment in DSIT from deconsolidation	\$5,390	
Liability for insufficient number of authorized shares in capital raise	\$—	\$(50)
Value of Initial Shares (discount) in Leap Tide transaction		\$162
Adjustment of paid-in-capital and non-controlling interest from the deconsolidation of USSI		\$541
Accrued preferred dividends to outside investor in OmniMetrix subsequently converted to long-term loan	\$100	\$15

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. Each of its businesses are focused on helping its customers achieve greater productivity, reliability, security and efficiency.

The Company provides the following services and products:

Power Generation (“PG”) and Corrosion Protection (“CP”) monitoring. These products and services are provided by the Company’s OmniMetrix™, LLC (“OmniMetrix”) subsidiary. OmniMetrix’s PG activities provide wireless remote monitoring and control systems and services for critical assets as well as Internet of Things applications. Its CP activities provide for remote monitoring of cathodic protection systems on gas pipelines for gas utilities and pipeline companies.

Energy & Security Sonar Solutions. The Company 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 such as Hull Mounted Sonar systems (“HMS”) for surface ships and real-time embedded hardware and software development and production through DSIT Solutions Ltd. (“DSIT”) equity investment (see below). DSIT also has certain IT activities (protocol management software for cancer patients and billing software) and outsourced consulting activities.

On April 21, 2016, the Company closed on a transaction for the sale of a portion of its interests in DSIT Solutions, Ltd. (the “DSIT Transaction” - see Note 3). As a result of the transaction, the Company’s holdings in DSIT were reduced from 78.7% (on a fully diluted basis) to 41.2% and, subsequent to the DSIT Transaction, the Company has limited representation on the DSIT Board of directors. Accordingly, following the sale, the Company no longer consolidates the assets, liabilities or results of DSIT. Operating results for DSIT through April 21, 2016 are consolidated in continuing operations while the Company’s share of DSIT’s results for the period from April 22, 2016 to December 31, 2016 are included in the Company’s Consolidated Statements of Operations in the line “Share of income in DSIT” under the equity method of accounting.

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

See Note 20 for segment information and major customers.

(b) Liquidity

As of December 31, 2016, the Company had less than \$100 of non-escrow corporate cash and cash equivalents. In February 2017, the Company borrowed \$900 from three of its directors and received a commitment from a director that would allow the Company to borrow up to an additional \$1,000 on or after July 7, 2017 under certain conditions (see Note 22 – Subsequent Events). Such cash, together with the expected October 2017 receipt of escrowed funds from the DSIT Transaction (see Note 3) and reduced cash need from OmniMetrix based on their expected continued growth, is expected to finance the Company's operations through at least the first quarter of 2018. The abovementioned director loans are due to be repaid at the earlier of April 30, 2018 or upon the sale of our remaining 41.2% interest DSIT which the Company is currently pursuing.

Based on the above, the Company has sufficient cash to finance its operations for the next year. However, the Company may need to seek additional sources of funding if both of the following were to occur: (i) a failure by OmniMetrix to grow at the rate anticipated that necessitates additional funds for their operations, and (ii) the receipt of the escrowed funds from the DSIT sale is less than the Company anticipates. Additional sources of funding may include additional loans from related and/or non-related parties, a sale of our DSIT investment, a sale, partial sale 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 the Company will be able to successfully utilize any of these possible sources to provide additional liquidity.

(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 percentages of completion with respect to revenue recognition, uncertainties with respect to income taxes, inventories, contingencies and analyses of the possible impairments.

(e) Amounts in the footnotes in the Financial Statements

All dollar amounts in the footnotes of 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.

On April 21, 2016 (the “Closing Date”), the Company closed on a transaction (the “DSIT Transaction”) initially entered into on January 28, 2016 for the sale of a portion of its interests DSIT Solutions, Ltd. business to Rafael Advanced Defense Systems Ltd. (“Rafael”), a major Israeli defense company (see Note 3). As a result of the DSIT Transaction, the Company’s holdings in DSIT were reduced from 78.7% to 41.2%, and subsequent to the DSIT Transaction, the Company has limited representation on the DSIT Board of directors. Accordingly, after the Closing Date, the Company no longer consolidates the results of DSIT.

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(a)).

In March 2015, the Company announced that it stopped funding USSI and that USSI had effectively suspended operations and terminated substantially all employees. On September 28, 2015, the Board of Directors of USSI approved a motion to file a voluntary petition for protection under Chapter 7 of the United States Bankruptcy Code (a “Chapter 7 Bankruptcy”). On September 30, 2015, USSI filed for a Chapter 7 Bankruptcy. Accordingly, effective September 30, 2015, the Company no longer consolidates the assets, liabilities or operating results of USSI (see Note 4(b)).

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, in the Consolidated Statements of Operations when they arise.

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, 2016 and 2015, \$28 and \$44 was charged to expense, respectively. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the operating results of DSIT. At December 31, 2016 and 2015, the balance in allowance for doubtful accounts was \$11 and \$20, respectively. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the allowance for doubtful accounts of DSIT.

Inventory

Inventories are comprised of components (raw materials), work-in-process and finished goods, which are measured at the lower of cost or market.

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.

DSIT - Raw materials inventory is comprised of arrays and receivers related to diver detection sonar ("DDS") and portable diver detection sonar ("PDDS") systems. Work-in-process inventory is primarily comprised of PDDS systems that have commenced with assembly as well as capitalized labor and overhead. Costs are determined at cost of acquisition on a weighted average basis and include all outside production and shipping costs. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the inventory of DSIT.

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 income and losses to the non-controlling interests associated with DSIT (up to the DSIT Transaction – see Note 3), OmniMetrix and USSI (up through its deconsolidation in September 2015 – See Note 4(b)).

Property and Equipment

Property and equipment are presented at cost at the date of acquisition. Depreciation and amortization is 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.

Goodwill

The Company assesses annually whether there is an indication that goodwill is impaired, or more frequently if events and circumstances indicate that the asset might be impaired during the year. The Company performs its annual impairment test in the fourth quarter of each year.

Application of the goodwill impairment test requires judgment, including the identification of reporting units, assignment of assets and liabilities to reporting units, assignment of goodwill to reporting units, and determination of the fair value of each reporting unit. The Company identified its operating segments as its reporting units for purposes of the impairment test. The Company's goodwill at December 31, 2015 was associated with its Energy & Security Sonar Solutions segment. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company eliminated this goodwill as part of the deconsolidation of DSIT.

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 Company recognizes revenue when persuasive evidence of an arrangement exists, services have been rendered, the price is fixed or determinable, and collectability is reasonably assured.

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 have multiple elements which include the sale of equipment and of monitoring services. Sales of OmniMetrix equipment do not qualify as a separate unit of accounting. As a result, revenues (and related costs) associated with sale of equipment are recorded to deferred revenue (and deferred charges) upon shipment for PG and CP units. Revenue and related costs with respect to the sale of equipment are recognized over the estimated life of the customer relationship which is estimated to be 24 months. Revenues from the

prepayment of monitoring fees (generally paid 12 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.

Revenue from fixed-price contracts at DSIT which require significant production, modification and/or customization to customer specifications are recognized using the percentage-of-completion method. Percentage-of-completion estimates are in man-months of labor and are reviewed periodically, and any adjustments required are reflected in the period when such estimates are revised. Losses on contracts, if any, are recognized in the period in which the loss is determined. Revenue from DSIT's consulting, time-and-materials service contracts, maintenance agreements and other services are recognized as services are provided. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the revenue of DSIT.

Unbilled Revenue

Revenue may be earned by DSIT for those services in advance of amounts billable to the customer and are recognized when the service is performed. Revenues recognized in excess of amounts billed for projects in process are recorded as unbilled revenue. Such amounts are generally billed upon the completion of a project milestone. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the unbilled revenue of DSIT.

Warranty Provision

The Company's OmniMetrix subsidiary generally grants their customers a one-year warranty on their respective products. DSIT generally grants its customers a one-to-two-year warranty on its projects. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the warranty provision of DSIT.

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, cash equivalents and escrow deposits were deposited primarily with U.S. banks and brokerage firms and amounted to \$801 at December 31, 2016. The Company does not believe there is significant risk of non-performance by these counterparties. See Note 20(d) with respect to revenue from significant customers and concentrations of trade accounts receivables and unbilled revenue.

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. Participation by third parties in the Company's research and development costs as well as credits arising from qualifying research and experimental development expenditures are netted against research and development. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the research and development expenses of DSIT.

Advertising Expenses

Advertising expenses are charged to operations as incurred. Advertising expense was \$9 and \$20 for each of the years ended December 31, 2016 and 2015, respectively. Following the DSIT Transaction (see Note 3), the Company no longer consolidates the advertising expenses of DSIT.

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, we recognize 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 16(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 current or non-current based on the classification of the related assets or liabilities for financial reporting, or according to the expected reversal dates of the specific temporary differences, if not related to an asset or liability for financial reporting. 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. At December 31, 2015, U.S. income taxes were not provided on undistributed earnings of the Company's then DSIT subsidiary because such earnings were reinvested in foreign operations. If those earnings were repatriated to the U.S., the Company would not expect to owe additional U.S. income taxes due to the utilization of net operating loss carryovers.

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

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

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 4,904,000 and 5,001,000 for the years ending December 31, 2016 and 2015, 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,	
	2016	2015
Net income (loss) available to common stockholders	\$ 145	\$(10,599)
Weighted average shares outstanding:		
-Basic	28,488	26,803
Add: Warrants	24	—
Add: Stock options	19	—
-Diluted	28,531	26,803
Basic and diluted net income (loss) per share	\$0.01	\$(0.40)

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.

See Notes 16, 21 and 22.

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, 2016, that are of material significance, or have potential material significance, to the Company.

In May 2014, the FASB issued ASU No. 2014-09, Revenue from Contracts with Customers (Topic 606). The comprehensive new standard will supersede existing revenue recognition guidance and require revenue to be recognized when promised goods or services are transferred to customers in amounts that reflect the consideration to which the company expects to be entitled in exchange for those goods or services. Adoption of the new rules could affect the timing of revenue recognition for certain transactions. The guidance permits two implementation approaches, one requiring retrospective application of the new standard with adjustment of prior years and one requiring prospective application of the new standard with disclosure of results under old standards. The FASB issued several subsequent standards in 2016 containing implementation guidance related to the new standard. These standards provide additional guidance related to principal versus agent considerations, licensing, and identifying performance obligations. Additionally, these standards provide narrow-scope improvements and practical expedients as well as technical corrections and improvements. Overall, the new guidance is to be effective for the fiscal year beginning after December 15, 2017. Companies are able to early adopt the pronouncement, however not before fiscal years beginning after December 15, 2016. The Company currently anticipates that it will adopt this standard using the modified retrospective method. The Company is creating an implementation team to provide training and to review contracts to assess the impact, if any, the new revenue standard will have on its consolidated financial statements. The Company is monitoring for any additional implementation or other guidance that may be issued in 2017 with respect to the new revenue standard and adjust its assessment and implementation plans accordingly.

In August 2014, the FASB issued ASU No. 2014-15 —Presentation of Financial Statements—Going Concern (Subtopic 205-40): Disclosure of Uncertainties about an Entity’s Ability to Continue as a Going Concern. The ASU requires management to evaluate whether there are conditions and events that raise substantial doubt about the entity’s ability to continue as a going concern within one year after the financial statements are issued and if management’s plans will alleviate that doubt. Management will be required to make this evaluation for both annual and interim reporting periods. The Company adopted this guidance for the fiscal year ended December 31, 2016. This adoption did not have a material impact on the Company’s consolidated financial statements.

In July 2015, the FASB issued ASU No. 2015-11, Inventory (Topic 330): Simplifying the Measurement of Inventory. This accounting standard that requires inventory be measured at the lower of cost and net realizable value and options that currently exist for measuring inventory at market value be eliminated. The standard defines net realizable value as estimated selling prices in the ordinary course of business, less reasonably predictable costs of completion, disposal, and transportation and is effective for reporting periods beginning after December 15, 2016 and interim periods within those fiscal years with early adoption permitted. The guidance should be applied prospectively. The Company is evaluating the impact the adoption of this guidance will have on the determination or reporting of its consolidated financial statements.

In November 2015, the FASB issued ASU 2015-17 “Income Taxes (Topic 740): Balance Sheet Classification of Deferred Taxes,” which simplifies the balance sheet classification of deferred taxes. The new guidance requires that all deferred taxes be presented as noncurrent, rather than separated into current and noncurrent amounts. The guidance is effective for reporting periods beginning after December 15, 2016 and early adoption is permitted. In addition, the adoption of guidance can be applied either prospectively or retrospectively to all periods presented. The Company does not believe that this new accounting pronouncement will have a material impact on its consolidated financial statements.

In January 2016, the FASB issued ASU 2016-01 “Financial Instruments-Overall (Subtopic 825-10): Recognition and Measurement of Financial Assets and Financial Liabilities,” which revises an entity’s accounting related to (1) the classification and measurement of investments in equity securities and (2) the presentation of certain fair value changes for financial liabilities measured at fair value. The ASU also amends certain disclosure requirements associated with the fair value of financial instruments. ASU 2016-01 is effective for fiscal years and interim periods within those fiscal years beginning after December 15, 2017, with early adoption permitted under certain circumstances.” The Company is currently assessing the impact of ASU 2016-01 on its financial statements.

In February 2016, the FASB issued ASU No. 2016-02, Leases, which is effective for fiscal years, and interim periods within those years, beginning after December 15, 2018 with early adoption permitted. Under Accounting Standards Update 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. The Company is currently evaluating the effect that the new guidance will have on its financial statements and related disclosures.

In March 2016, the FASB issued ASU No. 2016-09, Compensation—Stock Compensation (Topic 718): Improvements to Employee Share-Based Payment Accounting, which includes multiple provisions intended to simplify various aspects of the accounting for share-based payments, including treatment of excess tax benefits and forfeitures, as well as consideration of minimum statutory tax withholding requirements. The ASU will take effect for public companies for fiscal years, and interim periods within those fiscal years, beginning after December 15, 2016, with early application permitted in any interim or annual period. The Company is evaluating the future impact of this ASU on

the consolidated financial statements.

In August 2016, the FASB issued ASU No. 2016-15 Cash Flow Statement (Topic 230) - Classification of Certain Cash Receipts and Cash Payments. This new guidance addresses eight specific cash flow issues with the objective of reducing the existing diversity in practice, including: debt prepayment or debt extinguishment costs, settlement of zero-coupon debt instruments or other debt instruments, contingent consideration payments made after a business combination, proceeds from the settlement of insurance claims, proceeds from the settlement of corporate owned life insurance policies, distributions received from equity method investees, beneficial interests in securitization transactions, and separately identifiable cash flows and application of the predominance principle. ASU 2016-15 is effective for public business entities for fiscal years beginning after December 15, 2017, and interim periods within those fiscal years, and is not expected to have a material impact on the Company's consolidated financial statements.

In November 2016, the FASB issued ASU No. 2016-18, Statement of Cash Flows (Topic 230) - Restricted Cash a consensus of the FASB Emerging Issues Task Force. This new guidance requires 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. Therefore, amounts generally described as restricted cash and restricted cash equivalents should be included with cash and cash equivalents when reconciling the beginning-of-period and end-of-period total amounts shown on the statement of cash flows. ASU 2016-18 is effective for fiscal years beginning after December 15, 2018, and interim periods within fiscal years beginning after December 15, 2019 and is not expected to have a material impact on the Company's consolidated financial statements.

Reclassifications

Certain reclassifications have been made to the Company's prior year's consolidated financial statements to conform to the current year's consolidated financial statement presentation.

NOTE 3—DSIT SOLUTIONS, LTD. (“DSIT”)

On April 21, 2016 (the “Closing Date”), the Company closed on a transaction (the “DSIT Transaction”) initially entered into on January 28, 2016 for the sale of a portion of its interests DSIT Solutions, Ltd. business to Rafael Advanced Defense Systems Ltd., a major Israeli defense company. At closing, Acorn received gross proceeds of \$4,913 before escrow, fees and taxes. From the gross proceeds, the Company deposited approximately \$579 to satisfy the escrow requirements in the sale. The Company expects the escrow deposit to be released 18 months from the Closing Date. The Company also paid an Israeli withholding tax of approximately \$266 and incurred transaction costs of \$184. In connection with the DSIT Transaction, the Company recorded a gain of \$3,543 (of which \$2,574 is the portion related to the step-up in value of the Company’s retained non-controlling investment). The Company is also eligible to receive its 82.4% pro-rata share of a \$1,000 earn-out over a three-year period if certain operating results targets are met. The earn-out is not included in the determination of the gain in the DSIT Transaction as management does not believe it is probable that certain thresholds will be met. DSIT did not meet the operating result target for the 2016 earn-out.

Prior to the Closing Date, all options in the DSIT Key Employee Stock Option Plan were exercised and DSIT received proceeds of \$391, and the Company’s holdings in DSIT were reduced from 88.3% to 78.7%. As a result of the DSIT Transaction, the Company’s holdings in DSIT were reduced from 78.7% to 41.2%, and subsequent to the DSIT Transaction, the Company has limited representation on the DSIT Board of directors. Accordingly, after the Closing Date, the Company no longer consolidates the results of DSIT.

Assets and liabilities related to the deconsolidated operations of DSIT are as follows:

	December 31, 2016	At the Closing Date	December 31, 2015
	(unaudited)	(unaudited)	(unaudited)
Current assets:			
Cash and cash equivalents	\$ 1,047	\$ 516	7
Restricted deposits	2,648	2,517	2,172
Accounts receivable	2,825	5,166	5,826
Unbilled revenue	4,918	4,779	3,849
Inventory	481	297	230
Other current assets	795	935	698
Total current assets	12,714	14,210	12,782
Property and equipment, net	569	620	654
Severance assets	3,915	3,762	3,558
Restricted deposits	646	1,815	2,951
Due from Acorn	1,171	916	802
Goodwill	—	536	516
Other assets	339	80	124

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

Total assets	\$ 19,354	\$ 21,939	21,387
Current liabilities:			
Short-term bank credit and current maturities of long-term bank debt	\$ 1,239	\$ 2,655	1,917
Accounts payable	1,461	2,072	1,869
Accrued payroll, payroll taxes and social benefits	1,142	1,286	1,261
Deferred revenue	431	2,219	3,487
Other current liabilities	2,736	1,615	1,417
Total current liabilities	7,009	9,847	9,951
Accrued severance	5,374	5,209	4,984
Other long-term liabilities	9	38	82
Total liabilities	\$ 12,392	\$ 15,094	15,017

F-17

The Due from Acorn balance at December 31, 2016 is comprised of a loan of \$340 from DSIT and unreimbursed expenses of \$591, both of which accrue interest at 3.15% per annum. Such balances are 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 includes \$240 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.

DSIT's results that were included in the Company's Consolidated Statements of Operations for the period from January 1, 2016 until the closing of the DSIT Transaction and for the year ended December 31, 2015 can be seen below:

	January 1, 2016 – April 21, 2016 (unaudited)	Year ended December 31, 2015 (unaudited)
Revenue	\$ 5,074	\$ 13,501
Cost of sales	3,443	9,125
Gross profit	1,631	4,376
Research and development expenses, net	469	1,191
Selling, general and administrative expenses	1,063	3,162
Operating income	99	23
Finance expense, net	(39)	(112)
Income before income taxes	60	(89)
Income tax expense	(19)	(259)
Net income	41	(348)
Net income attributable to non-controlling interests	(9)	49
Net loss attributable to Acorn Energy Inc.	\$ 32	\$ (299)

As indicated above, after the Closing Date, the Company no longer consolidates the results of DSIT. After the Closing Date, the Company accounts for its investment in DSIT under the equity method. The initial balance of the Company's investment in DSIT (\$5,390) was determined based on the fair value of its 41.2% holdings in DSIT following the DSIT Transaction and the \$13,100 value attributed to DSIT in the DSIT Transaction.

DSIT's results and the Company's share of its net income for the period from the Closing Date to December 31, 2016 can be seen below:

	(unaudited)
Revenue	\$11,777
Cost of sales	7,795
Gross profit	3,982

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

Research and development expenses, net	642	
Selling, general and administrative expenses	2,721	
Operating income	619	
Finance expense, net	(134)
Income before income taxes	485	
Income tax benefit	169	
Net income	\$654	
Acorn's share of net income in DSIT	\$268	

F-18

NOTE 4—Discontinued Operations

(a) GridSense

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 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. Under the terms of the escrow, if there were no pending indemnifiable claims, \$50 was to be released to GridSense on January 7, 2017, with the balance to be released to GridSense on July 7, 2017. The buyers refused to authorize the escrow agent to release the \$50 on January 7, 2017 and, subsequent to that date, submitted purported third-party indemnifiable claims which the Company believes to be both untimely and without merit. This dispute has yet to be resolved.

Following the 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.

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

As of
December 31, 2016
December 31, 2015

	2016	
Cash	\$19	\$ 48
Other current assets and non-current assets	100	1,060
Total assets	\$119	\$ 1,108
Short-term bank credit	\$—	\$ 138
Accounts payable	501	950
Accrued payroll, payroll taxes and social benefits	90	186
Other current and non-current liabilities	406	572
Total liabilities	\$997	\$ 1,846

GridSense had a working agreement with its bank to allow GridSense to borrow against 80% of certain accounts receivable balances up to \$750 at an interest equal to 1.25% per month. At December 31, 2015, GridSense was utilizing approximately \$138 of its accounts receivable line. Such balance was repaid prior to the expiration of the accounts receivable line on July 16, 2016.

GridSense's operating results for the years ended December 31, 2015 and 2016 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,	
	2016	2015
Revenue	\$212	\$2,507
Gross profit	\$28	\$21
Net loss	\$(286)	\$(3,923)

(b) US Seismic Systems Inc. (“USSI”)

As of January 1, 2015, the Company owned 9,376,401 shares of USSI’s Series A-1 Preferred Stock (“USSI Preferred Stock”). Such holdings in USSI’s Preferred Stock together with the common stock owned by the Company represented approximately 95.7% of USSI on an as converted basis. Through September 30, 2015, the Company invested \$7,584 in USSI common shares (of which \$5,355 was in cash and \$2,229 was in Acorn common shares) and an additional \$16,750 in USSI Preferred Stock. In addition, the Company lent USSI a total of \$10,058. Such loans bore interest at 8% per annum.

In early 2015, the Company’s Board of Directors decided that it would no longer continue to fund USSI’s activities following the significant decline in oil prices which led to significantly reduced demand for USSI’s products. At that time, USSI effectively suspended operations and terminated substantially all employees.

On September 28, 2015, the Board of Directors of USSI approved a motion to file a voluntary petition for protection under Chapter 7 of the United States Bankruptcy Code (a “Chapter 7 Bankruptcy”). Such filing was made on September 30, 2015. Under a Chapter 7 Bankruptcy, control of USSI no longer rests with the Company, but rather with a court-appointed trustee. Accordingly, effective September 30, 2015, the Company no longer consolidated the assets, liabilities or operating results of USSI. Following USSI’s Chapter 7 Bankruptcy, the Company does not expect that there will be any cash available to repay any of the aforementioned loaned amounts after the disposition of USSI’s assets.

Assets and liabilities related to the discontinued operations of USSI were as follows:

	At September 29, 2015 – prior to deconsolidation
Cash and cash equivalents	\$ —

Other current assets	—
Total assets	\$ —
Short-term bank credit	\$ 999
Accounts payable	1,029
Accrued payroll, payroll taxes and social benefits	90
Other current liabilities	1,721
Total liabilities	\$ 3,839

USSI's losses for the year ended December 31, 2015 are included in "Loss from discontinued operations, net of income taxes" in the Company's Consolidated Statements of Income. Summarized financial information for USSI's operations for the period is presented below:

	Year ended December 31,2015
Revenues	\$ 163
Gross profit	\$ (68)
Net loss	\$ (772)
Loss on deconsolidation	\$ (401)
Loss from discontinued operations, net of income taxes	\$ (1,173)

Net loss includes stock-based compensation expense of \$4 in the year ended December 31, 2015.

NOTE 5—LEAP TIDE FINANCING TRANSACTION

On August 13, 2015, the Company executed a Loan and Security Agreement with Leap Tide Capital Partners III, LLC (“Leap Tide”), pursuant to which the Company borrowed \$2,000 from Leap Tide (the “LT Loan”). Principal and accrued interest was due and payable on August 13, 2016. Interest accrued and was payable quarterly at a rate of 10% per annum. On April 29, 2016, following the receipt of the net proceeds from the DSIT Transaction (see Note 3), the Company repaid in full the \$2,000 of principal and all accrued interest in full satisfaction of the cash due to Leap Tide under the LT Loan.

In addition to the interest payable in cash described above, Leap Tide received 850,000 shares of the Company’s common stock (the “Initial Shares”) at the closing and was entitled to vested rights to receive 179,167 additional shares of the Company’s common stock (each vested right to receive one share, a “Vested Share Right”) per month for each full month that the full principal amount of the LT Loan was outstanding. The number of Vested Share Rights that accrued in a given month was prorated to the extent less than the full principal amount was outstanding and/or for any partial month in which no principal amount was outstanding. Through April 29, 2016, the date of repayment, Leap Tide earned 1,531,396 Vested Share Rights.

Under the terms of the LT Loan, the Company had the right on or prior to 30 days after the repayment of the LT Loan (the “Cash Settlement Period”) to repurchase any or all Initial Shares and settle any or all Vested Share Rights accrued under the LT Loan for cash in lieu of stock. The cash repurchase/settlement price would have been \$0.30 for each Initial Share so repurchased and each Vested Share Right so settled. The Company did not repurchase any of the Initial Shares or settle any of the accrued Vested Share Rights for cash and all 1,531,396 Vested Share Rights were converted into 1,531,396 shares of Common Stock of the Company after the expiration of the Cash Settlement Period. At December 31, 2015, the Company recorded a liability (and interest expense) of \$86 with respect to the market value of the common stock to be granted upon vesting of the Vested Share Rights. During the year ended December 31, 2016, the Company recorded additional interest expense of \$281 with respect to the vesting of the Vested Share Rights.

The value of the Initial Shares (\$162) at closing was treated as a discount to the loan and was being amortized to interest expense over the one-year period of the LT Loan. Through December 31, 2015, \$62 of the discount associated with the Initial Shares was amortized and the remaining discount of \$100 was amortized in the year ended December 31, 2016.

Concurrent with the LT Loan, Jan H. Loeb, Manager of Leap Tide, joined the Board of Directors of the Company. Effective January 28, 2016, Acorn engaged Jan H. Loeb to be the Company’s President and CEO.

Certain members of the management of DSIT (including its CEO and its CFO - who also serves as CFO of the Company) invested in Leap Tide (which is a special entity formed to make the loan) on the same terms as the other investors in Leap Tide. None of these persons had any role in the management of Leap Tide.

F-21

NOTE 6—INVESTMENT IN OMNIMETRIX

On October 16, 2015, one of the Company's directors 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 of the Preferred Stock. 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 (and may agree to treat future accrued dividends) as a loan to OmniMetrix which bear interest at 8% per year. All amounts due (principal and interest) are due the later of April 30, 2018 or 90 days following the advance of a new loan (quarterly dividend accrual). In December 2016, the director provided OmniMetrix with a \$50 loan under the same terms as the abovementioned accrued dividends.

The OmniMetrix Preferred Stock may convert at the option of the holder of the OmniMetrix Preferred Stock on a one-for-one basis into 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.

The Company has the right to drag along the holder of the OmniMetrix Preferred Stock in the event of a sale by Acorn of at least a majority of its shares in OmniMetrix and the holder of the OmniMetrix Preferred Stock has the right to tag along on any such sale.

NOTE 7 — 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.

At December 31, 2014, \$248 of lease payments associated with the reduced utilization of leased facilities remained unpaid. During the year ended December 31, 2015, OmniMetrix paid \$44 of this liability. The remaining accrued restructuring balance at December 31, 2015 of \$204 is included in Other current liabilities (\$45) and Other long-term liabilities (\$159) in the Company's Consolidated Balance Sheets. During the year ended December 31, 2016, OmniMetrix paid \$45 of this liability. The remaining accrued restructuring balance at December 31, 2016 of \$159 is included in Other current liabilities (\$46) and Other long-term liabilities (\$113) in the Company's Consolidated Balance Sheets.

NOTE 8—INVENTORY

	As of	
	December	
	31,	
	2016	2015
Raw materials	\$156	\$287
Work-in-process	—	189
Finished goods	46	30
	\$202	\$506

During 2016 and 2015 the Company recorded inventory impairment charges of \$9 and \$22, respectively, in its PG segment. At December 31, 2016 and 2015, the Company's inventory reserve was \$31 and \$22, respectively.

Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company no longer includes DSIT inventory on the Company's consolidated balance sheets. Inventory at December 31, 2015 include \$41 of raw materials and \$189 of work-in-process related to DSIT.

NOTE 9—OTHER CURRENT ASSETS

Other current assets consist of the following:

	As of	
	December 31,	
	2016	2015
Prepaid expenses and deposits	\$83	\$260
Deferred costs	829	813
Deferred taxes	—	141
Funded severance assets	—	51
Employee advances	2	105
R&D participation receivable	—	168
Other	18	95
	\$932	\$1,633

F-25

NOTE 10—PROPERTY AND EQUIPMENT, NET

Property and equipment consists of the following:

	Estimated Useful Life (in years)	As of December 31, 2016 2015	
Cost:			
Computer hardware and software	3 - 5	\$78	\$1,296
Equipment	7	218	854
Leasehold improvements	Term of lease	339	900
		635	3,050
Accumulated depreciation and amortization			
Computer hardware and software		61	1,202
Equipment		159	347
Leasehold improvements		201	547
		421	2,096
Property and equipment, net		\$214	\$954

Depreciation and amortization in respect of property and equipment amounted to \$146 and \$314 for 2016 and 2015, respectively.

Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the assets, liabilities or results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company no longer reports DSIT's Property and Equipment.

NOTE 11—GOODWILL

The changes in the carrying amounts of goodwill by segment from December 31, 2014 to December 31, 2016 were as follows:

	Energy & Security	Sonar Solutions segment
Balance at December 31, 2014	\$ 518	
Impairment	—	
Translation adjustment	(2)	
Balance at December 31, 2015	516	
Translation adjustment	20	
Deconsolidation of DSIT	(536)	
Balance at December 31, 2016	\$ —	

Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company eliminated this goodwill as part of the deconsolidation of DSIT.

NOTE 12—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 bears 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. The Loan and Security Agreement expires September 30, 2017.

At December 31, 2016, OmniMetrix had an outstanding balance of approximately \$376 pursuant to the amended Loan and Security Agreement.

(b) DSIT

At December 31, 2015, DSIT had lines-of-credit of approximately \$1,180 from two Israeli banks of which \$979 was then being utilized. The lines-of-credit are denominated in NIS and bore interest at a weighted average rate of 3.1% per annum.

In addition, to the above lines-of-credit, in December 2014, DSIT entered in an agreement with another bank to allow DSIT to borrow against certain accounts receivable balances at an interest equal to the Israeli prime rate plus 1.8%. At December 31, 2015, DSIT had borrowed \$862 against certain accounts receivable balances.

In July 2014, DSIT took a loan from one of its banks. The loan was for NIS 1,000 (approximately \$292 at the then exchange rate) to be repaid over a period of two years with monthly payments of approximately \$11. The loan

principal was linked to the Israeli CPI and bore interest at 1.0% per annum. Total amounts due with respect to the loan were \$75 at December 31, 2015. During the period from January 1, 2016 to the Closing Date, \$43 of the loan balance was repaid.

Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the assets, liabilities or results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company no longer reports DSIT's debt in its consolidation financial statements.

(c) Summary

	As of	
	December 31,	
	2016	2015
DSIT line-of-credit	\$—	\$979
DSIT borrowings against receivables	—	862
Current maturities of long-term debt	—	75
OmniMetrix borrowings against receivables	376	—
Total debt	\$376	\$1,916

NOTE 13—OTHER CURRENT LIABILITIES

Other current liabilities consist of the following:

	As of	
	December 31,	
	2016	2015
Accrued expenses	\$518	\$2,081
Taxes	38	12
Warranty provision	27	122
Restructuring liabilities	46	45
	\$629	\$2,260

Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the assets, liabilities or results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company no longer reports DSIT's Other Current Liabilities.

NOTE 14—ACCRUED SEVERANCE, SEVERANCE ASSETS AND RETIREMENT PLANS

(a) Accrued Severance and Severance Assets

(i) Israeli labor law and certain employee contracts generally require payment of severance pay upon dismissal of an employee or upon termination of employment in certain other circumstances. The Company has recorded under liability for employee termination benefits the amount that would be paid if all its Israeli employees were dismissed at the balance sheet date, on an undiscounted basis, in accordance with Israeli labor law. This liability is computed based upon the employee's number of years of service and salary components, which in the opinion of management create entitlement to severance pay in accordance with labor agreements in force. The amounts due were determined based on the employees' current salary rates and the number of service years that will be accumulated upon their retirement date. The non-current portion of the liability is reflected on the Company's Consolidated Balance Sheets as Accrued severance while the current portion of the liability is reflected on the Company's Consolidated Balance Sheets in Accrued payroll, payroll taxes and social benefits.

The liability is partially funded by sums deposited in dedicated funds in respect of employee termination benefits and is reflected on the Company's Consolidated Balance Sheets as Severance assets. For certain Israeli employees, the Company's liability is covered mainly by regular contributions to defined contribution plans.

(ii) Severance pay contributions to dedicated funds amounted to \$138 and \$375 for the years ended December 31, 2016 and 2015, respectively. (Contributions for the year ended December 31, 2016 represent contributions made by DSIT up to the DSIT Transaction – see Note 3.)

(iii) The table below provides a breakdown of the Company's severance liability and severance assets as of December 31, 2016 and 2015.

	As of	
	December 31,	December 31,
	2016	2015
Current severance liability (included in Accrued payroll, payroll taxes and social benefits)	\$279	\$41
Non-current severance liability	—	4,984
Total severance liability	\$279	\$5,025
Current severance assets (included in Other current assets)	\$—	\$51
Non-current severance assets	—	3,558

Total severance assets	\$—	\$3,609
------------------------	-----	---------

Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the assets, liabilities or results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company no longer reports DSIT's Severance Assets or Accrued Severance.

(b) Defined Contribution Plans

The Company maintains a defined contribution plan for its U.S. salaried employees meeting age and service requirements, which allows participants to make contributions by salary reduction pursuant to Section 401(k) of the Internal Revenue Code. The Company contributes 3% of employees' salaries for those meeting the age and service requirements. Such contribution has been terminated effective January 1, 2017. The expense related to the employer portion for the years ending December 31, 2016 and 2015 was \$45 (including \$4 related to discontinued operations) and \$100 (including \$50 related to discontinued operations), respectively.

NOTE 15—COMMITMENTS AND CONTINGENCIES**(a) Leases of Property and Equipment**

Office rental and automobile leasing expenses for 2016 and 2015 were \$245 and \$638, respectively (not including \$67 and \$158 in 2016 and 2015, respectively, related to discontinued operations). Leasing expenses include \$179 and \$528 in 2016 and 2015, respectively, related to DSIT. Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the assets, liabilities or results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company no longer reports DSIT's leasing expenses.

The Company and its OmniMetrix subsidiary lease office space and equipment under operating lease agreements. Those leases will expire on different dates from 2017 to 2019. Future minimum lease payments on non-cancelable operating leases as of December 31, 2016 are as follows:

Years ending December 31,	
2017	\$ 107
2018	110
2019	109
2020	—
2021 and thereafter	—
	\$ 326

NOTE 16—EQUITY

(a) General

At a special meeting of the stockholders on March 16, 2016, the Company's stockholders approved an amendment to its restated certificate of incorporation to increase the number of authorized shares of capital stock from 30,000,000 shares to 42,000,000 shares, all of which shall be common stock.

At December 31, 2016 the Company had issued and outstanding 29,322,574 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 July 21, 2016, 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 July 21, 2017, 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) Leap Tide Financing Transaction – See Note 5.

(c) Conversion of director loan to common stock – See Note 19.

(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. At December 31, 2016, 979,650 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 2015 and 2016, there were no grants to non-employees.

No options were exercised in the years ended December 31, 2015 or 2016. The intrinsic value of options outstanding and of options exercisable at December 31, 2016 was \$2 and \$2, 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):

	2016	2015
Risk-free interest rate	1.5 %	2.1 %
Expected term of options, in years	6.5	8.6
Expected annual volatility	80 %	63 %
Expected dividend yield	— %	— %
Determined weighted average grant date fair value per option	\$0.11	\$0.51

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, 2015 and 2016. 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, 2016 and 2015, as well as changes during each of the years then ended, is presented below:

	2016		2015	
	Number of Options (in shares)	Weighted Average Exercise Price	Number of Options (in shares)	Weighted Average Exercise Price
Outstanding at beginning of year	2,364,918	\$ 3.51	1,812,428	\$ 4.51
Granted at market price	65,000	0.15	687,654	0.75
Exercised	—	—	—	—
Forfeited or expired	(379,549)	2.29	(135,164)	2.91
Outstanding at end of year	2,050,369	3.62	2,364,918	3.51
Exercisable at end of year	2,004,534	\$ 3.69	1,778,503	\$ 4.16

Summary information regarding the options outstanding and exercisable at December 31, 2016 is as follows:

Range of Exercise Prices	Outstanding		Exercisable		Weighted Average Exercise Price
	Number Outstanding	Weighted Average Remaining Contractual Life (in shares) (in years)	Weighted Average Exercise Price	Number Exercisable (in shares)	
\$0.14 – \$1.06	677,301	5.8	\$ 0.74	644,800	\$ 0.76

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

\$1.68 – \$2.49	307,985	4.7	\$ 1.74	294,651	\$ 1.75
\$3.51 – \$5.00	279,368	3.5	\$ 4.22	279,368	\$ 4.22
\$5.05 – \$5.91	320,000	1.4	\$ 5.21	320,000	\$ 5.21
\$6.31 - \$7.57	302,356	3.2	\$ 6.90	302,356	\$ 6.97
\$7.60 - \$11.42	163,359	2.8	\$ 8.82	163,359	\$ 8.82
	2,050,369			2,004,534	

Stock-based compensation expense included in the Company's Consolidated Statements of Operations was:

F-33

	Year ended December 31,	
	2016	2015
Cost of sales*	\$—	\$16
Research and development expense*	—	4
Selling, general and administrative expense*	89	641
Total	\$89	\$661

* Includes \$16, \$4 and \$59 in Cost of sales, Research and development expense and Selling, general and administrative expense, respectively, for the year ended December 31, 2015 with respect to DSIT. See Note 4 with respect to stock-based compensation expense associated with discontinued operations.

As of December 31, 2016, the total compensation cost related to non-vested awards not yet recognized was approximately \$6 which the Company expects to recognize over a weighted-average period of approximately 0.8 years.

(f) DSIT Stock Option Plan

In November 2006, the Company adopted a Key Employee Stock Option Plan (the “DSIT Plan”) for its DSIT subsidiary to be administrated by a committee of board members of DSIT, currently comprised of the entire board of directors of DSIT. The purpose of the DSIT Plan and associated grants is to provide incentives to key employees of DSIT to further the growth, development and financial success of DSIT.

A summary status of the DSIT Plan as of December 31, 2016 and 2015, as well as changes during the years then ended, is presented below:

	2016		2015	
	Number of Options (in shares)*	Weighted Average Exercise Price	Number of Options (in shares)*	Weighted Average Exercise Price
Outstanding at beginning of year	239,524	\$ 1.65	239,524	\$ 1.67
Granted at fair value	—	\$ —	—	\$ —
Exercised	(239,524)	\$ 1.63	—	\$ —

Forfeited	—	\$ —	—	\$ —
Outstanding at end of year	—	\$ —	239,524	\$ 1.65
Exercisable at end of year	—	\$ —	239,524	\$ 1.65

*The exercise price of 91,754 of these options was NIS 9.38 translated to US dollars using following exchange rates: NIS 3.89 for December 31, 2014, NIS 3.90 for December 31, 2015, and 3.97 for the Closing Date.

(g) 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:

	2016		2015	
	Number of shares underlying warrants	Weighted Average Exercise Price	Number of shares underlying warrants	Weighted Average Exercise Price
Outstanding at beginning of year	2,619,423	\$ 1.48	2,642,423	\$ 1.50
Granted	35,000	\$ 0.13	—	—
Exercised	—	—	—	—
Forfeited or expired	—	—	(23,000)	\$ 3.68
Outstanding and exercisable at end of year	2,654,423	\$ 1.46	2,619,423	\$ 1.48

The warrants outstanding at December 31, 2016 have a weighted average remaining contractual life of 3.2 years.

The fair value of the warrants granted (\$0.08 per warrant) was estimated on the grant dates using the Black-Scholes option-pricing model with the following weighted average assumptions:

Risk-free interest rate	1.79	%
Expected term of warrants	7.0	years
Expected annual volatility	78	%
Expected dividend yield	—	%

F-35

NOTE 17—FINANCE INCOME (EXPENSE), NET

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

	Year ended	
	December	
	31,	
	2016	2015
Interest income	\$1	\$26
Interest expense*	(604)	(420)
Exchange gain, net	31	67
	\$(572)	\$(327)

* Interest expense includes \$446 and \$225 associated with the LT Loan in 2016 and 2015, respectively (see Note 5).

NOTE 18—INCOME TAXES

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

	Year ended	
	December 31,	
	2016	2015
Domestic	\$(142)	\$(5,409)
Foreign	60	(88)
	\$(82)	\$(5,497)

Income tax expense (benefit) consists of the following:

	Year ended	
	December 31,	
	2016	2015
Current:		
Federal	\$—	\$—
State and local	—	—
Foreign	—	(50)
	—	(50)
Deferred:		
Federal	—	—
State and local	—	—
Foreign	19	259
	19	259
Total income tax expense	\$19	\$209

(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,**

2016 2015

34 % 34 %

Statutory Federal rates

Increase (decrease) in income tax rate resulting from:

Tax on foreign activities

(2) 6

Other, net (primarily permanent differences)

(200) (4)

Valuation allowance

145 (40)

Effective income tax rates

(23)% (4)%

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

As of December 31,

2016 2015

Deferred tax assets (liabilities) consist of the following:

Employee benefits and deferred compensation

\$1,745 \$1,722

Investments and asset impairments

2,619 2,693

Other temporary differences

(807) (937)

Net operating loss carryforwards

21,977 21,957

25,534 25,435

Valuation allowance

(25,534) (25,208)

Net deferred tax assets

\$— \$227

Deferred tax assets in 2015 relate to the Company's former DSIT subsidiary. Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the assets and liabilities of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company eliminated these deferred tax assets as part of the deconsolidation of DSIT.

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, 2016, the valuation allowance increased by \$326.

(d) Summary of Tax Loss Carryforwards

As of December 31, 2016, the Company had various net operating loss carryforwards expiring as follows:

Expiration	Federal*	State
2023 - 2029	\$ 503	—
2030 - 2036	61,692	13,000
Total	\$62,195	13,000

* 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

On October 22, 2004, The American Jobs Creation Act (the "Act") was signed into law. The Act includes a deduction of 85% of certain foreign earnings that are repatriated, as defined in the Act. The Company's foreign earnings were derived from the Company's DSIT subsidiary up to the date of the DSIT Transaction (see Note 3).

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 34%.

(f) Uncertain Tax Positions (UTP)

As of December 31, 2015 and 2016, no interest or penalties were accrued on the balance sheet related to UTP.

During the years ending December 31, 2015 and 2016, 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, 2017, the Company is no longer subject to examination by U.S. Federal taxing authorities for years before 2013, for years before 2012 for state income taxes. During 2014, the Company's U.S. Federal income tax returns for the years ended December 31, 2011 through December 31, 2012 were examined by the IRS. No material adjustments were made by the IRS in the course of their audit.

NOTE 19—RELATED PARTY BALANCES AND TRANSACTIONS

The Company recorded consulting and other fees to directors of \$101 and \$160 for each of the years ended December 31, 2016 and 2015, respectively, all of which are included in Selling, general and administrative expenses.

In January 2016, the Company borrowed a total of \$300 (\$200 from one director and \$100 from another director) under promissory notes which were to mature three days following the receipt of proceeds from the closing of the DSIT Transaction. In March 2016, the Company borrowed, on similar terms, an additional \$75 from another director. Upon maturity, the Company was to pay to each director a single payment equal to 115% of the amounts borrowed under the promissory notes. Under the terms of each promissory note, at maturity, the lender could elect to convert the entire amount due under the promissory note into Common Stock of the Company at a conversion price equal to the closing price of the Company's Common Stock on the trading day immediately preceding the maturity date of the loan.

On April 29, 2016, following the receipt of the net proceeds from the DSIT Transaction (see Note 3), the Company repaid in full \$275 (\$200 from one director and \$75 from a another director) of the principal amount of the promissory notes plus interest equal to 15% of the amounts borrowed under the promissory notes.

In addition, a third director who had lent the Company \$100, elected to convert the principal and the \$15 of interest due into Common Stock of the Company. In accordance with the terms of the promissory note, the director received 465,587 shares of Common Stock of the Company.

See Note 6 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.

See Note 16(e) for information related to options and stock awards to directors and officers.

See Note 22 for director loans made in February 2017.

NOTE 20—SEGMENT REPORTING AND GEOGRAPHIC INFORMATION

(a) General Information

As of December 31, 2016, the Company operates in two reportable operating segments, both of which are performed through the Company's OmniMetrix subsidiary:

Power Generation ("PG") monitoring (formerly known as Machine-to-Machine Critical Asset Monitoring & Control). The PG segment provides wireless remote monitoring and control systems and services for critical assets as well as Internet of Things applications.

Corrosion Protection ("CP") monitoring. The CP segment provides for remote monitoring of cathodic protection systems on gas pipelines for gas utilities and pipeline companies.

In addition, up to the closing of the DSIT Transaction (see Note 3), the Company reported its activities in the Energy & Security Sonar Solutions segment. This segment, whose activities were performed by 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 acoustic systems and real-time embedded hardware and software development and production. "Other" operations include certain IT activities (protocol management software for cancer patients and billing software) and outsourced consulting activities performed by the Company's DSIT subsidiary that did not meet the quantitative thresholds under applicable accounting principles.

Following the closing of the DSIT Transaction, the Company is no longer consolidating the results of DSIT, but rather is reporting on its investment in DSIT on the equity method. Accordingly, effective April 21, 2016, the Company no longer consolidates the results of DSIT's Energy & Security Sonar Solutions segment or the activities of its "Other" segment.

Previously, the Company reported GridSense's activities in its Smart Grid Distribution Automation segment which developed and produced fiber optic sensing systems for the energy and security markets. With the suspension of operations at GridSense (see Note 4(a)), its activities are reflected as discontinued operations.

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, 2016 and 2015:

	PG	CP	Energy & Security Sonar Systems*	Other*	Total
Year ended December 31, 2016:					
Revenues from external customers	\$2,903	\$682	\$ 4,620	\$454	\$8,659
Intersegment revenues	—	—	—	—	—
Segment gross profit	1,516	378	1,517	114	3,525
Depreciation and amortization	65	15	53	10	143
Segment income (loss) before income taxes	(848)	(352)	82	(10)	(1,128)
Segment assets	1,673	879	—	—	2,552
Expenditures for segment assets	—	—	30	3	33
Year ended December 31, 2015:					
Revenues from external customers	\$2,513	\$534	\$ 12,093	\$1,408	\$16,548
Intersegment revenues	—	—	—	—	—
Segment gross profit	1,472	319	3,834	542	6,167
Depreciation and amortization	70	15	185	27	297
Segment income (loss) before income taxes	(1,437)	(116)	(195)	220	(1,528)
Segment assets	1,691	298	15,777	440	18,206
Expenditures for segment assets	—	—	114	18	132

(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, 2016 and 2015:

	Year ended December 31,	
	2016	2015
Total net loss before income taxes for reportable segments	\$(1,118)	\$(1,748)
Other operational segment net income (loss) before income taxes	(10)	220
Segment loss before income taxes	(1,128)	(1,528)
Gain on sale of interest in DSIT, net of transaction costs	3,543	--
Unallocated net income (cost) of DSIT headquarters*	(6)	120
Unallocated net cost of corporate headquarters**	(2,491)	(4,089)
Consolidated net loss before taxes on income	\$(82)	\$(5,497)

* Results for the year ended December 31, 2016, only include DSIT's results for the period January 1, 2016 to April 21, 2016. See Note 3.

** Includes \$89 and \$582 of stock compensation expense for the years ended December 31, 2016 and 2015, respectively. Also includes \$446 and \$225 of interest expense associated with the LT Loan for the years ended December 31, 2016 and 2015, respectively (see Note 5).

	As of December 31,	
	2016	2015
Assets:		
Total assets for reportable segments	\$2,552	\$17,765
Total assets of other operational segment	—	441
Assets of discontinued operations	119	1,108
Unallocated assets of DSIT headquarters	—	4,367
Unallocated assets of OmniMetrix headquarters	213	397
Assets of corporate headquarters *	6,356	252
Total consolidated assets	\$9,240	\$24,330

* Includes the investment in DSIT of \$5,658 and the escrow deposit of \$579 from the DSIT Transaction at December 31, 2016.

Other Significant Items	Segment Totals	Adjustments	Consolidated Totals
Year ended December 31, 2016			
Depreciation and amortization	\$ 143	\$ 3	\$ 146
Expenditures for assets	33	—	33
Year ended December 31, 2015			
Depreciation and amortization	\$ 297	\$ 17	\$ 314
Expenditures for assets	132	27	159

Other adjustments are primarily unallocated DSIT and corporate headquarters data which are not included in the segment information. None of the other adjustments are significant.

	Year ended	
	December 31,	
	2016	2015
Revenues based on location of customer:		
United States	\$3,550	\$3,019
Israel	3,061	7,699
Asia	2,013	5,587
Other	35	243
	\$8,659	\$16,548

	December 31,	
	2016	2015
Long-lived assets located in the following countries:		
United States	\$214	\$299
Israel	—	655
	\$214	\$954

(d) Revenues, Accounts Receivable and Unbilled Revenue Balances from Major Customers

Customers A – G are all related to DSIT’s Energy & Security Sonar Solutions segment. Customer G is related to OmniMetrix’s CP segment.

Revenue		Accounts Receivable**		Unbilled Revenue**
2016	2015	2016	2015	2015

Edgar Filing: ACORN ENERGY, INC. - Form 10-K

Customer	Balance	%	Balance	%	Balance	%	Balance	%	Balance	%
A	\$1,828	21%	\$2,701	14%	*	*	*	*	*	*
B	\$*	*	\$2,735	14%	*	*	\$1,844	28%	\$1,507	39%
C	*	*	\$2,889	15%	*	*	\$1,049	16%	1,087	28%
D	\$1,295	15%	\$2,200	12%	*	*	\$834	12%	\$*	*
E	*	*	*	*	*	*	\$1,112	17%	\$*	*
F	*	*	*	*	*	*	*	*	408	11%
G	*	*	*	*	\$283	28%	*	*	\$*	*

* Balance is not significant

** Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the assets, liabilities or results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company no longer reports DSIT's Accounts Receivable or Unbilled Revenue balances.

NOTE 21—FAIR VALUE MEASUREMENTS

Financial items measured at fair value are classified in the table below in accordance with the hierarchy established in applicable accounting principles.

	As at December 31, 2016			Total
	Level 1	Level 2	Level 3	
Escrow deposits – continuing operations	\$579	—	—	—\$579
Escrow deposits – discontinued operations	100	—	—	— 100
Total	\$679	\$	—\$	—\$679

	As at December 31, 2015			Total
	Level 1	Level 2	Level 3	
Restricted deposits – current	\$2,172	—	—	—\$2,172
Restricted deposits –non-current	2,951	—	—	— 2,951
Derivative liabilities	(4)	—	—	— (4)
Total	\$5,119	\$	—\$	—\$5,119

Escrow deposits – continuing operations relate to escrow requirements from the DSIT Transaction (see Note 3).

Restricted deposits (both current and non-current) and derivative liabilities at December 31, 2015 were all related to DSIT. Following the closing of the DSIT Transaction (see Note 3), the Company no longer consolidates the results of DSIT, but rather reports its investment in DSIT using the equity method. Accordingly, the Company eliminated these financial items as part of the deconsolidation of DSIT.

See Note 3 for the determination of the fair value of the Company's equity investment in DSIT.

NOTE 22—SUBSEQUENT EVENTS

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, including \$900 immediately funded. Acorn expects to repay the loans, which mature at the end of April 2018 and accrue interest at the rate of 12.5% (16.5% after February 15, 2018) per annum, payable at maturity, with proceeds from a future sale of its 41.2% ownership in its DSIT Solutions Ltd. affiliate.

In addition to the \$900 already funded, one of the Company's directors agreed to loan up to an additional \$1,000 to the Company on or after July 7, 2017 on substantially identical terms as the currently funded loans. The amount of any such additional financing would be reduced to the extent that other additional liquidity is provided to the Company in the form of loans from the directors or other lenders with a maturity date no earlier than April 2018, or from any net proceeds from the sale by the Company of any of its DSIT shares.

The Company is required to apply the net proceeds from the sale of any of its DSIT shares in repayment of the principal of the directors' loans and all interest accrued.

