

NETWORK 1 SECURITY SOLUTIONS INC

Form S-8

February 12, 2013

As filed with the Securities and Exchange Commission on February 12, 2013

REGISTRATION NO. 333-_____

SECURITIES AND EXCHANGE
COMMISSION
WASHINGTON, D.C. 20549

FORM S-8

REGISTRATION STATEMENT

UNDER
THE SECURITIES ACT OF 1933

NETWORK-1 SECURITY SOLUTIONS, INC.
(Exact name of registrant as specified in its charter)

DELAWARE
(State or other jurisdiction
of incorporation)

11-3027591
(I.R.S. employer
identification number)

445 PARK AVENUE, SUITE 1020
NEW YORK, NEW YORK 10022
(212) 829-5770

(Address, including zip code, and telephone number, including area code,
of Registrant's principal executive offices)

NETWORK-1 SECURITY SOLUTIONS, INC.
21 INDIVIDUAL OPTION AGREEMENTS
(Full title of the plan)

COREY M. HOROWITZ
CHAIRMAN AND CHIEF EXECUTIVE OFFICER
NETWORK-1 SECURITY SOLUTIONS, INC.
445 PARK AVENUE, SUITE 1020
NEW YORK, NEW YORK 10022
(212) 829-5770
(Address, including zip code, and telephone number,
including area code, of agent for service)

COPIES TO:

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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 ☒

(Do not check if a smaller reporting company)

CALCULATION OF REGISTRATION FEE

TITLE OF EACH CLASS OF SECURITIES TO BE REGISTERED	AMOUNT TO BE REGISTERED (1)(2)	PROPOSED MAXIMUM OFFERING PRICE PER SHARE (3)	PROPOSED MAXIMUM AGGREGATE OFFERING PRICE (3)	AMOUNT REGISTRATION FEE
Common Stock, par value \$.01 per share, underlying options....	330,000	\$ 1.60	\$ 528,000	\$ 72.02
Common Stock, par value \$.01 per share, underlying options....	100,000	\$ 1.59	\$ 159,000	\$ 21.69
Common Stock, par value \$.01 per share, underlying options....	200,000	\$ 1.40	\$ 280,000	\$ 38.19
Common Stock, par value \$.01 per share, underlying options....	45,000	\$ 1.35	\$ 60,750	\$ 8.29
Common Stock, par value \$.01 per share, underlying options....	80,000	\$ 1.21	\$ 96,800	\$ 13.20
Common Stock, par value \$.01 per share, underlying options....	600,000	\$ 1.19	\$ 714,000	\$ 97.39
Common Stock, par value \$.01 per share, underlying options....	100,000	\$ 1.14	\$ 114,000	\$ 15.55
Common Stock, par value \$.01 per share, underlying options....	200,000	\$ 0.90	\$ 180,000	\$ 24.55

Total Registration Fee: \$290.88

(1) Represents 1,655,000 shares of common stock, par value \$.01 per share (the "Common Stock"), of Network-1

Security Solutions, Inc. (the "Company") issuable upon exercise of 21 individual stock option agreements (the "Option Agreements") issued to employees, officers, directors and consultants of the Company. The prospectus included in this Registration Statement pursuant to General Instruction C of Form S-8 covers the reoffer and resale of these shares by the selling shareholders. Pursuant to Rule 457(h)(3), no additional registration fee is being paid with respect to the reoffer and resale of the Common Stock being registered pursuant to this Registration Statement.

(2) Pursuant to Rule 416, this registration statement also covers such indeterminate additional shares of Common Stock as may become issuable as a result of any future anti-dilution adjustment in accordance with the terms of the Option Agreements.

(3) Pursuant to Rule 457(h), based on the price at which the options may be exercised.

EXPLANATORY NOTES

We have prepared this Registration Statement in accordance with the requirements of Form S-8 under the Securities Act of 1933, as amended (the "Securities Act"), to register an aggregate of 1,655,000 shares of our Common Stock issuable to employees, officers, directors and consultants pursuant to 21 individual option agreements (the "Option Agreements").

This Form S-8 includes a Reoffer Prospectus and contains the Form S-3 information required by General Instruction C.1 for Form S-8. The Reoffer Prospectus may be utilized for reofferings and resales of an aggregate of 1,655,000 shares of Common Stock acquired pursuant to the Option Agreements by selling stockholders who may be deemed "affiliates" (as such term is defined in Rule 405 under the Securities Act) of the Company.

PART I

INFORMATION REQUIRED IN THE SECTION 10(A) PROSPECTUS

Item 1. Plan Information*

Item 2. Registrant Information and Employee Plan Annual Information.*

* Information required by Part I to be contained in the Section 10(a) prospectus is omitted from this Registration Statement in accordance with Rule 428 under the Securities Act and the "Note" to Part I of Form S-8. The Registrant will send or give to all participants in the Plan the document(s) containing information required by Part I of Form S-8, as specified in Rule 428(b)(1) promulgated by the Securities and Exchange Commission (the "SEC") under the Securities Act. The Registrant has not filed such documents with the SEC, but such documents, along with the documents incorporated by reference into this Registration Statement pursuant to Item 3 of Part II hereof, shall constitute a prospectus that meets the requirements of Section 10(a) of the Securities Act.

PROSPECTUS

1,655,000 SHARES
NETWORK-1 SECURITY SOLUTIONS, INC.
COMMON STOCK (\$.01 PAR VALUE)

This prospectus relates to the reoffer and resale by certain selling stockholders of 1,655,000 shares of our common stock, par value \$0.01 per share ("Common Stock") that may be issued by us upon exercise of options issued to officers, directors, employees and consultants, pursuant to 21 individual option agreements (the "Option Agreements"). The shares are being reoffered and resold for the account of the selling stockholders and we will not receive any of the proceeds from the resale of the shares.

The selling stockholders have advised us that the resale of their shares may be effected from time to time in one or more transactions on the OTC Bulletin Board, in negotiated transactions or otherwise, at market prices prevailing at the time of the sale or at prices otherwise negotiated. See "Plan of Distribution." We will bear all expenses in connection with the preparation of this prospectus.

Our Common Stock is traded on the OTC Bulletin Board. On February 11, 2013, the closing price for our Common Stock, as reported by the OTC Bulletin Board, was \$1.25.

THE SECURITIES OFFERED IN THIS PROSPECTUS INVOLVE A HIGH DEGREE OF RISK. YOU SHOULD CAREFULLY CONSIDER THE FACTORS DESCRIBED UNDER THE HEADING "RISK FACTORS" BEGINNING ON PAGE 6 OF THIS PROSPECTUS.

NEITHER THE SECURITIES AND EXCHANGE COMMISSION NOR ANY STATE SECURITIES COMMISSION HAS APPROVED OR DISAPPROVED OF THESE SECURITIES OR PASSED UPON THE ADEQUACY OR ACCURACY OF THIS PROSPECTUS. ANY REPRESENTATION TO THE CONTRARY IS A CRIMINAL OFFENSE.

THE DATE OF THIS PROSPECTUS IS FEBRUARY 12, 2013.

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ABOUT THIS PROSPECTUS

This prospectus is part of a registration statement we filed with the Securities and Exchange Commission (the "Commission") and therefore omits certain information in such registration statement. We have also filed exhibits with the registration statement that are not included in this prospectus, and you should refer to the applicable exhibit for a complete description of any statement referring to any document. You can inspect a copy of the registration statement and its exhibits, without charge, at the Commission's public reference room, and can copy such material upon paying the Commission's prescribed rates.

You should rely only on the information and representations provided or incorporated by reference in this prospectus or any related supplement. We have not authorized anyone else to provide you with different information. The Selling Stockholders will not make an offer of these shares in any state where the offer is not permitted. You should not assume that the information in this prospectus or any supplement is accurate as of any date other than the date on the front of those documents.

PROSPECTUS SUMMARY

This summary highlights information contained elsewhere in this prospectus. It does not contain all of the information that you should consider before investing in our common stock. You should read the entire prospectus carefully, including the section entitled "Risk Factors" and our consolidated financial statements and the related notes.

Unless the context otherwise requires, all references to "we," "us," "our," or the "Company" in this prospectus refer to Network-1 Security Solutions, Inc., a Delaware corporation.

THE COMPANY

Our principal business is the acquisition, development, licensing and protection of our intellectual property. We presently own six patents covering various telecommunications and data networking technologies including, among others, patents covering the delivery of power over Ethernet ("PoE") for the purpose of remotely powering network devices, such as wireless access points, IP phones and network based cameras, over Ethernet networks and systems and methods of transmission of audio, video and data in order to achieve high quality of service (QoS). In addition, we continually review opportunities to acquire or license additional intellectual property. Our strategy is to pursue licensing and strategic business alliances with companies in the industries that manufacture and sell products that make use of the technologies underlying our intellectual property as well as with other users of the technology who benefit directly from the technology including corporate, educational and governmental entities.

To date our efforts with respect to our intellectual property have primarily focused on licensing our patent (U.S. Patent No. 6,218,930) covering delivery of power over Ethernet ("PoE") cables (the "Remote Power Patent"). As of December 31, 2012, we had entered into 14 license agreements with respect to our Remote Power Patent which, among others,

include license agreements with Cisco, Extreme Networks, Inc., Netgear, Inc., Microsemi Corporation, Motorola Solutions, Inc. and several other major data networking equipment manufacturers. Our current strategy includes continuing to pursue licensing opportunities for our Remote Power Patent from vendors of PoE equipment in order to resolve possible infringement of the Remote Power Patent by such vendors. We may also acquire additional intellectual property assets in the future to develop, commercialize, license or otherwise monetize such intellectual property. In addition, we may enter into strategic relationships with third parties to develop, commercialize, license or otherwise monetize their intellectual property. The form of such relationships may differ depending upon the opportunity and may include, among other things, a strategic investment in such third party, the provision of financing to such third party or the formation of a joint venture with such third party for the purpose of monetizing their intellectual property assets.

Our Remote Power Patent relates to several technologies which describe a methodology for controlling the delivery of power to certain devices over an Ethernet network. Ethernet is the leading local area networking technology in use today. PoE technology allows for the delivery of PoE cables rather than by separate power cords. As a result, a variety of network devices, including IP telephones, wireless LAN Access Points, web-based network security cameras, data collection terminals and other network devices, are able to receive power over existing data cables without the need to modify the existing infrastructure to facilitate the provision of power for such devices through traditional AC outlets. Advantages such as lower installation costs, remote management capabilities, lower maintenance costs, centralized power backup, and flexibility of device location as well as the advent of worldwide power compatibility, create the possibility of PoE becoming widely adopted in networks throughout the world.

PoE provides numerous benefits including quantifiable returns on investment. The cost of hiring electricians to pull power cables to remote locations used for access points or security cameras can rival or exceed the cost of the devices. Another key benefit is the need for Voice over IP power reliability in the face of power failures. Using PoE enables data center power supply systems to ensure ongoing power – a function that would be difficult and expensive to implement if each phone required AC outlets.

Our future success is largely dependent upon our proprietary technologies, our ability to protect our intellectual property rights, to consummate license agreements with respect to our intellectual property as well as our ability to acquire additional intellectual property assets or enter into strategic relationships with third parties to license or otherwise monetize their intellectual property. The complexity of patent and common law and the inherent uncertainty of litigation creates risks that our efforts to protect our intellectual property rights, or those of our strategic partners, may not be successful. We cannot be assured that such intellectual property will be upheld, or that third parties will not invalidate such intellectual property rights. In addition, we may not be able to (i) acquire additional intellectual property assets or successfully license such assets or (ii) successfully enter into strategic relationships with third parties to license or otherwise monetize their intellectual property.

We were incorporated under the laws of the State of Delaware in July 1990. Our executive offices are located at 445 Park Avenue, Suite 1020, New York, New York 10022 and our telephone number at that address is (212) 829-5770. Our web site can be found at <http://www.network-1.com>.

Pending Litigation Against Major Data Networking Equipment Manufacturers

In September 2011, we initiated patent litigation against sixteen (16) data networking equipment manufacturers in the United States District Court for the Eastern District of Texas, Tyler Division, for infringement of our Remote Power Patent. Named as defendants in the lawsuit (excluding related parties) were Alcatel-Lucent USA, Inc., Allied Telesis, Inc., Avaya Inc., AXIS Communications Inc., Dell, Inc., GarrettCom, Inc., Hewlett-Packard Company, Huawei Technologies USA, Juniper Networks, Inc., Motorola Solutions, Inc., NEC Corporation, Polycom Inc., Samsung Electronics Co., Ltd., ShoreTel, Inc., Sony Electronics, Inc. and Transition Networks, Inc. Network-1 seeks monetary damages based upon reasonable royalties. In March 2012, we reached settlement agreements with defendants Motorola Solutions, Inc. ("Motorola") and Transition Networks, Inc. ("Transition Networks"). In October 2012, we reached a settlement agreement with defendant GarretCom, Inc. ("GarretCom"). As part of the settlements, Motorola, Transition Networks and GarretCom each entered into a non-exclusive license agreement for our Remote Power Patent pursuant to which each such defendant agreed to license our Remote Power Patent for its full term (which expires in March 2020) and pay a license initiation fee and quarterly or annual royalties based on their sales of PoE products.

July 2010 Settlement and Licenses with Major Networking Equipment Manufacturers

In July 2010, we agreed to settle our patent litigation pending in the United States District Court for the Eastern District of Texas, Tyler Division, against Adtran, Inc, Cisco Systems, Inc. and Cisco-Linksys, LLC, (collectively, "Cisco"), Enterasys Networks, Inc., Extreme Networks, Inc., Foundry Networks, Inc., and 3Com Corporation, Inc. As part of the settlement, Adtran, Cisco, Enterasys, Extreme Networks and Foundry Networks each entered into a settlement agreement with us and entered into non-exclusive licenses for our Remote Power Patent (the "Licensed Defendants"). Under the terms of the licenses, the Licensed Defendants paid us aggregate upfront payments of approximately \$32 million and also agreed to license our Remote Power Patent for its full term, which expires in March 2020. In accordance with our Settlement and License Agreement with Cisco, dated May 25, 2011 (the "Agreement"), which expanded upon the July 2010 agreement, Cisco is obligated to pay us royalties (which began for the first quarter of 2011) based on its sales of PoE products up to maximum royalty payments per year of \$8 million through 2015 and \$9 million per year thereafter for the remaining term of the patent. The royalty payments are subject to certain conditions including the continued validity of our Remote Power Patent, and the actual royalty amounts received may be less than the caps stated above, as was the case in 2012 and 2011. Under the terms of the Agreement, if we grant other licenses with lower royalty rates to third parties (as defined in the Agreement), Cisco shall be entitled to the benefit of the lower royalty rates provided it agrees to the material terms of such other license. Under the terms of the Agreement, we have certain obligations to Cisco and if we materially breach such terms, Cisco will be entitled to stop paying royalties to us. This would have a material adverse effect on our business, financial condition and results of operations.

Ex Parte Reexamination – Remote Power Patent

On July 20, 2012, an unknown third party filed with the United States Patent and Trademark Office (USPTO) a request for an Ex Parte Reexamination, requesting that our Remote Power Patent be reexamined by the USPTO. The initial grant of the reexamination by USPTO is not unusual as the majority of such applications are initially granted. While we believe that the reexamination proceeding will further validate and strengthen our Remote Power Patent, should the USPTO reach a final determination that the Remote Power Patent is invalid (unless overturned by the Board of Patent Appeals and Interference or the United States Court of Appeals for the Federal Court), such a determination would have a material adverse effect on the Company as our entire current revenue stream is dependent upon the continued validity of our Remote Power Patent.

Patent Acquisition Agreement

On September 13, 2012, we entered into a Patent Purchase Agreement with a third party inventor pursuant to which we have the right to acquire four patents and one pending patent application pertaining to the identification of online media works for a purchase price of \$1,000,000 in cash and \$500,000 of our common stock. The acquisition is subject to certain material conditions which are required to be satisfied prior to the closing.

RISK FACTORS

An investment in our Common Stock involves a high degree of risk. The risk factors listed below are those that we consider to be material to an investment in our Common Stock and those which, if realized, could have material adverse effects on our business, financial condition or results of operations as specifically discussed below. In such an event, the trading price of our Common Stock could decline, and you could lose all or part of your investment. Before you invest in our Common Stock, you should be aware of various risks, including those described below. You should carefully consider these risk factors, together with all of the other information included or incorporated by reference in this prospectus, before you decide whether to purchase our Common Stock. This section includes or refers to certain forward-looking statements. You should refer to the explanation of the qualifications and limitations on such forward-looking statements discussed on page 17.

We operate in a changing environment that involves numerous known and unknown risks and uncertainties that could materially adversely affect our operations. The following highlights some of the factors that have affected, and in the future could affect, our operations.

We have only been profitable in recent years.

We achieved net income of \$2,854,000 for the nine months ended September 30, 2012 and \$8,493,000 for the year ended December 31, 2011 which includes income of \$6,903,000 recorded as a one-time, non-cash income tax benefit (See Note F to our financial statements included in our Annual Report for the year ended December 31, 2011). In addition, we achieved net income of \$19,236,000 for the year ended December 31, 2010 primarily due to our receipt of \$31,145,000 from our patent infringement litigation settlement

achieved in July 2010. Prior to the year ended December 31, 2010 we incurred substantial operating losses since inception (July 1990) and as of September 30, 2012 we had an accumulated deficit of \$(29,825,000). We had revenue of \$7,809,000, \$7,398,000 and \$33,037,000 from operations for the nine months ended September 30, 2012 and the years ended December 31, 2011 and December 31, 2010, respectively. Our ability to achieve revenue and generate positive cash flow from operations is currently dependent upon receipt of royalty revenue from licensing agreements with respect to our Remote Power Patent. As of the date hereof, we have entered into fourteen (14) license agreements with respect to our Remote Power Patent, which among others, includes license agreements with Cisco Systems, Inc. and Cisco-Linksys, Microsemi Corporation, Extreme Networks, Inc., Netgear, Inc., Motorola Systems, Inc., and several other major data equipment manufacturers. While we believe based on our current cash position and projected licensing revenue from our existing licensing agreements we will have sufficient cash to fund our operations for the foreseeable future, this may not be the case.

Our success is dependent upon our ability to protect our patents.

Our success is substantially dependent upon our proprietary technologies and our ability to protect our intellectual property rights. We currently hold six patents issued by the U.S. Patent and Trademark Office that relate to various telecommunications and data networking technologies and include among other things, our Remote Power Patent covering the delivery of power to certain devices over PoE networks and patents covering the transmission of audio, voice and data over computer and telephony networks. Our focus to date has been on licensing our Remote Power Patent. We rely upon our patents and trade secret laws, non-disclosure agreements with our employees, consultants and third parties to protect our intellectual property rights. The complexity of patent and common law and the uncertainty of the outcome of litigation create risk that our efforts to protect our proprietary technologies may not be successful. We cannot assure you that our patents will be upheld or that third parties will not invalidate our patent rights. If our intellectual property rights are not upheld, particularly our Remote Power Patent, such an event would have a material adverse effect on our business, financial condition and results of operations.

Any litigation to protect our intellectual property or any third party claims to invalidate our patents could have a material adverse effect on our business.

In the future, it may be necessary for us to commence patent litigation against third parties whom we believe require a license to our patents, as was the case with respect to our pending litigation against 13 data equipment manufacturers commenced in September 2011. We may incur significant expenses and commit significant management time with respect to such legal proceedings which may adversely affect our financial condition and results of operations. Moreover, there can be no assurance that we would be successful in any additional legal proceedings and the outcome of such litigation could be harmful to us. In addition, we may be subject to claims seeking to invalidate our patents, as typically asserted by defendants in patent litigation. If we are unsuccessful in enforcing and validating our patents and/or if third parties making claims against us seeking to invalidate our patents are successful, they may be able to obtain injunctive or other equitable relief, which effectively could block our ability to license or otherwise capitalize on our proprietary technologies. In addition, then existing licensees of our patents may no longer be obligated to pay royalties to us. Successful litigation against us resulting in a determination that our patents are not valid or enforceable, and/or that third parties do not infringe, may have a material adverse effect on us.

Our current revenue and profit is currently dependent upon the continued validity of our Remote Power Patent.

We currently have 10 license agreements pursuant to which licensees have an obligation to pay us royalties on a quarterly or monthly basis. Such royalty bearing licenses include, among others, agreements with Cisco Systems, Inc. and Cisco-Linksys, LLC, Microsemi Corporation, Netgear and Motorola Solutions, Inc. The obligation of licensees of our Remote Power Patent to continue to make royalty payments to us is contingent upon the continued validity of our Remote Power Patent. In the future it may be necessary for us to commence patent litigation against third parties who we believe require a license to our Remote Power Patent which is the case with respect to our pending litigation against 13 data networking equipment manufacturers in the United States District Court for the Eastern District of Texas, Tyler Division (See Note D to our financial statements included in our Quarterly Report on Form 10-Q for the period ended September 30, 2012). In addition, we may be subject to claims seeking to invalidate our Remote Power Patent. In the event our Remote Power Patent was determined to be invalid, or unenforceable, or that third parties do not infringe, licensees of our Remote Power Patent may have no further obligation to make royalty payments to us. Successful litigation against us resulting in a determination that our Remote Power Patent is not valid or enforceable, or that third parties do not infringe, would have a material adverse effect on our business, financial condition and results of operations.

An Adverse Ruling by the USPTO (which is not subsequently overturned) with respect to the reexamination of our Remote Power Patent would have a material adverse effect on us.

On July 20, 2012, an unknown third party filed with the United States Patent and Trademark Office ("USPTO") a Request for Ex Parte Reexamination requesting that our Remote Power Patent be reexamined by the USPTO. On September 5, 2012, the USPTO issued an order granting the reexamination. The initial grant of the reexamination by USPTO is not unusual as the majority of such applications are initially granted. While we believe that the reexamination proceeding will further validate and strengthen our Remote Power Patent, should the USPTO reach a final determination that the Remote Power Patent is invalid (unless overturned by the Board of Patent Appeals and Interference or the United States Court of Appeals for the Federal Circuit), such a determination would have a material adverse effect on our business, financial condition and results of operations as our entire current revenue stream is dependent upon the continued validity of our Remote Power Patent.

We may not be able to capitalize on our strategy to acquire additional patents or enter into strategic relationships with third parties to license or otherwise monetize their intellectual property.

As a result of our settlement of patent litigation in July 2010 and the success we have achieved to date from licensing our Remote Power Patent, we believe we have the expertise and sufficient capital to compete in the intellectual property acquisition market and to enter strategic relationships with third parties to develop, commercialize, license or otherwise monetize their intellectual property. However, beside the six patents we acquired in November 2003, including our Remote Power Patent, while we continue to evaluate numerous opportunities we have not acquired any additional patents and we have not yet entered into any strategic relationships with third parties to license or otherwise monetize

their intellectual property. Accordingly, we may not be able to acquire additional intellectual property or, if acquired, we may not achieve material revenue from such intellectual property. Furthermore, we may not be able to enter into strategic relationships with third parties to license or otherwise monetize their intellectual property and, even if we consummate such strategic relationships, we may not achieve material revenue or profit from such relationships. Acquisitions of patent assets are competitive, time consuming, complex and costly to consummate. Even if we successfully acquire particular patent assets, there is no assurance that we will generate sufficient revenue related to those patent assets to offset the acquisition costs and the legal fees and expenses which may be incurred to license or otherwise monetize such patents.

We are currently largely dependent upon our license agreement with Cisco for a significant portion of our royalty revenue. The loss of Cisco as a licensee would seriously hurt our business.

Cisco Systems, Inc. and Cisco Linksys, LLC (collectively, "Cisco") accounted for 87% and 79% of our revenue for the years ended December 31, 2011 and December 31, 2010, respectively. In accordance with our Settlement and License Agreement, dated May 25, 2011, with Cisco (the "Agreement"), which expanded upon the short form settlement agreement entered into in July 2010, Cisco is obligated to pay us royalties on a quarterly basis (which began in the first quarter of 2011) based on its sale of PoE products in the United States up to the maximum royalties per year of \$8 million through 2015 and \$9 million per year thereafter for the remaining term of the patent. The royalty payments are subject to certain conditions including the continued validity of our Remote Power Patent and the actual royalty payments may be less than the caps stated above, as was the case for 2012 and 2011. Due to our annual royalty rate structure with Cisco which includes declining rates as the volume of PoE product sales increase during the year, annual royalties from Cisco are anticipated to be highest in the first quarter and decline for each of the remaining quarters of the year. Under the terms of the Agreement, if we grant other licenses with lower royalty rates to third parties (as defined in the Agreement), Cisco shall be entitled to the benefit of the lower royalty rates provided it agrees to the material terms of such other license. Under the terms of the Agreement, we have certain obligations to Cisco and if we materially breach such terms, Cisco will be entitled to stop paying royalties to us. This would have a material adverse effect on our business, financial condition and results of operations.

Our current licenses for our Remote Power Patent may not continue to result in significant royalties and do not necessarily mean we will achieve additional license agreements.

For the years ended December 31, 2011 and December 31, 2010, we earned aggregate royalty payments of \$7,398,000 and \$33,037,000, respectively, with respect to our license agreements for our Remote Power Patent which in 2010 included aggregate up-front payments of approximately \$32 million upon settlement of our patent litigation in July 2010 with several major data networking equipment manufacturers (See Note J[2] to our financial statements included in our Annual Report for the year ended December 31, 2011). We currently have license agreements for our Remote Power Patent with, among others, Cisco Systems, Inc. and Cisco Linksys, LLC, (collectively, "Cisco") Netgear, Inc., Microsemi Corporation and Motorola Solutions, Inc. pursuant to which such parties are obligated to pay

us on-going royalties on a monthly or quarterly basis. Notwithstanding such royalty bearing license agreements, we may not continue to achieve significant royalty revenue from such license agreements. In addition, we may not be able to achieve additional material license agreements with third parties relating to our Remote Power Patent. Our failure to continue to achieve significant royalty revenue from our existing license agreements, would have a material adverse effect on our business, financial condition and results of operations. In addition, we may not be able to consummate additional licensing agreements resulting in material revenue with respect to our Remote Power Patent.

Our current business depends upon the continued viability of the PoE market.

Ethernet is the leading local area networking technology in use today. PoE technology allows for the delivery of power over Ethernet ("PoE") cables rather than by separate power cords. As a result a wide variety of network devices, including IP telephones, wireless LAN access points, web-based network security cameras, data collection terminals and other network devices are able to receive power over existing data cables. To date the market for PoE has continued to expand. The failure of the PoE market to remain viable would have a material adverse effect on licensing revenue for our Remote Power Patent which is currently our sole patent generating licensing revenue.

A limited number of our licensees account for a significant portion of our total revenues.

One of our licensees, Cisco Systems, Inc. and Cisco-Linksys, LLC (collectively, "Cisco"), accounted for 80% of our revenue for the nine months ended September 30, 2012 and 87% of our revenue for the year ended December 31, 2011. It is anticipated that a few licensees will continue to constitute a significant portion of our revenue for the foreseeable future. To the extent such sales of PoE products by our significant licensees are adversely affected our revenues will be significantly impacted.

Our pending litigation against 13 data networking equipment manufacturers may be time consuming and costly and we can provide no assurance that we will be successful in our lawsuit.

In September 2011, we initiated patent litigation against 16 data networking equipment manufacturers in the United States District of Texas, Tyler Division, for infringement of our Remote Power Patent. Named as defendants in the lawsuit, excluding related parties, were Alcatel-Lucent USA, Inc., Allied Telesis, Inc., Avaya Inc., AXIS Communications Inc., Dell, Inc., GarrettCom, Inc., Hewlett-Packard Company, Huawei Technologies USA, Juniper Networks, Inc., Motorola Solutions, Inc., NEC Corporation, Polycom Inc., Samsung Electronics Co., Ltd., ShoreTel, Inc., Sony Electronics, Inc., and Transitions Networks, Inc. Network-1 seeks monetary damages based upon reasonable royalties. In March 2012, we reached settlement agreements with defendants Motorola Solutions, Inc. ("Motorola") and Transition Networks, Inc. ("Transition Networks"). In October 2012, we reached a settlement with defendant GarretCom, Inc. ("GarretCom"). As part of the settlements, Motorola, Transition Networks and GarretCom each entered into a non-exclusive license agreement for our Remote Power Patent pursuant to which each such defendant agreed to license our Remote Power Patent for its full term (which expires in March 2020) and pay a license initiation fee and quarterly or annual royalties based on their sales of PoE products.

Patent litigation is inherently risky and the outcome is uncertain. The defendants are all large, well-financed companies with substantially greater resources than us. We cannot assure you that this lawsuit will result in a final outcome that is favorable to us.

We anticipate that the litigation could continue for a number of years and while we have a contingent legal fee arrangement with our patent litigation counsel, we are responsible for a portion of the expenses which are anticipated to be material. The time and effort required of our management to effectively pursue this litigation is likely to be significant and it may adversely affect other business opportunities.

We face intense competition to acquire intellectual property and enter into strategic relationships.

With respect to our ability to acquire additional intellectual property or enter into strategic relationships with third parties to monetize their intellectual property, we face considerable competition from other companies, many of which have significantly greater financial and other resources than we have. The patent licensing and enforcement industry has grown over the past several years and there has been an increase in the number of companies seeking to acquire intellectual property rights from third parties. Entities including, among others, Acacia Research Corporation, Altitude Capital Partners, Intellectual Ventures, Millenium Partners and RPX Corporation also seek to acquire or partner with third parties to license or enforce intellectual property rights. It is expected that others will enter this market as well. Many of these competitors have significantly more financial and human resources than us.

New legislation, regulations or court rulings related to enforcing patents could adversely affect our business and operating results.

If Congress, the United States Patent and Trademark Office or courts implement new legislation, regulations or rulings that impact the patent enforcement process or the rights of patent holders, these changes could negatively affect our business and operating results. This, in turn, could reduce the value of our patents including our Remote Power Patent, as well as patents owned by third parties that we may enter into strategic relationships with. For example, limitations on the ability to bring patent enforcement claims, limitations on the number of defendants that can be joined in a single patent litigation, limitations on potential liability for patent infringement, lower evidentiary standards and new procedures for invalidating patents, increased difficulty for parties making patent assertions to obtain injunctions, and other similar developments could negatively affect our ability to assert our patent rights successfully, decrease the revenue associated with asserting or licensing our patent rights and increase the cost of bringing patent enforcement actions. Any of these events could result in a material adverse effect on our business and operating results.

Our quarterly and annual operating and financial results and our revenue are likely to fluctuate significantly in future periods.

Our quarterly and annual operating and financial results are difficult to predict and may fluctuate significantly from period to period. Our revenue and net income were \$7,809,000 and \$2,854,000, respectively, for the nine months ended September 30, 2012. Our revenue was \$7,398,000 with net income of \$8,493,000 (including net income of \$6,903,000 related to the recording of a deferred tax benefit) for the year ended December 31, 2011 as compared to revenue of \$33,037,000 and net income of \$19,236,000 for the year ended December 31, 2010 (which 2010 revenue and net income were primarily due to achieving a large settlement of a patent litigation in July 2010). Our revenues, net income and results of operations may fluctuate as a result of a variety of factors that are outside our control including, but not limited to, our ability and timing in consummating future license agreements for our intellectual property, the timing and extent of royalty payments received by us from our licensees of our Remote Power Patent, the timing and our ability to achieve successful outcomes from current and future patent litigation, and the timing and our ability to achieve revenue from future strategic relationships.

We may need additional financing to implement our strategy and expand our business.

We may need additional equity or debt financing beyond our existing cash to pursue our strategy including the acquisition of additional intellectual property or to enter into strategic relationships with third parties to license or monetize their intellectual property. Any additional financing that we need may not be available and, if available, may not be available on terms that are acceptable to us. Our failure to obtain financing on a timely basis, or on economically favorable terms, could prevent us from pursuing our intellectual property acquisition strategy or from responding to changing business or economic conditions and could cause us to experience difficulty in withstanding adverse operating results.

We do not intend to pay regular future dividends on our common stock and thus stockholders must look to appreciation of our common stock to realize a gain on their investments.

Although we paid a special cash dividend of \$0.10 per share to holders of our common stock with a record date of December 13, 2010, we did not pay any dividends in 2012 and 2011 and we do not have any plans to pay dividends in the foreseeable future. Our future dividend policy is within the discretion of our board of directors and will depend upon various factors, including future earnings, if any, operations, capital requirements, our general financial condition, the preferences of any series of preferred stock, our general business conditions and future contractual restrictions on payment of dividends, if any. Accordingly, stockholders must look solely to appreciation of our common stock to realize a gain on their investment. This appreciation may not occur.

Because ownership of our common stock is concentrated, investors may have limited influence on stockholder decisions.

As of December 31, 2012, our executive officers and directors beneficially owned 31.1% of our outstanding common stock. As a result, these stockholders may be able to exercise substantial control over all matters requiring stockholder approval, including the election of directors and approval of significant corporate transactions, such as a merger or other sale of our company or its assets. This concentration of ownership will limit your ability to influence corporate matters and may have the effect of delaying or preventing a third party from acquiring control over us. For information regarding the ownership of our outstanding stock by our executive officers and directors and their affiliates, see "Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters" on page 41 of our Annual Report on Form 10-K for the year ended December 31, 2011.

Our markets are subject to rapid technological change and our technologies face potential technology obsolescence.

The telecommunications and data networking technology market, including transmission of audio, video and data over computer and telephony networks and the delivery of remote PoE markets, are characterized by rapid technological changes, changing customer requirements, frequent new product introductions and enhancements, and evolving industry standards. The introduction of products embodying new technologies and the emergence of new industry standards may render our technologies obsolete or less marketable.

In addition, other companies may develop competing technologies that offer better or less expensive alternatives to PoE and the other technologies covered by our intellectual property. Several companies have notified the IEEE that they may have patents and proprietary technologies that are covered by the Standard. In the event any of those companies asserts claims relating to our patents, the licensing royalties available to us may be limited. Moreover, technological advances or entirely different approaches developed by one or more of our competitors or adopted by various standards groups could render our Remote Power Patent obsolete, less marketable or unenforceable.

Dependence upon CEO and Chairman.

Our success is largely dependent upon the personal efforts of Corey M. Horowitz, our Chairman and Chief Executive Officer and Chairman of our Board of Directors. On November 1, 2012, we entered into an employment agreement with Mr. Horowitz pursuant to which he continues to serve as our Chairman and Chief Executive Officer for a one year period (which shall automatically be extended for two successive one year periods unless terminated by the Company). However, the loss of the services of Mr. Horowitz would have a material adverse effect on our business and prospects. We do not maintain key-man life insurance on the life of Mr. Horowitz.

The burdens of being a public company may adversely affect our ability to pursue litigation.

As a public company, our management must devote substantial time, attention and financial resources to comply with U.S. securities laws. This may have a material adverse effect on management's ability to effectively and efficiently pursue litigation as well as our other business initiatives. In addition, our disclosure obligations under U.S. securities laws require us to disclose information publicly that will be available to future litigation opponents. We may, from time to time, be required to disclose information that may have a material adverse affect on our litigation strategies. This information may enable our litigation opponents to develop effective litigation strategies that are contrary to our interests.

Because our common stock trades on the Over-the-Counter Bulletin Board, you may not be able to buy and sell our common stock at optimum prices and you face liquidity issues.

The Over-the-Counter Bulletin Board ("OTCBB") is a regulated quotation service that displays quotes, last sales prices and volume in over-the-counter securities. The trading of our stock on the OTCBB imposes, among others, the following risks:

Availability of quotes and order information – Because OTCBB trades and quotations involve a manual process (over the telephone) rather than automated or electronically linked execution systems, the market information for our common stock cannot be guaranteed. In addition, quote information, or even firm quotes, may not be available. The manual execution process may delay order processing and intervening price fluctuations could result in the failure of a limit order to execute or the execution of a market order at a significantly different price. Execution of trades, execution reporting, and the delivery of trade confirmations may be delayed significantly. Consequently, one may not be able to sell shares of our common stock at the optimum trading prices.

Liquidity Risks – Liquidity refers to the ability to freely buy and sell securities at given prices and volumes. In general, the more activity in a given security, and the more market makers participating in a security, the greater the liquidity in the security. Because the OTC Bulletin Board generally has fewer market makers participating in a Bulletin Board security, the liquidity in our common stock may be significantly less than what might be experienced in the NASDAQ or listed markets. As such, you may only receive a partial execution or your order may not be executed at all. Additionally, the price received on a market order may be significantly different from the price quoted at the time of order entry. Additionally, when fewer shares of our common stock are being traded, larger spreads between bid and ask prices and volatile swings in price may result.

Dealer's Spread – The dealer's spread (the difference between the bid and ask prices) of our security may be large and may result in substantial losses to the seller of our common stock on the OTCBB if the common stock must be sold immediately. Further, purchasers of our common stock may incur an immediate "paper" loss due to the price spread. Moreover, dealers trading on the OTCBB may not have a bid price for securities bought and sold through the OTCBB. Due to the foregoing, there may be decreased demand for our common stock traded through the OTCBB.

The significant number of options and warrants outstanding may adversely affect the market price for our common stock.

As of December 31, 2012, there are outstanding options and warrants to purchase an aggregate of 5,832,500 shares of our common stock at exercise prices ranging from \$0.21 to \$1.60. To the extent that outstanding options and warrants are exercised, existing stockholder percentage ownership will be diluted and any sales in the public market of the common stock underlying such options may adversely affect prevailing market prices for our common stock.

We may seek to raise additional funds, finance intellectual property acquisitions or develop strategic relationships by issuing capital stock that would dilute your ownership.

Prior to the significant royalty revenue achieved in July 2010 as a result of settlement of our patent litigation agreement with major data networking equipment manufacturers, we had largely financed our operations by issuing equity securities, which, if conducted in the future, would materially reduce the percentage ownership of our existing stockholders. Furthermore, any newly issued securities could have rights, preferences and privileges senior to those of our existing common stock. Moreover, any issuances by us of equity securities may be at or below the prevailing market price of our stock and in any event may have a dilutive impact on your ownership interest, which could cause the market price of stock to decline. We may also raise additional funds through the incurrence of debt or the issuance or sale of other securities or instruments senior to our common shares. The holders of any debt securities or instruments we may issue could have rights superior to the rights of our common stockholders.

Future sales of shares of our common stock may cause the prevailing market price of our shares to decline and could harm our ability to raise additional capital.

We have previously issued a substantial number of shares of common stock, which are eligible for resale under Rule 144 of Securities Act of 1933, and may become freely tradable. We have also registered a substantial number of shares including shares that are issuable upon the exercise of options and warrants. In addition, if holders of options and warrants choose to exercise their purchase rights and sell shares of common stock in the public market or if holders of currently restricted common stock or registered common stock sell such shares in the public market, or attempt to publicly sell such shares in a short time period, the prevailing market price for our common stock may decline. Such decline in the price of our common stock may also adversely affect our ability to raise additional capital.

Provisions in our corporate charter and in Delaware law could make it more difficult for a third party to acquire us, could discourage a takeover and adversely affect existing stockholders.

Our certificate of incorporation authorizes the board of directors to issue up to 10,000,000 shares of preferred stock. The preferred stock may be issued in one or more series, the terms of which may be determined at the time of issuance by our Board of Directors, without further action by stockholders, and may include, among other things, voting rights (including the right to vote as a series on particular matters), preferences as to dividends and liquidation, conversion and redemption rights, and sinking fund provisions, any of which could adversely affect holders of our common stock. Although there are currently no shares of preferred stock outstanding, future holders of preferred stock may have rights superior to our common stock and such rights could also be used to restrict our ability to merge with, or sell our assets to third parties.

We are also subject to the “anti-takeover” provisions of Section 203 of the Delaware General Corporation Law, which could prevent us from engaging in a “business combination” with a 15% or greater stockholder for a period of three years from the date such person acquired that status unless appropriate board or stockholder approvals are obtained.

These provisions could deter unsolicited takeovers or delay or prevent changes in our control or management, including transactions in which stockholders might otherwise receive a premium for their shares over the then current market price. These provisions may also limit the ability of stockholders to delay, deter or prevent a change of control, or approve transactions that they may deem to be in their best interests.

Our stock price may be volatile.

The market price of our common stock is likely to be highly volatile and could fluctuate widely in price in response to various factors, many of which are beyond our control, including the following:

our ability to successfully enforce and/or defend our Remote Power Patent;

our ability to continue to receive material revenue from licensees of our Remote Power Patent;

our ability to enter into favorable license agreements with third parties with respect to our Remote Power Patent;

our ability to acquire additional intellectual property;

our ability to achieve material revenue and profits;

our ability to enter into strategic relationships with third parties to license or otherwise monetize their intellectual property

our ability to raise capital when needed;

sales of our common stock;

our ability to execute our business plan;

technology changes;

legislative, regulatory and competitive developments; and

economic and other external factors.

In addition, the securities markets have from time to time experienced significant price and volume fluctuations that are unrelated to the operating performance of particular companies. These market fluctuations may also materially and adversely affect the market price of our common stock.

WHERE YOU CAN FIND MORE INFORMATION

We file annual, quarterly and current reports and other information with the SEC (File No. 001-15288). You may read and copy these reports and other information at the SEC's Public Reference Room at 100 F Street, N.E., Washington, D.C. 20549. You may obtain information on the operation of the SEC's Public Reference Room by calling the SEC at 1-800-SEC-0330. Copies may be obtained from the SEC by paying the required fees. The SEC maintains an internet website that contains all our electronic filings and the filings of other issuers that file electronically with the SEC. The SEC's website is <http://www.sec.gov>. Our SEC filings are also available to the public over the Internet at the SEC's web site at <http://www.sec.gov>.

INCORPORATION OF CERTAIN DOCUMENTS BY REFERENCE

The SEC allows us to "incorporate by reference" into this prospectus information we file with them, which means that we can disclose important information to you by referring to documents we have previously filed with the SEC. The information incorporated by reference is considered to be part of this prospectus, and information that we file later with the SEC will automatically update and supersede this information. Except to the extent that information is deemed furnished and not filed pursuant to securities laws and regulations, we incorporate by reference the documents listed below and any future documents we file with the SEC under Sections 13(a), 13(c), 14 or 15(d) of the Securities

Exchange Act of 1934 (the “Exchange Act”), until we terminate this offering:

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1. Our Annual Report on Form 10-K for the year ended December 31, 2011 (filed March 9, 2012);
2. Our Quarterly Reports on Form 10-Q for the periods ended March 31, 2012 (filed May 15, 2012), June 30, 2012 (filed August 14, 2012 and amendment filed September 7, 2012), and September 30, 2012 (filed November 14, 2012);
3. Our current reports on Form 8-K filed on February 2, 2012, February 3, 2012, April 4, 2012, April 4, 2012, April 13, 2012, April 13, 2012, October 1, 2012, October 23, 2012, November 2, 2012 and January 30, 2013; and
4. The description of our Common Stock incorporated by reference in our Registration Statement on Form 8-A (filed October 9, 1998), as amended on November 3, 1998.

Any statement contained in a document incorporated or deemed to be incorporated by reference herein shall be deemed to be modified or superseded for purposes of this Registration Statement to the extent that a statement contained herein or in any other subsequently filed document which is also or is deemed to be incorporated by reference herein modifies or supersedes such statement. Any such statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute a part of this Registration Statement.

We will provide at no cost to each person, including any beneficial owner, to whom a prospectus is delivered, upon written or oral request, a copy of any or all of the information that has been incorporated by reference in the prospectus but not delivered with the prospectus, excluding the exhibits to such filings that we have not specifically incorporated by reference in such filings. You should direct such requests to us at 445 Park Avenue, Suite 1020, New York, New York 10021, Attention: Corey M. Horowitz, Chairman and Chief Executive Officer, telephone number (212) 829-5770.

NOTE REGARDING FORWARD-LOOKING STATEMENTS

This prospectus contains certain forward-looking statements that are statements that include information based upon beliefs of our management, as well as assumptions made by and information available to our management. Statements containing terms such as "believes," "expects," "anticipates," "intends" or similar words are intended to identify forward-looking statements.

Our management, based upon assumptions they consider reasonable, has compiled these forward-looking statements. Such statements reflect our current views with respect to future events. These statements involve known and unknown risks and uncertainties that may cause our actual results in future periods to differ materially from what is currently anticipated. We make cautionary statements in certain sections of this prospectus, including under "Risk Factors." You should read these cautionary statements as being applicable to all related forward-looking statements wherever they appear in this prospectus, the materials referred to in this prospectus or the materials incorporated by reference into this prospectus.

You are cautioned that no forward-looking statement is a guarantee of future performance and you should not place undue reliance on any forward-looking statement. Such statements speak only as of the date of this prospectus and we are not undertaking any obligation to publicly release any revisions to these forward-looking statements to reflect events or circumstances after the date of this prospectus or to reflect the occurrence of unanticipated events.

USE OF PROCEEDS

The shares of Common Stock offered by this prospectus are being registered for the account of the selling stockholders identified in this prospectus (See "Selling Stockholders"). All net proceeds from the sale of Common Stock will go to the shareholders who offer and sell their shares. We will not receive any part of the proceeds from

such sales. We will, however, receive the exercise price of the options at the time of their exercise (exclusive of options to purchase shares which are exercised on a “cashless” basis). If all of the options are exercised (assuming no exercise on a “cashless” basis), we will realize proceeds in the amount of \$2,132,550. The proceeds will be contributed to working capital and will be used for general corporate purposes.

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SELLING STOCKHOLDERS

This prospectus relates to the reoffer and resale of shares of common stock ("Common Stock") issued or that may be issued to the selling stockholders upon exercise of options issued to officers, directors, employees and consultants pursuant to 21 individual option agreements. The following table sets forth (i) the number of shares of Common Stock beneficially owned by each selling stockholder as of the date of this prospectus, (ii) the number of shares to be offered for resale by each selling stockholder (i.e., the total number of shares underlying options held by each selling stockholder irrespective of whether such options are presently exercisable or exercisable within sixty days of the date of this prospectus), and (iii) the number and percentage of shares of our Common Stock to be held by each selling stockholder after completion of the offering. All of the selling stockholders have had a material relationship with us within the past three years other than as a result of the ownership of our securities as follows: (i) Corey M. Horowitz is our Chairman and Chief Executive Officer and Chairman of our Board of Directors, (ii) David Kahn is our Chief Financial Officer and Secretary, (iii) Mr. Horowitz, Mr. Ohana, Mr. Harizman, Ms. Hoffman and Mr. Pearlman serve on our Board of Directors, (iv) Mr. Greene and Mr. Maslow have and continue to provide consulting services to us, and (v) Mr. Pons is a former director who resigned from our Board of Directors on December 19, 2012.

NAME(1)	NUMBER OF SHARES BENEFICIALLY OWNED PRIOR TO OFFERING(2)	NUMBER OF SHARES BEING OFFERED(3)	NUMBER OF SHARES OF BENEFICIALLY OWNED AFTER OFFERING(4)	PERCENTAGE OUTSTANDING COMMON STOCK AFTER OFFERING(4)
Corey M. Horowitz	8,542,398 (5)	500,000 (6)	8,459,064	30.3%
David Kahn	348,818 (7)	175,000 (8)	173,118	*
Laurent Ohana	25,000 (9)	50,000 (10)	0	0%
Robert Pons	295,175 (11)	150,000 (12)	145,175	*
Emanuel Pearlman	75,000 (13)	100,000 (14)	0	0%
Jon Greene	457,500 (15)	390,000 (16)	127,500	*
Jonathan Maslow	167,500 (17)	140,000 (18)	0	*
Niv Harizman	12,500 (19)	75,000 (20)	0	0%
Allison Hoffman	12,500 (21)	75,000 (22)	0	0%

* Less than 1%

- (1) Except as otherwise indicated, the address for each beneficial owner is c/o Network-1 Security Solutions, Inc., 445 Park Avenue, Suite 1020, New York, New York 10022.
- (2) Unless otherwise indicated, we believe that all persons named in the above table have sole voting and investment power with respect to all shares of Common Stock beneficially owned by them. A person is deemed to be the beneficial owner of securities that can be acquired by such person within 60 days from the date hereof upon the exercise of options, warrants or convertible securities.
- (3) Consists of shares issuable upon the exercise of options both currently exercisable and not currently exercisable.
- (4) Beneficial ownership of shares held by each selling stockholder after this offering has been calculated, for purposes of this disclosure, by subtracting the number of shares registered for sale by each selling shareholder from that selling shareholder's current beneficial ownership as disclosed in column 2. Beneficial ownership by each selling shareholder as disclosed assumes that each selling stockholder sold all of the shares he or she is offering in this prospectus but actually will depend on the number of shares sold by such selling stockholder in this offering. Each beneficial owner's percentage ownership is determined by assuming that options, warrants and

convertible securities held by such person (but not those held by any other person) and which are exercisable or convertible within 60 days have been exercised or converted. Assumes a base of 24,683,069 shares of Common Stock outstanding.

- (5) Includes (i) 2,247,930 shares of Common Stock held by Mr. Horowitz, (ii) 3,480,834 shares of Common Stock subject to currently exercisable stock options held by Mr. Horowitz, (iii) 2,171,372 shares of Common Stock held by CMH Capital Management Corp., an entity solely owned by Mr. Horowitz, ("CMH"), (iv) 250,000 shares of Common Stock subject to currently exercisable warrants held by Mr. Horowitz, (v) 67,471 shares of Common Stock owned by Donna Slavitt, the wife of Mr. Horowitz, (vi) an aggregate of 322,500 shares of Common Stock held by two trusts and a custodian account for the benefit of Mr. Horowitz's three children and (vii) 2,291 shares of Common Stock held by Horowitz Partners, a general partnership of which Mr. Horowitz is a partner. Does not include 416,666 shares of Common Stock subject to options which are not currently exercisable within 60 days of the date hereof.

- (6) Includes 83,334 shares of Common Stock subject to currently exercisable stock options held by Mr. Horowitz and 416,666 shares of common stock subject to options not currently exercisable within 60 days of the date hereof.
- (7) Includes (i) 299,000 shares of Common Stock subject to currently exercisable stock options issued to Mr. Kahn, (ii) 15,118 shares of common stock and 17,000 shares of common stock subject to currently exercisable options owned by Stephanie Kahn, a daughter of David Kahn, and (iii) 17,000 shares of common stock subject to currently exercisable options owned by Rebecca Kahn, also a daughter of David Kahn. Does not include 18,750 shares of Common Stock which are subject to options not currently exercisable within 60 days of the date hereof.
- (8) Includes 156,250 shares of Common Stock subject to currently exercisable stock options issued to Mr. Kahn and 18,750 shares of Common Stock subject to options which are not currently exercisable within 60 days of the date hereof.
- (9) Includes 25,000 shares of Common Stock subject to currently exercisable options and warrants held by to Mr. Ohana.
- (10) Includes 25,000 shares of Common Stock subject to currently exercisable options held by Mr. Ohana and 25,000 shares of Common Stock subject to options not currently exercisable within 60 days of the date hereof.
- (11) Includes 70,175 shares of Common Stock and 225,000 shares of Common Stock subject to currently exercisable stock options held by to Mr. Pons.
- (12) Includes 150,000 shares of Common Stock subject to currently exercisable options issued to Mr. Pons.
- (13) Includes 75,000 shares of Common Stock subject to currently exercisable stock options issued to Mr. Pearlman. Does not include 25,000 shares of Common Stock subject to options which are not currently exercisable within 60 days of the date hereof.
- (14) Includes 75,000 shares of Common Stock subject to currently exercisable options held by to Mr. Pearlman and 25,000 shares of common stock subject to options not currently exercisable within 60 days of the date hereof.
- (15) Includes 457,500 shares of Common Stock subject to currently exercisable options held by Mr. Greene. Does not include 80,000 shares of Common Stock subject to options which are not currently exercisable or not exercisable within 60 days of the date hereof.
- (16) Includes 330,000 shares of Common Stock subject to options currently exercisable and 60,000 shares of Common Stock subject to options held by Mr. Greene which are not currently exercisable within 60 days of the date hereof.
- (17) Includes 167,500 shares of Common Stock subject to currently exercisable options held by Mr. Maslow. Does not include 22,500 shares of Common Stock subject to options which are not currently exercisable within 60 days of the date hereof.
- (18) Includes 117,500 shares of Common Stock subject to currently exercisable options and 22,500 shares of Common Stock subject to options held by Mr. Maslow which are not currently exercisable within 60 days of the date hereof.
- (19) Includes 12,500 shares of Common Stock subject to currently exercisable options held by Mr. Harizman. Does not include 62,500 shares of Common Stock subject to options held by Mr. Harizman which are not currently exercisable within 60 days of the date hereof.

- (20) Includes 12,500 shares of Common Stock subject to currently executable options and 62,500 shares of Common Stock subject to options held by Mr. Harizman which are not currently exercisable within 60 days of the date hereof.
- (21) Includes 12,500 shares of Common Stock subject to currently exercisable options held by Ms. Hoffman. Does not include 62,500 shares of Common Stock subject to options held by Ms. Hoffman which are not currently exercisable within 60 days of the date hereof.
- (22) Includes 12,500 shares of Common Stock subject to currently exercisable options and 62,500 shares of Common Stock subject to options held by Ms. Hoffman which are not currently exercisable within 60 days of the date hereof.

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PLAN OF DISTRIBUTION

This offering is self-underwritten. Neither we nor the selling stockholders have employed an underwriter for the sale of Common Stock by the selling stockholders. We will bear all expenses in connection with the preparation of this prospectus. The selling stockholders will bear all expenses associated with the sale of their Common Stock. There can be no assurance that the selling stockholders will sell any or all of the shares of Common Stock offered by them under this prospectus or otherwise.

At the time a selling stockholder makes an offer to sell shares, to the extent required by the Securities Act of 1933, as amended (the "Securities Act"), a prospectus will be delivered. If a supplemental prospectus is required, one will be delivered setting forth the number of shares being offered and the terms of the offering.

The selling stockholders may offer their shares of Common Stock directly or through pledgees, donees, transferees or other successors-in-interest in one or more of the following transactions:

ordinary brokerage transactions in which the broker-dealer solicits purchasers;

block trades in which the broker-dealer will attempt to sell the shares as agent but may position and resell a portion of the block as principal to facilitate the transaction;

purchases by a broker-dealer as principal and resale by the broker-dealer for its account;

an exchange distribution in accordance with the rules of the applicable exchange;

privately negotiated transactions;

broker-dealers may agree with the selling stockholders to sell a specified number of such shares at a stipulated price per share;

a combination of any such methods of sale; and

any other method permitted pursuant to applicable law.

The selling stockholders may offer their shares of Common Stock at any of the following prices:

fixed prices that may be changed;

market prices prevailing at the time of sale;

prices related to such prevailing market prices; and

at negotiated prices.

The selling stockholders may effect transactions by selling shares to or through broker-dealers, and all such broker-dealers may receive compensation in the form of discounts, concessions, or commissions from the selling stockholders and/or the purchasers of shares of Common Stock for whom such broker-dealers may act as agents or to whom they sell as principals, or both (which compensation as to a particular broker-dealer might be in excess of customary commissions).

Any broker-dealer acquiring Common Stock from the selling stockholders may sell the shares either directly, in its normal market-making activities, through or to other brokers on a principal or agency basis or to its customers. Any such sales may be at prices then prevailing on the OTC Bulletin Board or at prices related to such prevailing market prices or at negotiated prices to its customers or a combination of such methods. The selling stockholders and any broker-dealers that act in connection with the sale of the Common Stock hereunder might be deemed to be “underwriters” within the meaning of Section 2(11) of the Securities Act; any commission received by them and any profit on the resale of shares as principal might be deemed to be underwriting discounts and commissions under the Securities Act. Any such commissions, as well as other expenses incurred by the selling stockholders and applicable transfer taxes, are payable by the selling stockholders.

The selling stockholders reserve the right to accept, and together with any agent of the selling stockholder, to reject in whole or in part any proposed purchase of the shares of Common Stock. The selling stockholders will pay any sales commissions or other seller’s compensation applicable to such transactions.

We have not registered or qualified offers and sales of shares of the Common Stock under the laws of any country other than the United States. To comply with certain states’ securities laws, if applicable, the selling stockholders will offer and sell their shares of Common Stock in such jurisdictions only through registered or licensed brokers or dealers. In addition, in certain states the selling stockholders may not offer or sell shares of Common Stock unless we have registered or qualified such shares for sale in such states or we have complied with an available exemption from registration or qualification.

The selling stockholders with respect to any purchase or sale of shares of Common Stock are required to comply with Regulation M promulgated under the Securities Exchange Act of 1934, as amended. In general, Rule 102 under Regulation M prohibits any person connected with a distribution of securities (the “Distribution”) from bidding for, purchasing, or attempting to induce any person to bid for or purchase for any account in which he or she has a beneficial interest, any of such securities or any right to purchase such securities, for a period beginning one or more business days before and ending one day after completion of his or her participation in the Distribution (we refer to that time period as the “Distribution Period”).

During the Distribution Period, Rule 104 under Regulation M prohibits the selling stockholders and any other persons engaged in the Distribution from engaging in any stabilizing bid or purchasing of our Common Stock except for the purpose of preventing or retarding a decline in the open market price of our Common Stock. No such person may effect any stabilizing transaction to facilitate any offering at the market. Inasmuch as the selling shareholders will be reoffering and reselling our Common Stock at the market, Rule 104 prohibits them from effecting any stabilizing transaction in contravention of Rule 104 with respect of our Common Stock.

Any shares of Common Stock covered by this prospectus that qualify for sale pursuant to Rule 144 under the Securities Act may be sold under Rule 144 rather than pursuant to this prospectus. There can be no assurance that the selling stockholders will sell any or all of the shares offered by them hereunder or otherwise. To our knowledge, there are currently no plans, arrangements or understandings between the selling stockholders and any underwriter, broker, dealer, agent or other person regarding the sale of Common Stock by the selling stockholders.

LEGAL MATTERS

The validity of the shares of Common Stock offered hereby have been passed upon for us by Eiseman Levine Lehrhaupt & Kakoyiannis, P.C., 805 Third Avenue, New York, New York 10022. Sam Schwartz, a partner of that firm, owns 23,584 shares of our Common Stock as of the date of this prospectus.

EXPERTS

Our financial statements as of December 31, 2011 and 2010 and for each of the years then ended appearing in our annual report on Form 10-K for the year ended December 31, 2011 have been audited by Radin, Glass & Co., LLP, independent registered public accounting firm, as set forth in their report dated March 8, 2012 included in the annual report. Those financial statements are incorporated by reference in this prospectus in reliance upon that report given on the authority of Radin, Glass & Co., LLP as experts in accounting and auditing.

DISCLOSURE OF COMMISSION POSITION ON INDEMNIFICATION FOR SECURITIES ACT LIABILITIES

Our Certificate of Incorporation and Bylaws provide our directors with protection for breaches of their fiduciary duties to us and our shareholders. Insofar as indemnification for liabilities arising under the Securities Act may be permitted to our directors, officers or persons controlling us, we have been advised that it is the SEC's opinion that such indemnification is against public policy as expressed in the Securities Act and is, therefore, unenforceable.

In the event that a claim for indemnification against such liabilities (other than the payment by us of expenses incurred or paid by a director, officer or controlling person in the successful defense of any action, suit or proceeding) is asserted by such director, officer or controlling person in connection with the securities being registered, we will, unless in the opinion of our counsel the matter has been settled by controlling precedent, submit to a court of appropriate jurisdiction the question whether such indemnification by it is against public policy as expressed in the Securities Act and will be governed by the final adjudication of such issue.

NETWORK-1 SECURITY SOLUTIONS, INC.

1,655,000 SHARES OF COMMON STOCK

PROSPECTUS

FEBRUARY 12, 2013

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PART II

INFORMATION REQUIRED IN THE REGISTRATION STATEMENT

ITEM 3. INCORPORATION OF CERTAIN DOCUMENTS BY REFERENCE

Except to the extent that information is deemed furnished and not filed pursuant to securities laws and regulations, the following documents, which we have filed with the Commission are hereby incorporated by reference into this Registration Statement:

- a. Our Annual Report on Form 10-K for the year ended December 31, 2011 (filed March 9, 2012);
- b. All other reports that we have filed pursuant to Section 13(a) or 15(d) since the end of the fiscal year covered by the report referred to in (a) above; and
- c. The description of our Common Stock incorporated by reference in our Registration Statement on Form 8-A (filed October 9, 1998), including any amendments or reports filed for purposes of updating such description.

Except to the extent that information is deemed furnished and not filed pursuant to securities laws and regulations, all documents subsequently filed by the Registrant pursuant to Sections 13(a), 13(c), 14 and 15(d) of the Exchange Act prior to the filing of a post-effective amendment that indicates that all securities offered have been sold or that deregisters all securities then remaining unsold, shall be deemed to be incorporated by reference herein and to be a part hereof from the date of filing of such documents. Any statement contained in a document incorporated or deemed to be incorporated by reference herein shall be deemed to be modified or superseded for purposes of this Registration Statement to the extent that a statement contained herein or in any other subsequently filed document which also is, or is deemed to be, incorporated by reference herein modifies or supersedes such statement. Any statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute a part of this Registration Statement. For the avoidance of doubt, information furnished pursuant to Item 2.02 or 7.01 of any Current Report on Form 8-K shall not be deemed incorporated by reference herein or otherwise to form a part hereof.

ITEM 4. DESCRIPTION OF SECURITIES

Not applicable.

ITEM 5. INTERESTS OF NAMED EXPERTS AND COUNSEL

The validity of the Common Stock offered hereby has been passed upon for us by Eiseman Levine Lehrhaupt & Kakoyiannis, P.C., 805 Third Avenue, New York, New York 10022. Sam Schwartz, a member of that firm, owns as of the date of the filing of this registration statement 23,584 shares of our common stock.

ITEM 6. INDEMNIFICATION OF DIRECTORS AND OFFICERS

The Registrant is a Delaware corporation. Reference is made to Section 102(b)(7) of the General Corporation Law of the State of Delaware (the "DGCL"), which enables a corporation in its original certificate of incorporation or an amendment to eliminate or limit the personal liability of a director for violations of the director's fiduciary duty, except (i) for any breach of the director's duty of loyalty to the corporation or its stockholders, (ii) for acts or omissions not in good faith or which involve intentional misconduct or a knowing violation of law, (iii) under Section 174 of the DGCL (providing for liability of directors for unlawful payment of dividends or unlawful stock purchases or redemptions) or (iv) for any transaction from which a director derived an improper personal benefit.

Reference is also made to Section 145 of the DGCL, which provides that a corporation may indemnify any persons, including officers and directors, who are, or are threatened to be made, parties to any threatened, pending or completed action, suit or proceeding, whether civil, criminal, administrative or investigative (other than an action by or in the right of such corporation), by reason of the fact that such person is or was a director, officer, employee or agent of such corporation or is or was serving at the request of such corporation as a director, officer, employee or agent of another corporation or enterprise. The indemnity may include expenses (including attorneys' fees), judgments, fines and amounts paid in settlement actually and reasonably incurred by such person in connection with such action, suit or proceeding, provided such director, officer, employee or agent acted in good faith and in a manner the person reasonably believed to be in or not opposed to the best interests of the corporation and, with respect to any criminal action or proceeding, had no reasonable cause to believe the person's conduct was unlawful. A Delaware corporation may indemnify officers and directors in an action by or in the right of the corporation under the same conditions, except that no indemnification is permitted without judicial approval if the officer or director is adjudged to be liable to the corporation. Where an officer or director is successful on the merits or otherwise in the defense of any action referred to above, the corporation must indemnify him against the expenses that such officer or director actually and reasonably incurred. The indemnification permitted under the DGCL is not exclusive, and a corporation is empowered to purchase and maintain insurance against liabilities whether or not indemnification would be permitted by statute.

In its Certificate of Incorporation, the Company has included a provision that limits, to the fullest extent now or hereafter permitted by the DGCL, the personal liability of its directors to the Company or its stockholders for monetary damages arising from a breach of their fiduciary duties as directors. Under the DGCL as currently in effect, this provision limits a director's liability except where such director (i) breaches his duty of loyalty to the Company or its stockholders, (ii) fails to act in good faith or engages in intentional misconduct or a knowing violation of law, (iii) authorizes payment of an unlawful dividend or stock purchase or redemption as provided in Section 174 of the DGCL, or (iv) obtains an improper personal benefit. This provision does not prevent the Company or its stockholders from seeking equitable remedies, such as injunctive relief or rescission. If equitable remedies are found not to be available to stockholders in any particular case, stockholders may not have any effective remedy against actions taken by directors that constitute negligence or gross negligence.

The Certificate of Incorporation also includes provisions to the effect that (subject to certain exceptions) the Company shall, to the maximum extent permitted from time to time under the law of the State of Delaware, indemnify, and upon request shall advance expenses to, any director or officer to the extent that such indemnification and advancement of expenses is permitted under such law, as it may from time to time be in effect. In addition, the Bylaws require the Company to indemnify, to the full extent permitted by law, any director, officer, employee or agent of the Company for acts which such person reasonably believes are not in violation of the Company's corporate purposes as set forth in the Certificate of Incorporation. At present, the DGCL provides that, in order to be entitled to indemnification, an individual must have acted in good faith and in a manner he or she reasonably believed to be in or not opposed to the Company's best interests.

Reference is made to Item 9 below for the Company's undertakings with respect to liabilities arising under the Securities Act.

ITEM 7. EXEMPTION FROM REGISTRATION CLAIMED

Not applicable.

ITEM 8. EXHIBITS

No.	Description
4.1*	Form of Stock Option Agreement.
5.1*	Opinion of Eiseman Levine Lehrhaupt & Kakoyiannis, P.C. regarding legality of securities being registered.
23.1*	Consent of Radin Glass & Co., LLP independent registered public accounting firm.
23.2*	Consent of Eiseman Levine Lehrhaupt & Kakoyiannis, P.C. (contained in Exhibit 5.1).
24.1*	No person has signed this Registration Statement under a power of attorney. A power of attorney relating to the signing of amendments hereto is incorporated in the signature page hereof.

* Filed herewith

ITEM 9. UNDERTAKINGS.

(1) The undersigned Registrant hereby undertakes:

(a) To file, during any period in which offers or sales are being made, a post-effective amendment to this Registration Statement to:

(i) Include any prospectus required by Section 10(a)(3) of the Securities Act;

(ii) Reflect in the prospectus any facts or events which, individually or together, represent a fundamental change in the information in the registration statement. Notwithstanding the foregoing, any increase or decrease in volume of securities offered (if the total dollar value of securities offered would not exceed that which was registered) and any deviation from the low or high end of the estimated maximum offering range may be reflected in the form of prospectus filed with the Commission pursuant to Rule 424(b) if, in the aggregate, the changes in volume and price represent no more than a 20 percent change in the maximum aggregate offering price set forth in the "Calculation of Registration Fee" table in the effective registration statement;

(iii) Include any additional or changed material information on the plan of distribution;

Provided, however, that the undertakings set forth in paragraphs (a)(1)(i) and (a)(1)(ii) above do not apply if the information required to be included in a post-effective amendment by those paragraphs is contained in reports filed with or furnished to the Commission by the Registrant pursuant to section 13 or section 15(d) of the Securities Exchange Act of 1934 that are incorporated by reference in this Registration Statement.

(b) That, for the purpose of determining liability under the Securities Act, each such post-effective amendment shall be deemed to be a new Registration Statement of the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.

(c) To remove from registration by means of a post-effective amendment any of the securities being registered which remain unsold at the termination of the offering.

(2) The undersigned Registrant hereby undertakes that, for purposes of determining any liability under the Securities Act of 1933, each filing of the registrant's annual report pursuant to Section 13(a) or 15(d) of the Securities Exchange Act of 1934 (and, where applicable, each filing of an employee benefit plan's annual report pursuant to Section 15(d) of the Securities Exchange Act of 1934) that is incorporated by reference in the registration statement shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.

(3) Insofar as indemnification for liabilities arising under the Securities Act may be permitted to directors, officers and controlling persons of the Registrant pursuant to the foregoing provisions, or otherwise, the Registrant has been advised that in the opinion of the Commission such indemnification is against public policy as expressed in the Securities Act and is, therefore, unenforceable. In the event that a claim for indemnification against such liabilities (other than the payment by the Registrant of expenses incurred or paid by a director, officer or controlling person of the Registrant in the successful defense of any action, suit or proceeding) is asserted by such director, officer or controlling person in connection with the securities being registered, the Registrant will, unless in the opinion of its counsel the matter has been settled by controlling precedent, submit to a court of appropriate jurisdiction the question whether such indemnification by it is against public policy as expressed in the Securities Act and will be governed by the final adjudication of such issue.

SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, the Registrant certifies that it has reasonable grounds to believe that it meets all of the requirements for filing on Form S-8 and has duly caused this Registration Statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of New York, State of New York, on February 12, 2013.

NETWORK-1 SECURITY SOLUTIONS, INC.

By: /s/ Corey M. Horowitz
Corey M. Horowitz, Chairman and
Chief Executive Officer

KNOW ALL MEN BY THESE PRESENTS, that each director and officer whose signature appears below constitutes and appoints Corey M. Horowitz his true and lawful attorney-in-fact and agent, with full power and substitution and re-substitution, to sign in any and all capacities any and all amendments or post-effective amendments to this Registration Statement on Form S-8 and to file the same with all exhibits thereto and other documents in connection therewith with the Securities and Exchange Commission, granting to such attorney-in-fact and agent, full power and authority to do all such other acts and execute all such other documents as he may deem necessary or desirable in connection with the foregoing, as fully as the undersigned might or could do in person, hereby ratifying and confirming all that such attorney-in-fact and agent may lawfully do or cause to be done by virtue hereof.

Pursuant to the requirements of the Securities Act of 1933, this Registration Statement has been signed by the following persons in the capacities and on the dates indicated:

Signature	Title	Date
/s/ Corey M. Horowitz Corey M. Horowitz	Chairman and Chief Executive Officer (principal executive officer)	February 12, 2013
/s/ David C. Kahn David C. Kahn	Chief Financial Officer (principal financial and accounting officer)	February 12, 2013
/s/ Emanuel Pearlman Emanuel Pearlman	Director	February 12, 2013
/s/ Laurent Ohana Laurent Ohana	Director	February 12, 2013

INDEX TO EXHIBITS

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24.1*	No person has signed this Registration Statement under a power of attorney. A power of attorney relating to the signing of amendments hereto is incorporated in the signature page hereof.

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