

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

METRETEK TECHNOLOGIES INC
Form 424B3
June 30, 2004

Filed Pursuant to Rule 424(b)(3)
Registrant No. 333-116155

PROSPECTUS

5,828,716 SHARES

METRETEK TECHNOLOGIES, INC.

COMMON STOCK

This prospectus relates to the offer and sale from time to time of up to 5,828,716 shares of our common stock by the selling securityholders identified in this prospectus, consisting of 3,566,419 shares that are issued and outstanding and 2,262,297 shares that are issuable upon the exercise of issued and outstanding warrants.

The selling securityholders may from time to time offer and sell the shares offered under this prospectus in a number of different ways and at varying prices. We provide more information about how the selling securityholders may sell the shares in the section entitled "Plan of Distribution" beginning on page 32.

We will not receive any proceeds from the sale of the shares by the selling securityholders, but if any of the warrants are exercised in cash, we will receive the proceeds from the payment of the exercise price. We will pay all expenses of the registration of the shares, and the selling securityholders will pay any broker-dealer or underwriter fees, discounts or commissions and other selling expenses of the shares.

Our common stock is traded on the OTC Bulletin Board under the symbol "MTEK". On June 23, 2004, the last sale price of our common stock as reported on the OTC Bulletin Board was \$3.00 per share.

A copy of our Annual Report on Form 10-K for the year ended December 31, 2003 and a copy of our Quarterly Report on Form 10-Q for the quarter ended March 31, 2004 accompany this prospectus.

INVESTING IN OUR COMMON STOCK INVOLVES A NUMBER OF SIGNIFICANT RISKS. SEE "RISK FACTORS" BEGINNING ON PAGE 6.

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 JUNE 24, 2004

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

TABLE OF CONTENTS

| | PAGE |
|--------------------------------------------------------|------|
| | ---- |
| Prospectus Summary..... | 3 |
| Risk Factors..... | 6 |
| Special Note Regarding Forward-Looking Statements..... | 23 |
| Use of Proceeds..... | 24 |
| Selling Securityholders..... | 24 |
| Plan of Distribution..... | 31 |
| Description of Capital Stock..... | 34 |
| Legal Matters..... | 43 |
| Experts..... | 43 |
| Where You Can Find More Information..... | 43 |

You should rely only on the information contained in this prospectus. We have not authorized anyone to provide you with information that is different from that contained in this prospectus. The selling securityholders are not making an offer to sell and are not soliciting an offer to buy our common stock in any jurisdiction where offers or sales are not permitted. The information in this prospectus is complete and accurate only as of the date on the front cover of this prospectus, regardless of the time of delivery of this prospectus or of any sale of these securities. The phrase "this prospectus" refers to this prospectus along with any applicable prospectus supplements, unless the context requires otherwise.

This prospectus incorporates important business and financial information about us that is not included in or delivered with this prospectus. This information is available without charge upon written or oral request. See "Where You Can Find More Information."

PROSPECTUS SUMMARY

The summary highlights information contained elsewhere in this prospectus and does not contain all of the information you should consider before investing in the securities offered in this prospectus. You should read this summary together with the more detailed information, including our consolidated financial statements and the related notes, appearing elsewhere in this prospectus or incorporated by reference in this prospectus. You should carefully consider, among other things, the matters discussed in "Risk Factors." Before you make your investment decision, you should carefully read our Annual Report on Form 10-K for the fiscal year ended December 31, 2003 and our Quarterly Report on Form 10-Q for the quarter ended March 31, 2004, which are being delivered with this prospectus.

METRETEK TECHNOLOGIES, INC.

BACKGROUND

Through our subsidiaries, we are a diversified provider of energy technology measurement products, services and data management systems to industrial and commercial users and suppliers of natural gas and electricity. We currently conduct our operations through three subsidiaries:

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- Southern Flow Companies, Inc., based in Lafayette, Louisiana, which provides a wide variety of natural gas measurement services principally to producers and operators of natural gas production facilities.
- PowerSecure, Inc., based in Wake Forest, North Carolina, which designs, engineers, sells and manages distributed generation systems marketed primarily to industrial and commercial users of electricity.
- Metretek, Incorporated, which we refer to as Metretek Florida, based in Melbourne, Florida, which provides data collection, telemetry and other types of machine-to-machine connectivity solutions for applications such as automatic meter reading cathodic protection and other types of remote monitoring and collection applications. Metretek Contract Manufacturing Company, Inc., a Melbourne, Florida based subsidiary of Metretek Florida, provides outsourced manufacturing services with a primary focus on printed circuit boards, mechanical and electrical assemblies.

In this prospectus, references to "Metretek", "we", "us" and "our" refer to Metretek Technologies, Inc. together with its subsidiaries, unless we state otherwise or the context indicates otherwise.

We were incorporated in Delaware on April 5, 1991 under the name "Marcum Natural Gas Services, Inc.," and we changed our name in June 1999 to "Metretek Technologies, Inc." Our principal executive offices are located at 303 East Seventeenth Street, Suite 660, Denver, Colorado 80203, and our telephone number at those offices is (303) 785-8080.

BUSINESS STRATEGY

Our business strategy is to position ourselves as an integrated provider of data management products, services and systems that enhance the availability of management information and services primarily to suppliers and users of energy. While our products, services and systems have historically been aimed primarily at the natural gas industry, we are focusing more of our current and future products, services and systems to other segments of the energy industry, especially the electricity industry, as well as to other industries that require data management services. The energy industry continues to experience fundamental regulatory and structural changes and significant new trends. Our strategy is to acquire, develop, operate and expand businesses that are positioned to take advantage of these changes and trends.

In implementing our business strategy, we have acquired or formed the following important businesses:

- In 1993, we acquired substantially all of the assets of the Southern Flow Companies division of Weatherford International Incorporated.

3

- In 1994, we acquired Metretek Florida.
- In 1997, we acquired two printed circuit based contract manufacturing firms to support and expand Metretek Florida's operations.
- In 1998, we acquired the electronic corrector business from American Meter Company to further expand the product and service offerings of

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

Metrotek Florida.

- In 2000, we formed PowerSecure to develop and operate our distributed generation business.
- In 2001, we acquired Industrial Automation, Inc., a process control and switchgear design and manufacturing firm, as part of PowerSecure's growth strategy.
- In 2002, we formed MCM as a subsidiary of Metrotek Florida to operate and expand our contract manufacturing business.
- In 2003, we developed InvisiConnect(TM), a machine to machine connection solution for wireless network technology, to enhance the product, service and technology offerings of Metrotek Florida.

While we regularly engage in discussions relating to potential acquisitions and dispositions of assets, businesses and companies, as of the date of this prospectus we have not entered into any binding agreement or commitment with respect to any material acquisition or disposition.

RECENT DEVELOPMENTS

In May 2004, we completed a private placement to institutional and accredited investors of 3,510,548 shares of our common stock and warrants to purchase 702,109 shares of our common stock raising gross proceeds of \$10.9 million. The price paid in the private placement was \$3.10 per unit, each unit consisting of one share of common stock and a warrant to purchase 0.2 shares of common stock. Roth Capital Partners, LLC acted as the placement agent in the private placement.

We received net cash proceeds of approximately \$9.9 million from the private placement, after deducting transaction expenses including the placement agent's fee. The net proceeds from the private placement are intended to be used principally to meet our mandatory redemption obligations related to our Series B preferred stock, which matures on December 9, 2004, and for other business commitments and initiatives.

The warrants issued in the private placement have an exercise price of \$3.41 per share of common stock and expire in May 2009. The warrants are callable by us commencing one year after issuance if the trading price of our common stock is at least two times the warrant exercise price for 30 consecutive trading days and certain other conditions are satisfied. The warrants may be exercised by the holders on a cashless basis, under certain circumstances. In addition to the warrants issued to the investors, we issued warrants to purchase up to 351,054 shares of common stock to the placement agent with the same basic terms as the warrants issued to the investors. This prospectus is a part of the registration statement we agreed to file with the Securities and Exchange Commission to register the offer from time to time of shares of our common stock issued in the private placement or upon the exercise of the warrants.

Also in May 2004, certain holders of our outstanding shares of Series B preferred stock converted a total of 2,500 shares of our Series B preferred stock, including accrued and unpaid dividends, and received upon such conversion 1,209,133 shares of common stock plus warrants to purchase 1,209,133 shares of common stock exercisable until June 9, 2005 at an exercise price of \$3.0571 per share, which is the same price as the conversion price of the Series B preferred stock into each share of common stock. We agreed to include the 55,871 shares of common stock issued to the holders of Series B preferred stock that had not previously registered, plus all of the shares of common stock issuable upon exercise of the warrants issued to those holders, in the registration statement to be filed in connection with the private placement.

THE OFFERING

| | |
|-------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Common stock that may be offered by selling securityholders:..... | 5,828,716 shares (1) |
| Common stock outstanding as of June 1, 2004 | 10,951,701 shares (1) |
| Use of proceeds..... | We will not receive any proceeds from the sale of shares of common stock by the selling securityholders. We will receive proceeds from the exercise, in cash, of warrants by selling securityholders. We intend to use any proceeds we receive from the exercise of warrants for general corporate purposes, including, but not limited to, working capital, capital expenditures and repayment of our obligations. We may also use a portion of any such proceeds to acquire businesses, technologies or other assets and to repurchase securities. |
| OTC Bulletin Board Symbol | MTEK |

- (1) Consists of 3,566,419 shares of common stock currently outstanding and held by the selling securityholders, and 2,262,297 shares of common stock issuable upon the exercise of current outstanding warrants held by the selling securityholders.
- (2) Exclude shares of common stock issuable upon the conversion or exercise of outstanding convertible securities, including outstanding shares of our Series B preferred stock and outstanding warrants.

RISK FACTORS

An investment in our common stock involves a number of significant risks. You should carefully consider the risks, uncertainties and other factors described below, along with the other information contained or incorporated by reference in this prospectus, before making an investment decision. In addition, the risks, uncertainties and other factors described below are not the only ones we face. There may be additional risks, uncertainties and other factors that we do not currently consider material or that are not currently known to us. If any of the following risks were to occur, our business, affairs, prospects, assets, financial condition, results of operations and cash flows could be materially adversely affected. When we say that something could or will have a material adverse effect on us or our business, we mean that it could or will have one or more of these effects. If this occurs, the trading price of our common stock

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

could decline, and you could lose all or part of your investment.

RISKS RELATED TO OUR BUSINESS

WE HAVE A HISTORY OF LOSSES, AND WE MAY NEVER BECOME PROFITABLE.

We have incurred net losses in each year since our inception in 1991, including a net loss applicable to common shareholders of \$11,000 in fiscal 2003 and a net loss applicable to common shareholders of \$4.2 million in fiscal 2002. We had a net loss applicable to common shareholders of approximately \$227,000 in the quarter ended March 31, 2004. As of March 31, 2004, we had an accumulated deficit of approximately \$54.2 million. We may never achieve profitability, and even if we do we may not be able to sustain or increase that profitability on a quarterly or annual basis in the future. We may incur expenses in excess of revenues, including significant costs in developing and expanding the contract manufacturing business and the InvisiConnect(TM) business of Metretek Florida, and we will continue to accrue the preferred stock deemed distribution in fiscal 2004. In addition, while our revenues in fiscal 2003 increased significantly over our revenues in fiscal 2002, there is no guarantee that our future revenues will continue to grow significantly, if at all, or that they will ever exceed our costs and expenses. If our future revenues do not meet our expectations, or if our operating expenses exceed what we anticipate or cannot be reduced below our revenues, our business, financial condition and results of operations will be materially and adversely affected.

IF WE ARE UNABLE TO SATISFACTORILY RESTRUCTURE, OR TO RAISE SUFFICIENT ADDITIONAL CAPITAL FUNDS TO MEET, OUR OBLIGATION TO REDEEM THE REMAINING OUTSTANDING SHARES OF OUR SERIES B PREFERRED STOCK IN DECEMBER 2004, THEN OUR ASSETS, BUSINESS, FINANCIAL CONDITION AND RESULTS OF OPERATIONS MAY BE MATERIALLY AND ADVERSELY AFFECTED, AND WE MAY FACE A CHANGE IN CONTROL IN OUR BOARD OF DIRECTORS.

Under the terms of our Series B preferred stock, we are required to redeem all shares of Series B preferred stock that remain outstanding on December 9, 2004 at a redemption price equal to the liquidation preference of \$1,000 per share plus accumulated and unpaid dividends. As of June 1, 2004, this redemption obligation was approximately \$6.3 million. In May 2004 we addressed this obligation by completing a private placement that raised net proceeds of \$9.9 million and by the conversion of 2,500 of the outstanding 7,000 outstanding shares of Series B preferred stock. These transactions are intended to allow us to meet the Series B preferred stock redemption obligation. The Series B preferred stock is convertible, at the option of the holders thereof, into common stock at the conversion rate of \$3.0571 per share of common stock, subject to certain adjustments. While the conversion of any further of Series B preferred stock into shares of common stock prior to the redemption date will reduce our redemption obligation, we cannot provide any assurance that any further shares of Series B preferred stock will be converted. In addition, we may, but do not intend, to restructure that obligation with the holders of our Series B preferred stock in a manner satisfactory to us, such as by deferring the redemption date on all or part of the shares. However, there is no assurance we will be able to do either, as such actions require the consents of others that we may not obtain. In addition, our ability to raise additional capital depends on many factors, including general market conditions, our operating performance, and investor sentiment, and thus cannot be assured. Moreover, the terms of any financing could be adverse to the interests of our stockholders. If we are unable to satisfy or satisfactorily restructure our redemption obligations under the Series B preferred stock, then our business, financial condition and results of operations may be materially and adversely affected. In such event, holders of the Series B preferred stock will have the right to elect sufficient directors to control a majority of our board of directors until the redemption obligation is fully satisfied, and the dividend rate on the Series B preferred stock will increase from 8% to 10% and continue to increase by 0.5%

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

each six months to a maximum rate of 15%.

6

WE MAY ALSO REQUIRE A SUBSTANTIAL AMOUNT OF ADDITIONAL FUNDS TO FUND OUR OTHER CAPITAL REQUIREMENTS AND TO FINANCE THE GROWTH OF OUR BUSINESS, BUT WE MAY NOT BE ABLE TO RAISE A SUFFICIENT AMOUNT OF FUNDS TO DO SO ON TERMS FAVORABLE TO US AND OUR STOCKHOLDERS OR AT ALL.

In addition to our obligation to redeem the Series B preferred stock in December 2004, we may need to obtain additional capital to fund our other capital obligations and to finance the development and expansion of our business. For example, we will need substantial additional capital to expand our contract manufacturing business and to finance the development of our InvisiConnect(TM) business. In addition, we may need substantial additional capital if we proceed to develop the company-owned business of PowerSecure, in order to fund our acquisition of capital equipment for distributed generation systems to be owned by PowerSecure. Further, under the proposed settlement of the class action lawsuit currently pending against us, we are required to make payments on a \$3 million promissory note, plus interest, over a four year period commencing on June 30, 2004. If the proposed settlement to the class action litigation does not become effective and the class action proceeds against us, a resolution of the litigation adverse to us could also significantly increase our cash requirements beyond our available capital resources. In addition, from time to time as part of our business plan, we engage in discussions regarding potential acquisitions of businesses and technologies. While our ability to finance future acquisitions will probably require us to raise additional capital, as of the date of this prospectus, we have not entered into any agreement committing us to any such acquisition. Moreover, unanticipated events, over which we have no control, could increase our operating costs or decrease our ability to generate revenues from product and service sales, necessitating additional capital. We continually evaluate our cash flow requirements as well as our opportunity to raise additional capital in order to improve our financial position. We cannot provide any assurance that we will be able to raise additional capital when needed or desired, or that the terms of such capital will be favorable to us and our stockholders.

We completed a private placement in May 2004, in which we raised net proceeds of approximately \$9.9 million. With these proceeds, we currently believe that our capital resources are sufficient to meet our financial obligations for at least the next 12 months. In addition to our cash on hand, we have a \$3 million credit facility through September 2006. Our ability to borrow funds under the credit facility is limited to our loan availability based upon certain assets of our subsidiaries. As of March 31, 2004, we had an aggregate loan availability under the credit facility of approximately \$2,117,000, of which \$1,709,000 had been borrowed, leaving \$408,000 available for future use. The amount of our credit availability, as well as the amount borrowed under the credit facility, will change in the future depending on our asset base and our capital requirements.

Our current credit facility has a number of financial covenants that our subsidiaries must satisfy. Our ability to satisfy those covenants depends principally upon our ability to achieve positive operating performance. If any of our borrowing subsidiaries is unable to fully satisfy the financial covenants of the credit facility, it will breach the terms of the credit facility. We have secured our obligations under the credit facility by pledging substantially all of our assets as collateral. Additionally, our subsidiaries have guaranteed the repayment of our obligations under the credit facility. Any breach of these covenants, or any other event or circumstance that our lender deems impairs our ability to fulfill our obligations under the credit facility, could result in a default under the credit facility and an acceleration of payment of all

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

outstanding debt owed, which would materially and adversely affect our business.

We may seek to raise any needed or desired additional capital from the proceeds of public or private equity or debt offerings at the Metretek Technologies level or at the subsidiary level or both, through asset or business sales, from traditional credit financings or from other financing sources. Our ability to obtain additional capital when needed or desired will depend on many factors, including general market conditions, our operating performance and investor sentiment, and thus cannot be assured. In addition, depending on how it is structured, raising capital could require the consent of other persons, including our lender, the holders of our Series B preferred stock or the investors in the May 2004 private placement. Even if we are able to raise additional capital, the terms of any financing could be adverse to the interests of our stockholders. For example, the terms of debt financing could include covenants that restrict our ability to operate our business or to expand our operations, while the terms of an equity financing, involving the issuance of capital stock or of securities convertible into capital stock, could dilute the percentage ownership interests of our stockholders, and the new capital stock or other new securities could have rights, preferences or privileges senior to those of our current stockholders. We cannot assure you that sufficient additional funds will be available to us when needed or desired or that, if available, such funds can be obtained on terms favorable to us and our stockholders and acceptable to those persons that must consent to the financing. Our inability to obtain sufficient additional capital on a timely basis on favorable terms could have a material adverse

7

effect on our business, financial condition and results of operations.

IF THE PROPOSED SETTLEMENT OF THE CLASS ACTION DOES NOT BECOME EFFECTIVE, OR IF IN THE FUTURE WE BECOME SUBJECT TO NEW LAWSUITS, AND IF ANY OF THOSE LAWSUITS ARE SUCCESSFULLY PROSECUTED AGAINST US, OUR BUSINESS, FINANCIAL CONDITIONS AND RESULTS OF OPERATING COULD BE MATERIALLY AND ADVERSELY AFFECTED.

We are in the process of resolving a class action lawsuit against us and some of our subsidiaries and affiliates and their officers, directors and trustees through a proposed settlement. The class action and the terms and conditions of the proposed settlement are described in our Annual Report on 10-K for the fiscal year ended December 31, 2003 and our Quarterly Report on Form 10-Q for the quarter ended March 31, 2004 that accompany this prospectus as well as the Current Report on Form 8-K that we filed on June 14, 2004. The settlement which received final court approval on June 11, 2004, is subject to appeal for 45 days after the final approval was granted by the court. Accordingly, we cannot provide any assurance that the settlement will become effective. If the settlement does not become effective, then the class action will continue to be prosecuted against us. While we expect to defend the claims against us in the class action vigorously, due to the inherent uncertainty of litigation, it is not possible at this time to predict the outcome of this litigation or the impact the ultimate resolution of this litigation would have on us, if the settlement does not become effective. An adverse judgment against us would materially and adversely affect our business, financial condition and results of operations.

From time to time we are also involved in other disputes and legal actions that arise in the ordinary course of business. We cannot provide any assurance that any such future litigation and claims against us could not materially and adversely affect our business, financial condition and results of operation.

OUR FUTURE OPERATING RESULTS ARE DIFFICULT TO PROJECT AND HAVE FLUCTUATED

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

SIGNIFICANTLY IN THE PAST, AND FLUCTUATIONS IN THE FUTURE MAY ADVERSELY AFFECT THE TRADING PRICE OF OUR COMMON STOCK.

Our quarterly revenues, expenses, margins, net income and other operating results have fluctuated significantly from quarter-to-quarter, period-to-period and year-to-year in the past and are expected to continue to fluctuate significantly in the future due to a variety of factors, many of which are outside of our control. These factors include, without limitation, the following:

- the size, timing and terms of sales and orders, including customers delaying, deferring or canceling purchase orders, or making smaller purchases than expected;
 - our ability to implement our business plans and strategies and the timing of such implementation;
 - the timing, pricing and market acceptance of our new products and services such as Metrotek Florida's new InvisiConnect offering;
 - the pace of development of our new businesses and the growth of their markets;
 - changes in our pricing policies and those of our competitors;
 - variations in the length of our product and service implementation process;
 - changes in the mix of products and services having differing margins;
 - changes in the mix of international and domestic revenues;
 - the life cycles of our products and services;
 - budgeting cycles of utilities and other major customers;
 - general economic and political conditions;
 - the resolution of pending and any future litigation and claims;
 - economic conditions in the energy industry, especially in the natural gas and electricity sectors;
 - the effects of governmental regulations and regulatory changes in our markets;
 - changes in the prices charged by our suppliers;
 - our ability to make and obtain the expected benefits from acquisitions of technology or businesses, and the costs related to such acquisitions;
- 8
- changes in our operating expenses; and
 - the development and maintenance of business relationships with strategic partners.

Because we have little or no control over most of these factors, our

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

operating results are difficult to predict. Any substantial adverse change in any of these factors could negatively affect our business and results of operations.

Due to all of these factors and the other risks discussed in this prospectus, you should not rely on quarter-to-quarter, period-to-period or year-to-year comparisons of our results of operations as an indication of our future performance. Quarterly, period and annual comparisons of our operating results are not necessarily meaningful or indicative of future performance. It is possible that in some future periods our results of operations may be below the expectations of public market analysts and investors, causing the trading price of our common stock to fall.

BECAUSE SOME OF OUR BUSINESSES AND SOME OF OUR PRODUCT AND SERVICE OFFERINGS HAVE LIMITED HISTORIES AND ARE BASED UPON UNPROVEN BUSINESS STRATEGIES THAT ARE STILL BEING DEVELOPED, LIMITED INFORMATION IS AVAILABLE TO EVALUATE THEIR FUTURE PROSPECTS.

Our business strategy includes the development and expansion of new businesses and of new product and service offerings from time to time. Our plans and strategies with respect to these new businesses are often based on unproven models and must be developed and modified. Our future success depends in large part upon our ability to develop these new businesses so that they will generate significant revenues, profits and cash flow.

As a company developing new businesses in the rapidly evolving energy and technology markets, we face numerous risks and uncertainties which are described in this risk factor as well as other parts of this prospectus. Some of these risks relate to our ability to:

- anticipate and adapt to the changing regulatory climate for energy and technology products, services and technology;
- attract customers to our new businesses;
- anticipate and adapt to the changing energy markets and end-user preferences;
- attract, retain and motivate qualified personnel;
- respond to actions taken by our competitors;
- integrate acquired businesses, technologies, products and services;
- generate revenues, gross margins, cash flow and profits from sales of new products and services;
- implement an effective marketing strategy to promote awareness of our new businesses, products and services; and
- develop and deploy successful versions of the software necessary for our products and services.

Our business and financial results in the future will depend heavily on the market acceptance and profitability of our new businesses and these new product and service offerings lines. If we are unsuccessful in addressing these risks or in executing our business strategies, or if our business model fails or is invalid, then our business would be materially and adversely affected.

RESTRICTIONS IMPOSED ON US BY THE TERMS OF OUR SERIES B PREFERRED STOCK, OUR CURRENT CREDIT FACILITY, THE PROPOSED CLASS ACTION SETTLEMENT AND THE TERMS OF OUR RECENT PRIVATE PLACEMENT COULD LIMIT HOW WE CONDUCT OUR

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

BUSINESS AND OUR ABILITY TO RAISE ADDITIONAL CAPITAL.

The terms of our Series B preferred stock, our current credit facility, our proposed class action settlement and of our recent private placement contain financial and operating covenants that limit the discretion of our management. These covenants place significant restrictions on our ability to:

- incur additional indebtedness;
- create liens or other encumbrances;

9

- issue or redeem our securities;
- make dividend payments and investments;
- amend our charter documents;
- sell or otherwise dispose of our or our subsidiaries' stock or assets;
- liquidate or dissolve;
- merge or consolidate with other companies; or
- reorganize, recapitalize or engage in a similar business transaction.

Any future financing arrangements will likely contain similar or more restrictive covenants. As a result of these restrictions, we may be:

- limited in how we conduct our business;
- unable to raise additional capital, through debt or equity financings, when needed for our operations and growth; and
- unable to compete effectively or to take advantage of new business opportunities.

If, as a result of these covenants, we are unable to pursue a favorable transaction or course of action or to respond to an unfavorable event, condition or circumstance, then our business could be materially and adversely affected.

DIVIDENDS ON OUR SERIES B PREFERRED STOCK DECREASE OUR NET INCOME OR INCREASE OUR NET LOSS AVAILABLE TO COMMON SHAREHOLDERS AND DECREASE OUR NET INCOME OR INCREASE OUR NET LOSS PER COMMON SHARE.

Due to our issuance of our Series B preferred stock in December 1999 and February 2000 as part of a private placement of units of securities that also included shares of common stock and common stock purchase warrants, we recognize the 8% coupon rate on the Series B preferred stock and certain "deemed distributions" as dividends on the Series B preferred stock. The proceeds from the private placement of the units were allocated to our common stock, the common shares purchase warrants and the Series B preferred stock based on the relative fair value of each. This allocation process resulted in the Series B preferred stock that we sold in February 2000 being initially recorded at a discount from its \$1,000 per share liquidation value. This discount is being recorded as a distribution over the term of the Series B preferred stock. Another discount resulted from the increase in the fair market value of a share of our common stock from the date we offered to sell the securities to February

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

2000, the date we actually issued the securities. This increase caused the conversion feature of the Series B preferred stock to be "in the money" in February 2000. The discount related to the "in the money" conversion feature has been recorded as a distribution between February 2000 and June 2000, after which date the Series B preferred stock could first be converted into our common stock. The Series B preferred stock dividends adversely affected our operating results in fiscal 2001, fiscal 2002, fiscal 2003 and the first quarter of fiscal 2004 by significantly decreasing the net income or increasing the net loss available to common shareholders and decreasing the net income or increasing the net loss per common share, and will continue to adversely affect our operating results through fiscal 2004. By adversely affecting our operating results, the accounting treatment of these dividends could adversely affect the trading price of our common stock.

BECAUSE WE ARE DEPENDENT UPON THE UTILITY INDUSTRY FOR A SIGNIFICANT PORTION OF OUR REVENUE, CONTINUED REDUCTIONS OF PURCHASES OF OUR PRODUCTS AND SERVICES BY UTILITIES CAUSED BY REGULATORY REFORM MAY MATERIALLY AND ADVERSELY AFFECT OUR BUSINESS.

We currently derive a significant portion of our revenue from sales by Metrotek Florida of its products and services to the utility industry, and particularly the natural gas utility industry. A key reason that we have experienced variability of operating results on both an annual and quarterly basis has been utility purchasing patterns, including delays of purchasing decisions, as the result of mergers and acquisitions in the utility industry and potential changes to the federal and state regulatory framework within which the utility industry operates. The utility industry is generally characterized by long budgeting, purchasing and regulatory process cycles that can take up to several years to complete. Our utility customers typically issue requests for quotes and proposals, establish

10

committees to evaluate the purchase proposals, review different technical options with vendors, analyze performance and cost/benefit justifications and perform a regulatory review, in addition to applying a normal budget approval process within the utility. In addition, utilities may defer purchases of our products and services if the utilities reduce capital expenditures as the result of mergers and acquisitions, pending or unfavorable regulatory decisions, poor revenues due to weather conditions, rising interest rates or general economic downturns, among other factors. The natural gas utility industry has been virtually the sole market for Metrotek Florida's products and services. However, over the last few years, the uncertainty in the utility industry that has resulted from the regulatory uncertainty in the current era of deregulation has caused utilities to defer even further purchases of Metrotek Florida's products and services. The continuation of this uncertain regulatory climate will materially and adversely affect our revenues from sales to utilities.

The domestic utility industry is currently the focus of regulatory reform initiatives in virtually every state. These initiatives have resulted in significant uncertainty for industry participants and raise concerns regarding assets that would not be considered for recovery through rate payer charges. This regulatory climate has caused many utilities to delay purchasing decisions that involve significant capital commitments. As a result of these purchasing decision delays, utilities have reduced their purchases of our products and services. While we expect some states will act on these regulatory reform initiatives in the near future, we cannot assure you that the current regulatory uncertainty will be resolved in the short term. In addition, new regulatory initiatives could have a material adverse effect on our business. Moreover, in part as a result of the competitive pressures in the utility industry arising from the regulatory reform process, many utilities are pursuing merger and

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

acquisition strategies. We have experienced considerable delays in purchase decisions by utilities that have become parties to merger or acquisition transactions. Typically, capital expenditure purchase decisions are put on hold indefinitely when merger negotiations begin. If this pattern of merger and acquisition activity among utilities continues, our business may be materially and adversely affected. In addition, if any of the utilities that account for a significant portion of our revenues decide to significantly reduce their purchases of our products and services, our financial condition and results of operations may be materially and adversely affected.

MANY OF OUR PRODUCTS AND SERVICES EXPERIENCE LONG AND VARIABLE SALES CYCLES, WHICH COULD HAVE A NEGATIVE IMPACT ON OUR RESULTS OF OPERATIONS FOR ANY GIVEN QUARTER OR YEAR.

Our products and services are often used by our customers to address critical business needs. Customers generally consider a wide range of issues before making a decision to purchase our products and services. In addition, the purchase of some of our products and services involves a significant commitment of capital and other resources by a customer. This commitment often requires significant technical review, assessment of competitive products and approval at a number of management levels within a customer's organization. Our sales cycle may vary based on the industry in which the potential customer operates and is difficult to predict for any particular transaction. The length and variability of our sales cycle makes it difficult to predict whether particular sales will be concluded in any given quarter. While our customers are evaluating our products and services before they place an order with us, we may incur substantial sales and marketing and research and development expenses to customize our products to the customer's needs. We may also expend significant management efforts, increase manufacturing capacity and order long-lead-time components or materials prior to receiving an order. Even after this evaluation process, a potential customer may not purchase our products. As a result, these long sales cycles may cause us to incur significant expenses without ever receiving revenue to offset those expenses.

IF WE ARE UNABLE TO DEVELOP AND OFFER NEW AND ENHANCED PRODUCTS AND SERVICES THAT ACHIEVE MARKET ACCEPTANCE IN A TIMELY MANNER, OUR OPERATING RESULTS AND COMPETITIVE POSITION COULD SUFFER.

Our success depends on our ability to develop and offer new and enhanced products and services that achieve market acceptance in a timely and cost-effective manner. The development of technology is often complex, and we occasionally have experienced delays in completing the development and introduction of new products and services and enhancements thereof. Successful development and market acceptance of our products and services depends on a number of factors, including:

- changing requirements of customers;
- accurate prediction of market requirements;
- timely completion and introduction of new designs;

11

- quality, price, performance, power use and size of our products;
- availability, quality, price and performance of competing products, services and technologies;
- our customer service and support capabilities and responsiveness;

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- successful development of our relationships with existing and potential customers; and
- changes in technology, industry standards or end-user preferences.

We cannot provide assurance that products and services which we recently have developed or may develop in the future will achieve market acceptance. If we fail to develop new or enhanced products and services that achieve market acceptance, our growth prospects, operating results and competitive position could be materially and adversely affected.

FROM TIME TO TIME WE DEPEND ON REVENUES FROM SIGNIFICANT CONTRACTS, AND ANY LOSS, CANCELLATION, REDUCTION, OR DELAY IN THESE CONTRACTS COULD HARM OUR BUSINESS AND OPERATING RESULTS.

From time to time, one or more of our subsidiaries have derived a material portion of our revenue from one or more individual contracts that could be terminated by the customer at the customer's discretion. It is possible that in future periods we may again enter into individual contracts with significant revenue concentrations. If such contracts were to be terminated, our revenues and net income would significantly decline. Our success will depend on our continued ability to develop and manage relationships with significant customers. We cannot be sure that we will be able to retain our largest customers, that we will be able to attract additional customers, or that our customers will continue to purchase our products and services in the same amounts as in prior years. Our business and operating results would be hindered by:

- the loss of one or more large customers;
- any reduction or delay in sales to these customers;
- our inability to successfully develop relationships with additional customers; or
- future price concessions that we may have to make.

RAPID TECHNOLOGICAL CHANGES MAY PREVENT US FROM REMAINING CURRENT WITH OUR TECHNOLOGICAL RESOURCES AND MAINTAINING COMPETITIVE PRODUCT AND SERVICE OFFERINGS.

The markets in which our businesses operate are characterized by rapid technological change, frequent introductions of new and enhanced products and services, evolving industry standards and changes in customer needs. Significant technological changes could render our existing and planned new products, services and technology obsolete. Our future success will depend, in large part, upon our ability to:

- effectively use and develop leading technologies;
- continue to develop our technical expertise;
- enhance our current products and services;
- develop new products and services that meet changing customer needs; and
- respond to emerging industry standards and technological changes in a cost-effective manner.

If we are unable to successfully respond to these developments or if we do not respond to them in a cost-effective manner, then our business will be

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

materially and adversely affected. We cannot assure you that we will be successful in responding to changing technology or market needs. In addition, products, services and technologies developed by others may render our products, services and technologies uncompetitive or obsolete.

Even if we do successfully respond to technological advances and emerging industry standards, the integration of new technology may require substantial time and expense, and we cannot assure you that we will succeed in adapting our products, services and technology in a timely and cost-effective manner. We may experience financial or technical difficulties or limitations that could prevent us from introducing new or enhanced products or services. Furthermore, these new or enhanced products, services and technology may contain problems

12

that are discovered after they are introduced. We may need to significantly modify the design of these products and services to correct problems. Rapidly changing technology and operating systems may impede market acceptance of our products, services and technology. Our business could be materially and adversely affected if we experience difficulties in introducing new or enhanced services and products or if these products and services are not received favorably by our customers.

Development and enhancement of our products and services will require significant additional expenses and could strain our management, financial and operational resources. The lack of market acceptance of our products or services or our inability to generate sufficient revenues from this development or enhancements to offset their costs could have a material adverse effect on our business. In the past, we have experienced delays in releasing new products and services and enhancements, and we may experience similar delays in the future. These delays or problems in the installation of implementation of our new products and services and enhancements may cause customers to forego purchases of our products and services to purchase those of our competitors.

IF WE ARE UNABLE TO CONTINUE TO ATTRACT AND RETAIN KEY PERSONNEL, OUR BUSINESS WILL BE MATERIALLY AND ADVERSELY AFFECTED.

We believe our future success will depend in large part upon our ability to attract and retain highly qualified technical, managerial, sales, marketing, finance and operations personnel. Competition for qualified personnel is intense, and we cannot assure you that we will be able to attract and retain those key employees in the future. The loss of the services of any of our key personnel could have a material adverse effect on our business. We cannot assure you that we will be able to retain our current key personnel or that we will be able to attract or retain other highly qualified personnel in the future. We have from time to time in the past experienced, and we expect to continue to experience in the future, difficulty in hiring and retaining highly skilled employees with appropriate qualifications. Our failure to attract and retain highly qualified personnel could materially and adversely affect our business.

WE FACE INTENSE COMPETITION IN THE MARKETS FOR OUR PRODUCTS, SERVICES AND TECHNOLOGY, AND IF WE CANNOT SUCCESSFULLY COMPETE IN THOSE MARKETS, OUR BUSINESS WILL BE MATERIALLY AND ADVERSELY AFFECTED.

The markets for our products, services and technology are intensely competitive and subject to rapidly changing technology, new products and services, frequent performance improvements and evolving industry standards. We expect the intensity of competition to increase in the future because the growth potential and deregulatory environment of the energy market have attracted and are anticipated to continue to attract many new competitors, including new business as well as established businesses from different industries.

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

Competition may also increase as a result of industry consolidation. As a result of increased competition, we may have to reduce the price of our products and services, and we may experience reduced gross margins and loss of market share, any one of which could significantly reduce our future revenues and operating results.

Many of our existing competitors, as well as a number of potential new competitors, have longer operating histories, greater name recognition, larger customer bases and significantly greater financial, technical, marketing, manufacturing and other resources than we do. This may enable our competitors to respond more quickly to new or emerging technologies and changes in customer requirements or preferences and to devote greater resources to the development, promotion and sale of their products and services than we can. Our competitors may be able to undertake more extensive marketing campaigns, adopt more aggressive pricing policies and make more attractive offers to potential employees, customers, strategic partners and suppliers and vendors than we can. Our competitors may develop products and services that are equal or superior to the products and services offered by us or that achieve greater market acceptance than our products do. In addition, current and potential competitors have established or may establish cooperative relationships among themselves or with third parties to improve their ability to address the needs of our existing and prospective customers. As a result, it is possible that new competitors may emerge and rapidly acquire significant market share or impede our ability to acquire market share in new markets. We cannot assure you that we will have the financial resources, technical expertise, portfolio of market or services or marketing and support capabilities to compete successfully in the future. Our inability to compete successfully in any respect or to timely respond to market demands or changes would have a material adverse effect on our business, conditions and results of operations.

13

DOWNTURNS IN GENERAL ECONOMIC AND MARKET CONDITIONS COULD MATERIALLY AND ADVERSELY AFFECT OUR BUSINESS.

There is potential for a downturn in general economic and market conditions. Various segments of the economy in general, and of the energy industry in particular, have experienced significant economic downturns characterized by decreased product demand, price erosion, work slowdown, and layoffs. The most recent downturn was especially strong in the technology industry. Moreover, there is increasing uncertainty in the energy and technology markets attributed to many factors, including global economic conditions and strong competitive forces. Our future results of operations may experience substantial fluctuations from period to period as a consequence of these factors, and such conditions and other factors affecting capital spending may affect the timing of orders from major customers. An economic downturn coupled with a decline in our revenues could affect our ability to secure additional financing or raise additional funds to meet capital requirement, support working capital requirements and growth objectives, maintain existing financing arrangements, or for other purposes. As a result, any economic downturns in general or in our markets, particularly those affecting industrial and commercial users of natural gas and electricity, would have a material adverse effect on our business, cash flows, financial condition and results of operations.

IF WE FAIL TO EFFECTIVELY MANAGE OUR FUTURE GROWTH, OUR ABILITY TO MARKET AND SELL OUR PRODUCTS AND SERVICES AND TO DEVELOP NEW PRODUCTS AND SERVICES MAY BE ADVERSELY AFFECTED.

We must plan and manage our growth effectively in order to offer our products and services and achieve revenue growth and profitability in a rapidly

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

evolving market. Our future growth will place a significant strain on our management systems and resources. If we are not be able to effectively manage our growth in the future, our business may be materially and adversely affected.

CHANGES IN UTILITY RATE AND TARIFF STRUCTURES COULD HARM OUR BUSINESS AND RESULTS OF OPERATIONS.

Some of our businesses, especially the businesses of PowerSecure and Metretek Florida, are heavily dependent upon utility rates and tariffs. PowerSecure and Metretek Florida develop proposals for new projects based on utility tariffs in a region or utility company existing at that time. If the local utility changes its tariffs, then PowerSecure's and Metretek Florida's proposals for that region or utility company may be rendered obsolete, adversely affecting their ability to make future sales in that region or to that specific utility company, and this reduction in future sales could materially and adversely affect our business and our results of operations

CHANGES IN OUR PRODUCT MIX COULD MATERIALLY AND ADVERSELY AFFECT OUR BUSINESS.

The margins on our revenues from some of our product and service offerings is higher than the margins on our other product and service offerings. For example, revenues from some of Metretek Florida's product sales have significantly higher margins than Metretek Florida's contract manufacturing revenues. In addition, we cannot currently accurately estimate the margins of some of our new and developing products and services due to their limited operating history. Our new products and services may have lower margins than our current products and services. If in the future we derive a proportionately greater percentage of our revenues from lower margin products and services, then our overall margins on our total revenues will decrease and, accordingly, will result in lower net income, or higher net losses, and less cash flow on the same amount of revenues.

OUR MANAGEMENT OF PRIVATE ENERGY PROGRAMS PRESENTS RISKS TO US.

We have a subsidiary that manages and holds a minority ownership interest in one continuing private energy program and in one discontinued private energy program. While that subsidiary does not intend to form any new private programs, it may from time to time repurchase interests in the continuing program or to initiate or manage actions intended to expand its assets or activities. These private programs were financed by private placements of equity interests raising capital to acquire the assets and business operated by the program. Our management of these energy programs presents risks to us, including:

- lawsuits by investors in these programs who become dissatisfied with the result of these programs, including the class action lawsuit pending against us that is subject to a proposed settlement;

14

- material adverse changes in the business, results of operations and financial condition of the programs due to events, conditions and factors outside of our control, such as general and local conditions affecting the energy market generally and the revenues of the programs specifically;
- annual preferred shareholder interest repurchase commitments;
- risks inherent in managing a program and taking significant actions that affect its investors;

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- changes in the regulatory environment relating to these programs;
- reliance upon significant suppliers and customers by these programs;
- hazards of energy facilities; and
- changes in technology.

If any of these risks materialize and we are unsuccessful in addressing these risks, our business could be materially and adversely affected.

WE DO NOT HAVE LONG-TERM PURCHASE AGREEMENTS WITH MOST OF OUR CUSTOMERS, AND, AS A RESULT, MOST OF OUR CUSTOMERS COULD STOP PURCHASING OUR PRODUCTS AND SERVICES AT ANY TIME.

We generally do not obtain firm, long-term volume purchase commitments from our customers, and we generally experience short lead-times for customer orders. In addition, customer orders can be canceled and volume levels can be reduced or delayed. We may be unable to replace canceled, delayed or reduced orders with new business. For example, most of PowerSecure's revenues are derived on a non-recurring, project by project basis, and there is no assurance that its revenues and business will continue to grow.

OUR INTERNATIONAL SALES ACTIVITIES ARE SUBJECT TO MANY RISKS AND UNCERTAINTIES THAT COULD ADVERSELY AFFECT OUR OPERATING RESULTS IF THEY MATERIALIZE.

We market and sell some of our products and services in international markets. Our revenues from sales into international markets were approximately 3% of our consolidated revenues in each of the past three fiscal years. One component of our strategy for future growth involves the expansion of our products and services into new international markets and the expansion of our marketing efforts in our current international markets. This expansion will require significant management attention and financial resources to establish additional offices, hire additional personnel, localize and market products and services in foreign markets and develop relationships with international service providers. However, we have only limited experience in international operations, including developing localized versions of our products and services and in developing relationships with international service providers. We cannot provide any assurance that we will be successful in expanding our international operations, or that revenues from international operations will be sufficient to offset these additional costs. If revenues from international operations are not adequate to offset the additional expense from expanding these international operations, our business could be materially and adversely affected.

In addition to the uncertainty regarding our ability to generate sufficient revenues from foreign operations and to expand our international presence, we are exposed to several risks inherent in conducting business on an international level that could result in increased expenses, or could limit our ability to generate revenue, including:

- fluctuations in currency exchange rates;
- potential adverse tax consequences;
- adverse changes in applicable laws and regulatory requirements;
- export restrictions;
- export controls relating to technology;
- tariffs and other trade barriers;

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- difficulties in collecting international accounts receivable and longer collection periods;
- the impact of local economic conditions and practices;
- difficulties in staffing and managing foreign operations;

15

- difficulties in complying with foreign regulatory and commercial requirements;
- increased costs associated with maintaining international marketing efforts;
- political and economic instability;
- reduced protection for intellectual property rights;
- cultural and language difficulties;
- challenges caused by distance;
- the potential exchange and repatriation of foreign earnings; and
- the localization and translation of products and services.

Our success in expanding our international sales activities will depend in large part on our ability to anticipate and effectively manage these and other risks, many of which are outside of our control. Any of these risks could materially and adversely affect our international operations and, consequently, our operating results. We cannot provide any assurance that we will be able to successfully market, sell and deliver our products and services in foreign markets.

WE MAY BE UNABLE TO SUCCESSFULLY ACQUIRE OTHER BUSINESSES, TECHNOLOGY OR COMPANIES, OR TO FORM STRATEGIC ALLIANCES AND RELATIONSHIPS, OR TO SUCCESSFULLY REALIZE THE BENEFITS OF ANY ACQUISITION OR ALLIANCE.

In the past, we have grown by acquiring complimentary businesses, technologies, services and products and entering into strategic alliances and relationships with complimentary businesses. We evaluate potential acquisition opportunities from time to time, including those that could be material in size and scope. As part of our growth strategy, we intend to continue to evaluate potential acquisitions, investment opportunities and strategic alliances on an ongoing basis as they present themselves to facilitate our ability to enhance our existing products, services and technology, and introduce new products, services and technology, on a timely basis. However, we do not know if we will be able to identify any future opportunities that we believe will be beneficial for us. Even if we are able to identify an appropriate acquisition opportunity, we may not be able to successfully finance the acquisition. A failure to identify or finance future acquisitions may impair our growth and adversely affect our business.

Any future acquisition involves risks commonly encountered in business relationships, including:

- difficulties in assimilating and integrating the operations, personnel, technologies, products and services of the acquired businesses;

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- the technologies, products or businesses that we acquire may not achieve expected levels of revenue, profitability, benefits or productivity;
- difficulties in retaining, training, motivating and integrating key personnel;
- diversion of management's time and resources away from our normal daily operations;
- difficulties in successfully incorporating licensed or acquired technology and rights into our product and service offerings;
- difficulties in maintaining uniform standards, controls, procedures and policies within the combined organizations;
- difficulties in retaining relationships with customers, employees and suppliers of the acquired company;
- the need to implement or remediate controls, procedures and policies appropriate for a public company at companies that prior to the acquisition lacked these controls, procedures and policies;
- risks of entering markets in which we have no or limited direct prior experience;
- potential disruptions of our ongoing businesses; and
- unexpected costs and unknown liabilities associated with the acquisitions.

For these reasons, future acquisitions could materially and adversely affect our existing businesses. Moreover, we cannot predict the accounting treatment of any acquisition, in part because we cannot be certain

16

whether current accounting regulations, conventions or interpretations will prevail in the future.

In addition, to finance any future acquisitions, it may be necessary for us to incur additional indebtedness or raise additional funds through public or private financings. This financing may not be available to us at all, or if available may not be available on terms satisfactory to us or to those whose consents are required for such financing. Available equity or debt financing available may materially and adversely affect our business and operations and, in the case of equity financings, may significantly dilute the percentage ownership interests of our stockholders.

We cannot assure you that we will make any additional acquisitions or that any acquisitions, if made, will be successful, will assist us in the accomplishment of our business strategy, or will generate sufficient revenues to offset the associated costs and other adverse effects or will otherwise result in us receiving the intended benefits of the acquisition. In addition, we cannot assure you that any acquisition of new businesses or technology will lead to the successful development of new or enhanced products and services, or that any new or enhanced products and services, if developed, will achieve market acceptance or prove to be profitable.

IF WE FAIL TO ADEQUATELY PROTECT OUR INTELLECTUAL PROPERTY RIGHTS, WE

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

COULD LOSE IMPORTANT PROPRIETARY TECHNOLOGY, WHICH COULD MATERIALLY AND ADVERSELY AFFECT OUR BUSINESS.

Our success and ability to compete depends, in substantial part, upon our ability to develop and protect our proprietary technology and intellectual property rights to distinguish our products, services and technology from those of our competitors. The unauthorized use of our intellectual property rights and proprietary technologies by others could materially harm our business. We rely primarily on a combination of copyright, trademark and trade secret laws, along with confidentiality agreements, contractual provisions and licensing arrangements, to establish and protect our intellectual property rights. Although we hold copyrights and trademarks in our business, and we have applied for a patent and the registration of a number of new trademarks and service marks and intend to introduce new trademarks and service marks, we believe that the success of our business depends more upon our proprietary technology, information, processes and know-how than on patents or trademark registrations. In addition, much of our proprietary information and technology may not be patentable. We may not be successful in obtaining any patents or in registering new marks.

Despite our efforts to protect our intellectual property rights, existing laws afford only limited protection, and our actions may be inadequate to protect our rights or to prevent others from claiming violations of their proprietary rights. Unauthorized third parties may attempt to copy, reverse engineer or otherwise obtain, use or exploit aspects of our products and services, develop similar technology independently, or otherwise obtain and use information that we regard as proprietary. We cannot assure you that our competitors will not independently develop technology similar or superior to our technology or design around our intellectual property. In addition, the laws of some foreign countries may not protect our proprietary rights as fully or in the same manner as the laws of the United States.

We may need to resort to litigation to enforce our intellectual property rights, to protect our trade secrets, and to determine the validity and scope of other companies' proprietary rights in the future. However, litigation could result in significant costs or the diversion of management and financial resources. We cannot assure you that any such litigation will be successful or that we will prevail over counterclaims against us. Our failure to protect any of our important intellectual property rights or any litigation that we resort to in order to enforce those rights could materially and adversely affect our business.

IF WE BECOME SUBJECT TO CLAIMS OF INFRINGEMENT OF INTELLECTUAL PROPERTY RIGHTS OF THIRD PARTIES, WE COULD ENCOUNTER EXPENSIVE LITIGATION, BE LIABLE FOR SIGNIFICANT DAMAGES OR INCUR RESTRICTIONS ON OUR ABILITY TO SELL OUR PRODUCTS AND SERVICES.

Although we are not aware of any present infringement of our products or technologies on the intellectual property rights of others, we cannot be certain that our products, services and technologies do not or in the future will not infringe on the valid intellectual property rights held by third parties. In addition, we cannot assure you that third parties will not claim that we have infringed their intellectual property rights. We may incur substantial expenses in litigation defending against any third party infringement claims, regardless of their merit. Successful infringement claims against us could result in substantial monetary liability, require us to enter into royalty or licensing arrangements, or otherwise materially disrupt the conduct of our business. In addition, even if we prevail

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

on these claims, this litigation could be time-consuming and expensive to defend or settle, and could result in the diversion of our time and attention, which could materially and adversely affect our business.

In recent years, there has been a significant amount of litigation in the United States involving patents and other intellectual property rights. In the future, we may be a party to litigation as a result of an alleged infringement of others' intellectual property. These claims and any resulting lawsuits, if successful, could subject us to significant liability for damages and invalidation of our proprietary rights. These lawsuits, regardless of their success, would likely be time-consuming and expensive to resolve and could divert management's time and attention. Any potential intellectual property litigation also could force us to do one or more of the following:

- stop selling, incorporating or using our products and services that use the infringed intellectual property;
- obtain from the owner of the infringed intellectual property right a license to sell or use the relevant technology, which license may not be available on commercially reasonable terms, or at all; or
- redesign the products and services that use the technology.

If we are forced to take any of these actions, our business may be seriously harmed. Although we carry general liability insurance, our insurance may not cover potential claims of this type or may not be adequate to indemnify us for all liability that may be imposed.

RECENT TERRORIST ACTIVITIES AND RESULTING MILITARY AND OTHER ACTIONS COULD ADVERSELY AFFECT OUR BUSINESS.

The terrorist attacks in recent years have disrupted commerce throughout the world. In response to such attacks, the U.S. is actively using military force to pursue those behind these attacks and initiating broader actions against global terrorism. The continued threat of terrorism, the escalation of military action, and heightened security measures in response to such threats may cause future significant disruptions to commerce throughout the world. To the extent that such disruptions affect our customers by resulting in reductions in capital expenditures or spending on energy products, services and technology, longer sales cycles, or deferrals or delays of orders by our customers, our business and results of operations could be materially and adversely affected.

WE FACE SOME RISKS THAT ARE INHERENT IN NATURAL GAS AND ELECTRICAL OPERATIONS.

Some of our operations are subject to the hazards and risks inherent in the servicing and operation of natural gas assets, including encountering unexpected pressures, explosions, fire, natural disasters, blowouts, cratering and pipeline ruptures, as well as in the manufacture, sale and operation of electrical equipment such as PowerSecure's distributed generation system, including electrical shocks, which hazards and risks could result in personal injuries, loss of life, environmental damage and other damage to our properties and the properties of others. These operations involve numerous financial, business, regulatory, environmental, operating and legal risks. Damages occurring as a result of these risks may give rise to product liability claims against us. We have product liability insurance generally providing up to \$6 million coverage per occurrence and \$7 million annual aggregate coverage. Although we believe that our insurance is adequate and customary for companies of our size that are engaged in operations similar to ours, losses due to risks and uncertainties could occur for uninsurable or uninsured risks or could exceed our insurance coverage. Therefore, the occurrence of a significant adverse effect that is not fully covered by insurance could have a material and adverse

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

effect on our business. In addition, we cannot assure you that we will be able to maintain adequate insurance in the future at reasonable rates.

SOME OF POWERSECURE'S LONG-TERM TURN-KEY CONTRACTS SUBJECT US TO RISKS.

Some of PowerSecure's contracts for turn-key distributed generation projects have a term of many years, during which time some risks to its business may arise due to its obligations under those contracts, even though PowerSecure believes it has mitigated those risks. For example, PowerSecure is responsible for full maintenance on the generators and switchgear during the term of the contract, but it has set aside reserves expected to be sufficient to cover its maintenance obligations and has purchased maintenance packages designed to cover maintenance on the generators. In addition, changes in circumstances that were not contemplated at the time of the contract could expose PowerSecure to unanticipated risks or to protracted or costly dispute resolution.

18

WE COULD BECOME SUBJECT TO BURDENSOME GOVERNMENT REGULATION THAT AFFECTS OUR ABILITY TO OFFER OUR PRODUCTS AND SERVICES OR THAT AFFECTS DEMAND FOR OUR PRODUCTS AND SERVICES.

Our business operations are subject to varying degrees of federal, state, local and foreign laws and regulations. Regulatory agencies may impose special requirements for implementation and operation of our products, services or technologies that may significantly impact or even eliminate some of our target markets. We may incur material costs or liabilities in complying with government regulations. In addition, potentially significant laws, regulations and requirements may be adopted or imposed in the future. Furthermore, some of our customers must comply with numerous laws and regulations. The modification or adoption of future laws and regulations could adversely affect our business and our ability to continually modify or alter our methods of operations at reasonable costs. We cannot provide any assurances that we will be able, for financial or other reasons, to comply with all applicable laws and regulations. If we fail to comply with these laws and regulations, we could become subject to substantial penalties which could materially and adversely affect our business.

OUR BUSINESS COULD SUFFER IF WE CANNOT MAINTAIN AND EXPAND OUR CURRENT STRATEGIC ALLIANCES AND DEVELOP NEW ALLIANCES.

One element of our business strategy is the development of corporate relationships such as strategic alliances with other companies to provide products and services to existing and new markets and to develop new products and services and enhancements to existing products and services. We believe that our success in the future in penetrating new markets will depend in large part on our ability to maintain these relationships and to cultivate additional or alternative relationships. However, we cannot assure you that we will be able to develop new corporate relationships, or that these relationships will be successful in achieving their purposes. Our failure to continue our existing corporate relationships and develop new relationships could materially and adversely affect our business.

WE DEPEND ON SOLE SOURCE OR LIMITED SOURCE SUPPLIERS FOR SOME OF THE KEY COMPONENTS AND MATERIALS IN OUR PRODUCTS, WHICH MAKES US SUSCEPTIBLE TO SUPPLY SHORTAGES OR PRICE INCREASES THAT COULD ADVERSELY AFFECT OUR BUSINESS.

We depend on sole or limited source suppliers for key components and materials for some of our products such as generators, and if we are unable to obtain these components on a timely basis, we will not be able to deliver our

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

products to customers. Also, we cannot guarantee that any of the parts or components that we purchase, if available at all, will be of adequate quality or that the prices we pay for these parts or components will not increase. We may experience delays in production if we fail to identify alternate vendors, or if any supply of components is interrupted or reduced and we have failed to identify an alternative vendor or if there is a significant increase in the cost of such components, each of which could materially and adversely affect our business and operations.

RISKS RELATED TO THIS OFFERING

AS A RESULT OF THEIR BENEFICIAL OWNERSHIP OF A LARGE PERCENTAGE OF OUR COMMON STOCK, OUR DIRECTORS, EXECUTIVE OFFICERS AND SIGNIFICANT STOCKHOLDERS COULD EXERT SIGNIFICANT INFLUENCE OVER MATTERS REQUIRING STOCKHOLDER APPROVAL, LIMITING YOUR ABILITY TO INFLUENCE CORPORATE MATTERS.

As of June 1, 2004, our executive officers, directors and 10% or greater stockholders beneficially owned, in the aggregate, approximately 42% of our outstanding common stock, assuming they exercise or convert all stock options, warrants and convertible preferred stock that they hold. As a result, these stockholders could, as a practical matter, exercise a significant level of control over matters requiring approval by our stockholders, including the election of directors, the approval of mergers and sales of substantially all of our assets and other significant corporate transactions. The interests of these stockholders may differ from your interests, and the concentration of control may limit your ability to influence corporate matters. In addition, this concentration of stock ownership may have the effect of discouraging, delaying or preventing a change in control of us, adversely affect the market price of our common stock.

VIRTUALLY ALL OF OUR SHARES ARE ELIGIBLE FOR FUTURE SALE BY OUR CURRENT STOCKHOLDERS, AND SIGNIFICANT SALES OF THESE SHARES COULD RESULT IN A DECLINE IN OUR STOCK PRICE.

If our stockholders sell a significant number of shares of our common stock in the public market, including

19

shares issuable upon the exercise of outstanding options, warrants and other rights, or if there is a perception that these sales could occur, then the market price of our common stock could fall. These sales also might make it more difficult for us to sell equity securities in the future at a time and price that we deem appropriate.

On June 1, 2004, 10,951,701 shares of common stock were outstanding. On the same date, options to purchase 1,644,541 shares of common stock were outstanding, and shares that may be acquired upon exercise of these stock options are eligible for sale on the public market from time to time subject to vesting. Also, on that date, 4,500 shares of Series B preferred stock convertible into 2,070,639 shares of common stock, and warrants to purchase 2,978,727 shares of common stock, were outstanding. The resale of virtually all of these shares are currently eligible for resale either under an available exemption from the registration requirements of the Securities Act or are covered by currently effective registration statements, including the registration statement of which this prospectus is part of. The exercise or conversion of outstanding options, warrants and other rights to purchase our common stock will dilute the remaining ownership of other holders of our common stock. In addition, the sale in the public market of a significant number of these shares issuable upon the exercise of options, warrants and other rights, or the perception that such sales could occur, could cause the price of our

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

common stock to decline.

CHANGES IN LAWS, REGULATIONS AND FINANCIAL ACCOUNTING STANDARDS COULD MATERIALLY AND ADVERSELY AFFECT OUR BUSINESS AND OUR REPORTED RESULTS OF OPERATIONS.

Recently enacted and proposed changes in the laws and regulations affecting public companies, including the Sarbanes-Oxley Act of 2002 and related SEC regulations, may cause us to incur increased costs of compliance and result in changes in accounting standards or accepted practices within our industry. New laws, regulations and accounting standards, as well as the questioning of, or changes to, currently accepted accounting practices in the technology industry may adversely affect our reported financial results, which could have an adverse effect on our stock price. For example, proposals have been made concerning the expensing of employee stock options which could result in rules or laws that could adversely affect our reported financial results and have an adverse effect on our stock price. New rules could also make it more difficult for us to obtain certain types of insurance, including director and officer liability insurance, forcing us to accept reduced policy limits and coverage or incur substantially higher costs to obtain the same or similar coverage. The impact of these events could also make it more difficult for us to attract and retain qualified persons to serve on our board of directors or as our executive officers.

IF WE ACCOUNT FOR EMPLOYEE STOCK OPTIONS USING THE FAIR VALUE METHOD AS IS CURRENTLY PROPOSED BY THE FINANCIAL ACCOUNTING STANDARDS BOARD, IT COULD SIGNIFICANTLY REDUCE OUR NET INCOME OR INCREASE OUR NET LOSS.

There has been ongoing public debate whether stock options granted to employees should be treated as a compensation expense and, if so, how to properly value such charges. On March 31, 2004, the Financial Accounting Standards Board issued an Exposure Draft, Share-Based Payment: an amendment of FASB statements No. 123 and 95, which would require a company to recognize, as an expense, the fair value of stock options and other stock-based compensation to employees beginning in 2005 and subsequent reporting periods. If we elect or are required to record an expense for our stock-based compensation plans using the fair value method as described in the Exposure Draft, we could have significant ongoing accounting charges, reducing any future net income or increasing any future net losses.

ANTI-TAKEOVER PROVISIONS IN OUR CHARTER DOCUMENTS AND UNDER DELAWARE LAW COULD DISCOURAGE OR PREVENT A THIRD-PARTY ACQUISITION OF OUR COMMON STOCK, EVEN IF AN ACQUISITION THAT STOCKHOLDERS MAY CONSIDER FAVORABLE.

Some provisions in our second restated certificate of incorporation and our amended and restated by-laws, as well as some provisions of Delaware law, could have the effect of discouraging, delaying or preventing a third party from attempting to acquire us, even if stockholders consider the transaction to be beneficial. These provisions could also limit the price that investors might be willing to pay in the future for shares of our common stock. These provisions include:

- a classified board of directors in which only approximately one-third of the total board members are elected at each annual meeting;
- the existence of large amounts of authorized but unissued shares of common stock and preferred stock;

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- authority for our board of directors to issue common stock and preferred stock, and to determine the price, voting and other rights, preferences, privileges and restrictions of undesignated shares of the preferred stock, without any vote by or approval of our stockholders (other than the consent of holders of Series B preferred stock relating to any senior or equal ranking securities);
- super-majority voting requirements to effect material amendments to our second restated certificate and by-laws;
- limiting the persons who may call special meetings of stockholders;
- prohibiting stockholders from acting by written consent without a meeting;
- a fair price provision that sets minimum price requirements for potential acquirers under certain conditions;
- anti-greenmail provisions which limit our ability to repurchase shares of common stock from significant stockholders;
- restrictions under Delaware law on mergers and other business combinations between us and any 15% stockholders; and
- advance notice requirements for director nominations and for stockholder proposals.

In addition, we have entered into employment agreements with certain executive officers and other employees which, among other things, include severance and changes in control provisions. The provisions could make a change in control costly for a potential acquirer and thus discourage a take-over attempt.

OUR STOCKHOLDER RIGHTS AGREEMENT MAKES EFFECTING A CHANGE OF CONTROL MORE DIFFICULT, WHICH MAY DISCOURAGE OFFERS FOR SHARES OF OUR COMMON STOCK.

Our board of directors has adopted an amended and restated rights agreement. Our rights agreement may have the effect of delaying, deterring, or preventing changes in our management or control of us, which may discourage potential acquirers who otherwise might wish to acquire us without the consent of the board of directors. Under the rights plan, if a person or group acquires 15% or more of our common stock, all holders of rights (other than the acquiring stockholder) may, upon payment of the purchase price then in effect, purchase common stock having a value of twice the purchase price. We waived the provisions of the rights agreement with respect to the securities issued in the May 2004 private placement and the recent conversion of Series B preferred stock. In the event that we are involved in a merger or other similar transaction where we are not the surviving corporation, all holders of rights (other than the acquiring stockholder) shall be entitled, upon payment of the then in effect purchase price, to purchase common stock of the surviving corporation having a value of twice the purchase price. The rights will expire on November 30, 2011, unless we extend the terms of the rights agreement or we earlier redeem or exchange the rights. See "Description of Capital Stock - Rights Agreement."

WE HAVE NOT IN THE PAST AND WE DO NOT CURRENTLY INTEND TO PAY DIVIDENDS ON OUR COMMON STOCK, AND EVEN IF WE DID OUR ABILITY TO PAY DIVIDENDS IS LIMITED.

We have never declared or paid any cash dividends on our common stock. Therefore, a stockholder will not experience a return on its investment in our common stock without selling its shares, because we currently intend on

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

retaining any future earnings to fund our growth and do not expect to pay dividends in the foreseeable future on the common stock.

Under Delaware law, we are not permitted to make a distribution to our stockholders, including dividends on our capital stock, if, after giving effect to the payment, we would not be able to pay our debts as they become due in the usual course of business or if our total assets would be less than the sum of our total liabilities plus the amount which would be needed if we were to be dissolved at the time of the distribution, to satisfy the preferential rights upon dissolution of stockholders whose preferential rights are superior to those receiving the distribution.

We currently intend to retain all future earnings, if any, for use in the operation and expansion of our business and for the servicing and repayment of indebtedness. As a holding company with no independent operations, our ability to pay dividends is dependant upon the receipt of dividends or other payments from our subsidiaries. The terms of our credit facility limit our ability to pay dividends, other than on our Series B preferred

21

stock by prohibiting the payment of dividends by our subsidiaries without the consent of the lender. In addition, the terms of our Series B preferred stock contain certain restrictions on our ability to pay dividends on our common stock. Future dividends, if any, will be determined by our Board of Directors, based upon our earnings, financial condition, capital resources, capital requirements, charter restrictions, contractual restrictions and such other factors as our Board of Directors deems relevant.

OUR STOCK PRICE IS SUBJECT TO EXTREME PRICE AND VOLUME FLUCTUATIONS, WHICH COULD ADVERSELY AFFECT AN INVESTMENT IN OUR STOCK.

The market price and volume of our common stock has in the past been, and in the future is likely to continue to be, highly volatile. The stock market in general has been experiencing extreme price and volume fluctuations for years. The market prices of securities of technology companies have been especially volatile. A number of factors could cause wide fluctuations in the market price and trading volume of our common stock in the future, including:

- actual or anticipated variations in our results of operations;
- announcements of technological innovations;
- changes in, or the failure by us to meet, securities analysts' estimates and expectations;
- the receipt or loss of significant customer orders;
- the introduction of new and enhanced products and services by us or our competitors;
- conditions or trends in the energy and technology industries in general, and in the particular markets we service;
- announcements by us or our competitors of technical innovations, new products and services, significant contracts, acquisitions, strategic relationships, joint ventures or capital commitments;
- the lower coverage by securities analysts and the media of issuers with securities trading on the OTC Bulletin Board;
- announcements by us or our competitors of the success or status of

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

our business;

- changes in the market valuation of other energy or technology companies;
- additions or departures of key personnel;
- commencement of new and changes in existing litigation;
- general economic, business and market conditions; and
- sales of our common stock by directors, executive officers and significant stockholders.

Many of these factors are beyond our control. The occurrence of any one or more of these factors could cause the market price of our common stock to fall, regardless of our operating performance.

In addition, broad fluctuations in price and volume have been unrelated or disproportionate to operating performance, both of the market in general and of us in particular. Any significant fluctuations in the future might result in a material decline in the market price of our common stock. In the past, following periods of volatility in the market price of a company's securities, securities class action litigation has often been brought against that company. We may become involved in this type of litigation in the future. Securities litigation is often expensive and could divert management's attention and resources, which could have a material adverse effect on our business, even if we ultimately prevail in the litigation.

WE MAY ISSUE ADDITIONAL SHARES OF PREFERRED STOCK WHICH COULD DILUTE THE INTERESTS OF HOLDERS OF OUR COMMON STOCK.

The terms of our Series B preferred stock do not limit the issuance of additional series of preferred stock ranking junior to the Series B preferred stock, but do require the approval of the holders of a majority of the outstanding shares of Series B preferred stock to issue any stock senior to or on a parity with the Series B preferred stock. The issuance of additional shares of preferred stock, even if it ranks junior to the Series B preferred stock,

22

could dilute the interest of holders of our common stock.

THERE MAY NOT BE A LIQUID MARKET FOR OUR COMMON STOCK, WHICH COULD LIMIT THE ABILITY OF A PURCHASER OF OUR COMMON STOCK TO RESALE ANY SHARES THAT ARE ACQUIRED.

Our common stock is currently traded on the OTC Bulletin Board. This market generally has less liquidity than the national exchanges or the Nasdaq Stock Market, and certain institutional investors are precluded from acquiring or holding securities that is only traded in this market. Accordingly, a person who purchases any shares under this prospectus may be limited in his ability to resell those shares. We cannot provide any assurance that persons who purchases shares under this prospectus will be able to sell those shares at prices or times that are desirable to that person.

SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This prospectus and documents incorporated by reference in this prospectus contain forward-looking statements within the meaning of and made under the safe harbor provisions of Section 27A of the Securities Act of 1933, and Section 21E of the Securities Exchange Act of 1934. Forward-looking statements are all

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

statements other than statements of historical facts, including statements that refer to plans, intentions, objectives, goals, strategies, hopes, beliefs, projections, expectations or other characterizations of future events or performance, and assumptions underlying the foregoing. The words "may", "could", "should", "would", "will", "project", "intend", "continue", "believe", "anticipate", "estimate", "forecast", "expect", "plan", "potential", "opportunity" and "scheduled", variations of such words, and other similar expressions are often, but not always, used to identify forward-looking statements. Examples of forward-looking statements include, but are not limited to, statements about the following:

- our prospects, including our future revenues, expenses, net income, margins, profitability, cash flow, liquidity, financial condition and results of operations;
- our products and services, market position, market share, growth and strategic relationships;
- our business plans, strategies, goals and objectives;
- the sufficiency of our capital resources, including our cash and cash equivalents, funds generated from operations, available borrowings and other capital resources, to meet our future working capital, capital expenditure, debt service and business growth requirements, including our ability to satisfy the redemption requirements related to our Series B preferred stock;
- the effects on our business, financial condition and results of operations of the resolution of pending or threatened litigation and claims;
- market demand for and customer benefits attributable to our products and services;
- industry trends and customer preferences;
- the nature and intensity of our competition, and our ability to successfully compete in our markets;
- pending or potential business acquisitions, combinations, sales, alliances, relationships and other similar business transactions;
- our ability to successfully develop, operate and grow our new businesses; and
- future economic, business, market and regulatory conditions.

Any forward-looking statements we make are based on our current plans, intentions, objectives, goals, strategies, hopes, beliefs, projections and expectations, as well as assumptions made by and information currently available to management. You are cautioned not to place undue reliance on any forward-looking statements, any or all of which could turn out to be wrong. Forward-looking statements are not guarantees of future performance or

events, but are subject to and qualified by substantial risks, uncertainties and other factors, which are difficult to predict and are often beyond our control. Forward-looking statements will be affected by assumptions we might make that do not materialize or prove to be incorrect and by known and unknown risks, uncertainties and other factors that could cause actual results to differ

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

materially from those expressed, anticipated or implied by such forward-looking statements. These risks, uncertainties and other factors include, but are not limited to, those described in "Risk Factors", as well as other risks, uncertainties and factors discussed elsewhere in this prospectus, in documents that we include as exhibits to or incorporate by reference in this prospectus, and in other reports and documents we from time to time file with or furnish to the Securities and Exchange Commission.

Any forward-looking statements contained in this prospectus speak only as of the date of this prospectus. We do not intend, and we undertake no duty or obligation, to update or revise any forward-looking statement for any reason, whether as a result of changes in our expectations or the underlying assumptions, the receipt of new information, the occurrence of future or unanticipated events, circumstances or conditions or otherwise.

USE OF PROCEEDS

We will not receive any proceeds from the sale of the shares offered under this prospectus by the selling securityholders. All proceeds from the sale of the shares offered under this prospectus hereby will be for the account of the selling securityholders listed below in "Selling Securityholders."

However, because 2,262,297 shares of common stock offered by this prospectus are issuable upon the exercise of warrants held by the selling securityholders, we will receive the proceeds, if any, from any exercise of the warrants by the selling securityholders in cash. If all the warrants are exercised in cash, then we will receive aggregate gross proceeds of approximately \$7.3 million, assuming the exercise prices of the warrants are not adjusted. See "Description of Capital Stock - Warrants." We anticipate that the proceeds from any cash exercises of warrants will be used for general corporate purposes, which may include working capital, capital expenditures, and the repayment of indebtedness, or for acquisitions of businesses, technology or assets and repurchases of securities. We cannot assure you that any of the warrants will be exercised in cash or, if any warrants are exercised, when these exercises will occur.

SELLING SECURITYHOLDERS

References in this prospectus to the selling securityholders include the persons listed in the table below and any donees, pledgees, transferees or other successors-in-interest selling shares received from a selling securityholder as a gift, pledge, partnership distribution or other transfer after the date of this prospectus.

All of the shares of common stock offered by the selling securityholders under this prospectus were issued to, or are issuable upon the exercise of warrants issued to, the selling securityholders in private placement transactions exempt from the registration requirements of the Securities Act under Section 4(2) of the Securities Act and Rule 506 of Regulation D promulgated under the Securities Act.

We have registered the resale by the selling securityholders of the shares offered under this prospectus under their registration rights. In connection with the issuance in the May 2004 private placement of an aggregate of 3,510,548 shares of common stock and warrants to purchase 1,053,164 shares of common stock, we entered into a registration rights agreement. In addition, we agreed to register the resale of 55,871 of the shares of common stock, and 1,209,133 shares of common stock issuable upon the exercise of warrants, issued to certain holders who converted 2,500 shares of Series B preferred stock in May 2004. Under the registration rights agreement, we agreed to register the public resale of all shares of common stock issued or issuable in connection with the private placement by filing a registration statement with the SEC and keeping the

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

registration statement effective until the earliest of the following:

- five years after the registration statement becomes effective;
- such time as all such shares have been publicly resold;
- such time as all such shares may be sold under Rule 144(k) under the Securities Act.

24

The actual number of shares of common stock covered by this prospectus, and included in the registration statement of which this prospectus is a part, includes additional shares of common stock that may be issued as a result of stock splits, stock dividends or similar transactions relating to our securities.

The following table sets forth, as of June 1, 2004, except as otherwise stated in the notes to the table, the following information based on the most recent information provided to us by or on behalf of the selling securityholders:

- the name of each selling securityholder;
- the number of shares and the percent of common stock beneficially owned by each selling securityholder;
- the number of shares that may be offered for sale from time to time by each selling securityholder under this prospectus; and
- the number of shares and the percentage of common stock to be beneficially owned by each selling securityholder assuming the sale of all the shares offered under this prospectus.

The shares offered under this prospectus may be sold from time to time by the selling securityholders. We are not aware of any current agreement, arrangement or understanding by the selling securityholders with respect to the sale of any shares offered under this prospectus. Each selling securityholder may decide to sell under this prospectus all, some or none of the shares listed in the table. Accordingly, we cannot estimate the number of shares that the selling securityholders will beneficially own after completion of this offering. In addition, the selling securityholders identified below may have sold, transferred or otherwise disposed of all or a part of their common stock since the date on which they provided the information regarding their beneficial ownership.

Beneficial ownership is determined under the rules and regulations of the SEC and generally includes voting or investment control, but is not necessarily indicative of beneficial ownership for any other purpose. Unless otherwise indicated below, to our knowledge, each selling securityholder named in the table below has sole voting and investment power with respect to the shares shown in the table, except as provided by applicable community property laws. In computing the number of shares of common stock and the percent of outstanding common stock beneficially owned by a selling securityholder, beneficial ownership includes any shares issuable under options, warrants, conversion rights and other rights that are exercisable on or within 60 days of June 1, 2004. Such shares, however, are not included for purposes of computing the beneficial ownership of any other selling securityholder. The percentage of beneficial ownership is based upon 10,951,701 shares of common stock outstanding on June 1, 2004.

Information about the selling securityholders may change over time. Any

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

changed information will be contained in one or more prospectus supplements. None of the selling securityholders has held any position, office or other material relationship with us or any of our affiliates within the past three years, other than as a result of the ownership of our shares or other securities, except that Roth Capital Management, LLC acted as our placement agent in the May 2004 private placement.

25

| NAME OF SELLING SECURITYHOLDER | SHARES BENEFICIALLY OWNED PRIOR TO OFFERING | | NUMBER OF SHARES OFFERED (1) | BENE AFTE NUMB |
|----------------------------------------------|---------------------------------------------------|---------|------------------------------------|----------------------|
| | NUMBER | PERCENT | | |
| Lagunitas Partners LP (3) (4) | 677,419 | 6.1 | 677,419 | 0 |
| Gruber & McBaine International (4) (5) | 174,193 | 1.6 | 174,193 | 0 |
| Jon D. Gruber & Linda W. Gruber (4) (6) | 58,064 | * | 58,064 | 0 |
| J. Patterson McBaine (4) (7) | 58,064 | * | 58,064 | 0 |
| Smithfield Fiduciary LLC (8) | 600,000 | 6.0 | 600,000 | 0 |
| Stonestreet L.P. (9) | 232,258 | 3.9 | 232,258 | 0 |
| Genesis Microcap Inc. (10) | 38,710 | * | 38,710 | 0 |
| Alpha Capital Aktiengesellschaft (11) | 154,838 | 1.4 | 154,838 | 0 |
| Treeline Investment Partners, L.P. (12) | 96,774 | * | 96,774 | 0 |
| Winston Investment Partners (13) | 48,388 | * | 48,388 | 0 |
| Winston Capital Management, LLC (14) | 48,388 | * | 48,388 | 0 |
| Raven Offshore Master, L.P. (15) | 48,388 | * | 48,388 | 0 |
| MFN LLC (16) | 96,774 | * | 96,774 | 0 |
| Microcapital Fund Ltd (17) | 116,129 | 1.1 | 116,129 | 0 |
| Microcapital Fund LP (18) | 193,548 | 1.8 | 193,548 | 0 |
| Omicron Master Trust (19) | 290,322 | 2.6 | 290,322 | 0 |
| WS Opportunity Fund (Q.P.) L.P. (20) | 100,687 | * | 100,687 | 0 |
| WS Opportunity Fund L.P. (21) | 82,301 | * | 82,301 | 0 |
| WS Opportunity Fund International, Ltd. (22) | 107,335 | * | 107,335 | 0 |
| Flyline Holdings, Ltd. (23) | 73,200 | * | 73,200 | 0 |
| Ritchie Maple Trading, Ltd. (24) | 106,800 | * | 106,800 | 0 |

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

| | | | |
|------------------------------------|--------|---|--------|
| Ridgecrest Partners Q.P. L.P. (25) | 56,760 | * | 56,760 |
| Ridgecrest Partners L.P. (26) | 2,760 | * | 2,760 |
| Ridgecrest Partners LTD (27) | 14,760 | * | 14,760 |
| Catalyst Partners LP (28) | 17,760 | * | 17,760 |
| Catalyst International (29) | 17,160 | * | 17,160 |
| Quantum Partners LDC (30) | 45,600 | * | 45,600 |
| David D. May (31) | 19,356 | * | 19,356 |

26

| NAME OF SELLING SECURITYHOLDER ----- | SHARES BENEFICIALLY OWNED PRIOR TO OFFERING ----- | | NUMBER OF SHARES OFFERED (1) ----- |
|------------------------------------------------------------------------------------------|------------------------------------------------------------|---------|---------------------------------------------|
| | NUMBER | PERCENT | |
| Bristol Investment Fund, Ltd. (32) | 154,838 | 1.4 | 154,838 |
| Neal I. Goldman (33) | 120,000 | 1.1 | 120,000 |
| Kynikos Opportunity Fund, L.P. (34) | 9,840 | * | 9,840 |
| Kynikos Opportunity Fund II, L.P. (35) | 50,160 | * | 50,160 |
| Kynikos Opportunity Fund International Limited (36) | 30,000 | * | 30,000 |
| Code Blue Holdings, Inc. (37) | 48,000 | * | 48,000 |
| Zachary Prensky (38) | 12,000 | * | 12,000 |
| Fountainhead Fund (39) | 60,000 | * | 60,000 |
| TCMP3 Partners (40) | 58,064 | * | 58,064 |
| SRG Capital, LLC (41) | 58,064 | * | 58,064 |
| Covenant Investments, L.P. (42) | 19,355 | * | 19,355 |
| The Leisure Fund, L.P. (43) | 15,600 | * | 15,600 |
| Roth Capital Partners LLC (44) | 351,055 | 3.4 | 351,055 |
| GMAM Investment Funds Trust II- Promark Alternative High Yield Bond Fund (45) (46) | 1,016,057 | 8.8 | 254,216 (47) |
| B III-A Capital Partners, L.P. (46) (48) | 508,030 | 4.5 | 127,111 (49) |
| DDJ Canadian High Yield Fund (46) (50) | 1,524,527 | 13.8 | 381,326 (51) |

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

| | | | |
|--------------------------------------------------------|---------|-----|--------------|
| Special Situations Fund III, L.P. (52) (53) | 668,694 | 5.9 | 207,471 (54) |
| Special Situations Private Equity Fund, L.P. (53) (55) | 405,619 | 3.6 | 126,092 (56) |
| Special Situations Technology Fund, L.P. (53) (57) | 51,751 | * | 16,075 (58) |
| Special Situations Technology Fund II, L.P. (53) (59) | 267,427 | 2.4 | 83,892 (60) |
| Special Situations Cayman Fund, L.P. (53) (61) | 222,564 | 2.0 | 68,821 (62) |

* Less than 1%

- (1) Represents the number of shares of common stock that may be offered from time to time under this prospectus by the selling securityholders, including shares of outstanding common stock held by the selling securityholders and shares of common stock issuable upon the exercise of outstanding warrants held by the securityholders.

27

- (2) Assumes the sale of all of the shares of common stock offered under this prospectus. However, the selling securityholders may sell all, some or none of the shares offered under this prospectus.
- (3) Includes 112,903 shares that may be acquired upon the exercise of currently exercisable warrants.
- (4) Gruber & McBaine Capital Management is the investment adviser for Gruber & McBaine International and the general partner of Lagunitas Partners LP. Jon D. Gruber and J. Patterson McBaine are managers of Gruber & McBaine Capital Management and have voting control and investment discretion over the securities held by Lagunitas Partners LP and Gruber & McBaine International. Lagunitas Partners LP, Gruber & McBaine International, John D. Gruber and J. Patterson McBaine disclaim beneficial ownership of shares held by each other.
- (5) Includes 29,032 shares that may be acquired upon the exercise of currently exercisable warrants.
- (6) Includes 9,677 shares that may be acquired upon the exercise of currently exercisable warrants.
- (7) Includes 9,677 shares that may be acquired upon the exercise of currently exercisable warrants.
- (8) Includes 100,000 shares that may be acquired upon the exercise of currently exercisable warrants. Highbridge Capital Management, LLC is the trading manager of Southfield Fiduciary LLC and consequently has voting control and investment discretion over securities held by Smithfield Fiduciary LLC. Glen Dubin and Henry Swieca control Highbridge Management LLC. Each of Highbridge Capital LLC, Glen Dubin and Henry Swieca disclaims beneficial ownership of the securities held by Smithfield Fiduciary LLC.

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- (9) Includes 38,710 shares that may be acquired upon the exercise of currently exercisable warrants. Michael Finkelstein in the capacity as an officer of Shonestreet L.P. has voting control and investment discretion over these shares.
- (10) Includes 6,452 shares that may be acquired upon the exercise of currently exercisable warrants.
- (11) Includes 25,806 shares that may be acquired upon the exercise of currently exercisable warrants. Konrad Ackerman has voting control and investment discretion over these shares.
- (12) Includes 16,129 shares that may be acquired upon the exercise of currently exercisable warrants. Treeline Investment Partners, L.P. is managed by Treeline Management LLC. Joseph Gil and Sean Deson of Treeline Management LLC each have voting power and investment discretion of all shares held by Treeline Investment Partners, L.P.
- (13) Includes 8,065 shares that may be acquired upon the exercise of currently exercisable warrants. Gary Winston has voting control and investment discretion over these shares.
- (14) Includes 8,065 shares that may be acquired upon the exercise of currently exercisable warrants. Gary Winston has voting control and investment discretion over these shares.
- (15) Includes 8,065 shares that may be acquired upon the exercise of currently exercisable warrants.
- (16) Includes 16,129 shares that may be acquired upon the exercise of currently exercisable warrants. Louis Ottimo has voting control and investment discretion over these shares.
- (17) Includes 19,355 shares that may be acquired upon the exercise of currently exercisable warrants. MicroCapital LLC is the general partner and investment advisor to MicroCapital Fund LP and MicroCapital Fund Ltd. Ian P. Ellis is the principal owner of MicroCapital LLC and has sole responsibility for the selection, acquisition and disposition of the portfolio securities by MicroCapital LLC on behalf of its funds.
- (18) Includes 32,258 shares that may be acquired upon the exercise of currently exercisable warrants. MicroCapital LLC is the general partner and investment advisor to MicroCapital Fund LP and MicroCapital

28

Fund Ltd. Ian P. Ellis is the principal owner of MicroCapital LLC and has sole responsibility for the selection, acquisition and disposition of the portfolio securities by MicroCapital LLC on behalf of its funds.

- (19) Includes 48,387 shares that may be acquired upon the exercise of currently exercisable warrants. Omicron Capital, L.P., a Delaware limited partnership ("Omicron Capital"), serves as investment manager to Omicron Master Trust, a trust formed under the laws of Bermuda ("Omicron"). Omicron Capital, Inc., a Delaware corporation ("OCI"), serves as general partner of Omicron Capital, and Winchester Global Trust Company Limited ("Winchester") serves as the trustee of Omicron. By reason of such relationships, Omicron Capital and OCI may be deemed to share dispositive power over the shares of

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

our common stock owned by Omicron, and Winchester may be deemed to share voting and dispositive power over the shares of our common stock owned by Omicron. Omicron Capital, OCI and Winchester disclaim beneficial ownership of such shares of our common stock. Omicron Capital has delegated authority from the board of directors of Winchester regarding the portfolio management decisions with respect to the shares of common stock owned by Omicron and, as of April 21, 2003, Mr. Olivier H. Morali and Mr. Bruce T. Bernstein, officers of OCI, have delegated authority from the board of directors of OCI regarding the portfolio management decisions of Omicron Capital with respect to the shares of common stock owned by Omicron. By reason of such delegated authority, Messrs. Morali and Bernstein may be deemed to share dispositive power over the shares of our common stock owned by Omicron. Messrs. Morali and Bernstein disclaim beneficial ownership of such shares of our common stock and neither of such persons has any legal right to maintain such delegated authority. No other person has sole or shared voting or dispositive power with respect to the shares of our common stock being offered by Omicron, as those terms are used for purposes under Regulation 13D-G of the Securities Exchange Act. Omicron and Winchester are not "affiliates" of one another, as that term is used for purposes of the Securities Exchange Act, or of any other person named in this prospectus as a selling stockholder. No person or "group" (as that term is used in Section 13(d) of the Securities Exchange Act, or Regulation 13D-G promulgated thereto) controls Omicron and Winchester.

- (20) Includes 16,781 shares that may be acquired upon the exercise of currently exercisable warrants. Patrick R. Walker, Reid S. Walker and G. Stacy Smith have voting power and investment control over these shares.
- (21) Includes 13,717 shares that may be acquired upon the exercise of currently exercisable warrants. Patrick R. Wilkes, Reid S. Walker and G. Stacy Smith have voting power and investment control over these shares.
- (22) Includes 17,889 shares that may be acquired upon the exercise of currently exercisable warrants. Patrick R. Wilkes, Reid S. Walker and G. Stacy Smith have voting power and investment control over these shares.
- (23) Includes 12,200 shares that may be acquired upon the exercise of currently exercisable warrants. W. Forrest Tempel has voting power and investment control over these shares.
- (24) Includes 17,800 shares that may be acquired upon the exercise of currently exercisable warrants. Ritchie Capital Management, LLC has voting power and investment control over these shares.
- (25) Includes 9,460 shares that may be acquired upon the exercise of currently exercisable warrants. Sanford Prater and David May have voting power and investment control over these shares.
- (26) Includes 460 shares that may be acquired upon the exercise of currently exercisable warrants. Sanford Prater and David May have voting power and investment control over these shares.
- (27) Includes 2,460 shares that may be acquired upon the exercise of currently exercisable warrants. Sanford Prater and David May have voting power and investment control over these shares.
- (28) Includes 2,960 shares that may be acquired upon the exercise of

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

currently exercisable warrants. Sanford Prater and David May have voting power and investment control over these shares.

- (29) Includes 2,860 shares that may be acquired upon the exercise of currently exercisable warrants. Sanford Prater and David May have voting power and investment control over these shares.
- (30) Includes 7,600 shares that may be acquired upon the exercise of currently exercisable warrants. Sanford

29

Prater and David May have voting power and investment control over these shares.

- (31) Includes 3,226 shares that may be acquired upon the exercise of currently exercisable warrants.
- (32) Includes 25,806 shares that may be acquired upon the exercise of currently exercisable warrants. Paul Keisler has voting power and investment control over these shares.
- (33) Includes 20,000 shares that may be acquired upon the exercise of currently exercisable warrants.
- (34) Includes 1,640 shares that may be acquired upon the exercise of currently exercisable warrants. James S. Chanos and Jeffrey R. Perry, as directors of Kynikos Opportunity Fund L.P., have voting power and investment control over these shares.
- (35) Includes 8,360 shares that may be acquired upon the exercise of currently exercisable warrants. James S. Chanos and Jeffrey R. Perry, as directors of Kynikos Opportunity Fund II, L.P., have voting power and investment control over the shares.
- (36) Includes 5,000 shares that may be acquired upon the exercise of currently exercisable warrants. James S. Chanos and Jeffrey R. Perry, as directors of Kynikos Opportunity Fund International/Limited, have voting power and investment control over these shares.
- (37) Includes 8,000 shares that may be acquired upon the exercise of currently exercisable warrants. Jeffrey Mann and Zachary Prenskey have voting power and investment control over these shares.
- (38) Includes 2,000 shares that may be acquired upon the exercise of currently exercisable warrants.
- (39) Includes 10,000 shares that may be acquired upon the exercise of currently exercisable warrants.
- (40) Includes 9,677 shares that may be acquired upon the exercise of currently exercisable warrants. Steven Slawson and Walter Schenker have voting power and investment control over these shares.
- (41) Includes 9,677 shares that may be acquired upon the exercise of currently exercisable warrants. Edwin Mecabe and Tai May Lee, jointly, have voting power and investment control over these shares.
- (42) Includes 3,226 shares that may be acquired upon the exercise of currently exercisable warrants. Robert H. Alpert has voting power and investment control over these shares.

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- (43) Includes 2,600 shares that may be acquired upon the exercise of currently exercisable warrants. V. Kent Green, as general partner of The Leisure Fund, L.P., has voting power and investment control over these shares.
- (44) Reflects 351,055 shares that may be acquired upon the exercise of currently exercisable warrants. Roth Capital Partners LLC is a broker-dealer and received the warrants as compensation for services rendered as placement agent in the May 2004 private placement in the ordinary course of business. At the time the warrants were issued, Roth Capital Partners LLC had no agreements or understanding, directly or indirectly, with any person to distribute the securities.
- (45) These shares are held in the nominee name of Southlake & Co. Includes 342,988 shares of common stock issuable upon currently exercisable warrants, and 230,071 shares of common stock issuable upon the conversion of currently convertible shares of Series B preferred stock.
- (46) Information based, in part, on Form 4s filed with the SEC on May 10, 2004 by B III-A Capital Partners, L.P., GP III-A, LLC, Judy K. Mencher and David J. Breazzano and Schedule 13 D/A, Amendment No. 4 filed with the SEC on May 11, 2004 by DDJ Capital Management, LLC, B III-A Capital Partners, L.P. and GP III-A, LLC. DDJ Capital Management, LLC is an investment manager for GMAM Investment Funds Trust II-Promark Alternative High Yield Bond Fund. GP III-A is the general partner of, and DDJ Capital Management LLC is the investment manager for, B III-A Capital Partners. DDJ Capital Management, LLC

30

is the investment advisor to the DDJ Canadian High Yield Fund. David J. Breazzano and Judy K. Mencher may be deemed to have voting control over these securities by virtue of their membership interests in DDJ Capital Management, LLC.

- (47) Includes 242,988 shares issuable upon the exercise of currently outstanding warrants.
- (48) Includes 171,497 shares of common stock issuable upon currently exercisable warrants, and 115,036 shares of common stock issuable upon the conversion of currently convertible shares of Series B preferred stock.
- (49) Includes 121,497 shares issuable upon the exercise of currently outstanding warrants.
- (50) These shares are held in the record name of Hare & Co. Includes 514,484 shares of common stock issuable upon currently exercisable warrants, and 345,106 shares of common stock issuable upon the conversion of currently convertible shares of Series B preferred stock.
- (51) Includes 364,484 shares issuable upon the exercise of currently outstanding warrants.
- (52) Includes 280,808 shares of common stock issuable upon currently exercisable warrants, and 189,578 shares of common stock issuable upon the conversion of currently convertible shares of Series B preferred stock.

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- (53) Information based, in part, upon Amendment No. 2 to Schedule 13G filed with the SEC on February 13, 2004 by Austin W. Marxe and David M. Greenhouse, indicating beneficial ownership as of December 31, 2003. MGP Advisors Limited ("MGP") is the general partner of Special Situations Fund III, L.P. AWM Investment Company, Inc. ("AWM") is the general partner of MGP and the general partner of and investment adviser to the Special Situations Cayman Fund, L.P. SST Advisers, L.L.C. ("SSTA") is the general partner of and investment adviser to the Special Situations Technology Fund, L.P. and the Special Situations Technology Fund II, L.P. MG Advisers, L.L.C. ("MG") is the general partner of and investment adviser to the Special Situations Private Equity Fund, L.P. Austin W. Marxe and David M. Greenhouse are the principal owners of MGP, AWM, SSTA and MG and are principally responsible for the selection, acquisition and disposition of the portfolio securities by each investment adviser on behalf of its fund.
- (54) Includes 198,308 shares issuable upon the exercise of currently outstanding warrants.
- (55) Includes 170,522 shares of common stock issuable upon currently exercisable warrants, and 114,575 shares of common stock issuable upon the conversion of currently convertible shares of Series B preferred stock.
- (56) Includes 120,522 shares issuable upon the exercise of currently outstanding warrants.
- (57) Includes 21,201 shares of common stock issuable upon currently exercisable warrants, and 15,185 shares of common stock issuable upon the conversion of currently convertible shares of Series B preferred stock.
- (58) Includes 15,365 shares issuable upon the exercise of currently outstanding warrants.
- (59) Includes 109,936 shares of common stock issuable upon currently exercisable warrants, and 263,722 shares of common stock issuable upon the conversion of currently convertible shares of Series B preferred stock.
- (60) Includes 80,187 shares issuable upon the exercise of currently outstanding warrants.
- (61) Includes 93,282 shares of common stock issuable upon currently exercisable warrants, and 63,500 shares of common stock issuable upon the conversion of currently convertible shares of Series B preferred stock.
- (62) Includes 65,782 shares issuable upon the exercise of currently outstanding warrants.

PLAN OF DISTRIBUTION

The selling securityholders and any of their pledgees, donees, transferees, assignees and other successors-in-interest may, from time to time, sell any or all of the shares of common stock offered under this prospectus on

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

any stock exchange, market or trading facility on which the shares are traded or in private transactions. These sales may be at fixed or negotiated prices. The selling securityholders may use any one or more of the following methods when selling shares:

- ordinary brokerage transactions and transactions in which the broker-dealer solicits investors;
- 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;
- to cover short sales made after the date that the registration statement of which this prospectus is a part is declared effective by the SEC;
- through the writing or settlement of options or other hedging transactions, whether through an options exchange or otherwise;
- broker-dealers may agree with the selling securityholders 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 by applicable law.

The selling securityholders may also sell any of the shares offered under this prospectus that qualify for sale under Rule 144 under the Securities Act, rather than under this prospectus.

Broker-dealers engaged by the selling securityholders may arrange for other brokers-dealers to participate in sales. Broker-dealers may receive commissions or discounts from the selling securityholders (or, if any broker-dealer acts as agent for the purchaser of shares, from the purchaser) in amounts to be negotiated. The selling securityholders do not expect these commissions and discounts to exceed what is customary in the types of transactions involved.

The selling securityholders may from time to time pledge or grant a security interest in some or all of the shares owned by them and, if they default in the performance of their secured obligations, the pledgees or secured parties may offer and sell shares of common stock from time to time under this prospectus, or under a supplement or an amendment to this prospectus under Rule 424(b)(3) or other applicable provision of the Securities Act supplementing or amending the list of selling securityholders to include the pledgee, transferee or other successors in interest as selling securityholders under this prospectus.

In connection with the sale of our shares, the selling securityholders may enter into hedging transactions with broker-dealers or other financial institutions, which may in turn engage in short sales of the shares in the course of hedging the positions they assume. The selling securityholders may also sell shares of our common stock short and deliver these securities to close out their short positions, or loan or pledge the shares to broker-dealers that

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

in turn may sell these securities. The selling securityholders may also enter into option or other transactions with broker-dealers or other financial institutions or the creation of one or more derivative securities which require the delivery to such broker-dealer or other financial institution of shares offered by this prospectus, which shares such broker-dealer or other financial institution may resell pursuant to this prospectus (as supplemented or amended to reflect such transaction).

Upon being notified in writing by a selling securityholders that any material arrangement has been entered into with a broker-dealer for the sale of shares through a block trade, special offering, exchange distribution or

32

secondary distribution or a purchase by a broker or dealer, we will file a supplement to this prospectus, if required, pursuant to Rule 424(b) under the Securities Act, disclosing:

- the name of each such selling securityholders and of the participating broker-dealer(s);
- the number of shares involved;
- the price at which such the shares were sold;
- the commissions paid or discounts or concessions allowed to such broker-dealer where applicable;
- that such broker-dealer did not conduct any investigation to verify the information set out or incorporated by reference in this prospectus; and
- other facts material to the transaction.

In addition, upon being notified in writing by a selling securityholders that a donee, pledges, transfers and other successor interests intends to sell more than 500 shares of common stock, we will file a supplement to this prospectus, if then required in accordance with applicable securities law. Any prospectus supplement may also add, update or change any information contained in this prospectus, including information with the respect to the distribution of the shares.

The selling securityholders also may transfer the shares of common stock in other circumstances, in which case the transferees, pledgees or other successors in interest will be the selling beneficial owners for purposes of this prospectus.

The selling securityholders and any broker-dealers or agents that are involved in selling the shares may be deemed to be "underwriters" within the meaning of the Securities Act in connection with such sales. In such event, any commissions received by such broker-dealers or agents and any profit on the resale of the shares purchased by them may be deemed to be underwriting commissions or discounts under the Securities Act. Discounts, concessions, commissions and similar selling expenses, if any, that can be attributed to the sale of securities will be paid by the selling securityholders and/or the purchasers. Each selling securityholders has represented and warranted to us that it acquired the securities subject to this registration statement in the ordinary course of such selling securityholders business and, at the time of its purchase of such securities such selling securityholders had no agreements or understandings, directly or indirectly, with any person to distribute any such securities.

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

We have advised each selling securityholder that it may not use shares registered on the registration statement of which this prospectus is a part to cover short sales of common stock made prior to the date on which the registration statement of which this prospectus is a part shall have been declared effective by the SEC. The selling securityholders will be responsible to comply with the applicable provisions of the Securities Act and Exchange Act, and the rules and regulations thereunder promulgated, including, without limitation, the anti-manipulation provisions of Regulation M, as applicable to such selling securityholders in connection with resales of their respective shares under this prospectus, which provisions may restrict activities of the selling securityholders and limit the timing of purchases and sales of shares by the selling securityholders.

If the selling securityholders use this prospectus for any sale of shares, they will be subject to the prospectus delivery requirements of the Securities Act. We do not intend, and we assume no obligation, to deliver any copies of this prospectus.

The shares will be sold only through registered or licensed brokers or dealers if required by applicable state securities laws. In addition, in some states the shares may not be sold unless they have been registered or qualified for sale in the applicable state or an exemption from the registration or qualification requirement is available and is complied with.

We have agreed to pay all expenses related to the registration of the sale of the shares offered under this prospectus by the selling securityholders. The selling securityholders will pay all commissions, discounts, concessions and other compensation and selling expenses attributable to the sale of the shares. We have agreed to

33

indemnify the selling securityholders against liabilities related to the registration of the shares, including liabilities arising under the Securities Act, or to contribute to payments the selling securityholders may be required to make in respect of these liabilities. The selling securityholders may agree to indemnify any broker-dealer or agent that participates in transactions involving sales of the shares against liabilities related to the offer and sale of the shares, including liabilities arising under the Securities Act, or to contribute to payments a broker-dealer or agent may be required to make in respect of these liabilities.

Neither we nor, to our knowledge, any selling securityholder has engaged any underwriter, broker, dealer or agent in connection with the distribution of the shares offered under this prospectus. The selling securityholders will act independently of us and each other, except as discussed in the notes to the table in "Selling Securityholders", in making decisions regarding the timing, manner and size of each sale. The selling securityholders are not obligated to, and we cannot assure you that the selling securityholders will, sell all or any of the shares offered under this prospectus.

DESCRIPTION OF CAPITAL STOCK

Our authorized capital stock consists of 25,000,000 shares of common stock, par value \$.01 per share, and 3,500,000 shares of preferred stock, par value \$.01 per share. Of our preferred stock, 1,000,000 shares are designated as Series B preferred stock, 500,000 shares are designated as Series C preferred stock, and the remaining 2,000,000 shares are undesignated.

The following summary of the material terms of our capital stock is not intended to be complete but is qualified in its entirety by reference to our second restated certificate of incorporation, our amended and restated by-laws

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

and our amended and restated rights agreement, each as in effect as of the date of this prospectus and the provisions of Delaware law. Our second restated certificate, by-laws and rights agreement are exhibits to the registration statement of which the prospectus is a part.

COMMON STOCK

The holders of our common stock are entitled to one vote per share on all matters to be voted upon by the stockholders, other than matters to be voted on solely by holders of any outstanding shares of preferred stock, voting separately. The holders of common stock are not entitled to cumulative voting rights in the election of directors. Accordingly, the holders of a majority of the shares of the common stock entitled to vote in any election of directors may elect all of the directors standing for election, other than those directors who may be elected only by holders of a series of preferred stock, voting separately. Depending upon any preferential dividend rights that may be applicable to any outstanding shares of preferred stock, the holders of common stock are entitled to receive any dividends that may be declared from time to time by our board of directors out of funds legally available therefore. Upon our liquidation, dissolution or winding up, the holders of our common stock are entitled to share ratably in all assets remaining after payment of all debts and other liabilities, depending upon the liquidation preferences of any shares of preferred stock then outstanding. The holders of our common stock have no preemptive, conversion or other subscription rights to purchase any shares of our capital stock. There are no redemption or sinking fund provisions applicable to our common stock. All outstanding shares of our common stock are fully paid and nonassessable. The rights of holders of our common stock depend upon, and might be adversely affected by, the rights of any shares of preferred stock which we have issued or may issue in the future.

PREFERRED STOCK

AUTHORIZATION. Under our second restated certificate, our board of directors has the authority, without further action by the stockholders, other than the approval of holders of Series B preferred stock described below in "-- Series B Preferred Stock - Voting Rights", to issue shares of preferred stock in one or more series and to establish the designations, powers, preferences and relative, participating, optional or special rights, and any qualifications, limitations or restrictions, including voting rights, dividend rates, conversion rights, terms of redemption and liquidation preferences applicable to the shares of each series, any or all of which may be greater than the rights of the common stock. Under this authority, our board of directors could issue shares of preferred stock with voting, conversion or other rights that could adversely affect the voting power and other rights of the holders of common stock. This ability of the board of directors to issue preferred stock could have the effect of delaying, deferring or preventing a change of control. Additionally, the issuance of preferred stock could adversely affect the market price of our common stock. Except for the issuance of the Series C preferred stock as required by our rights agreement, we have no present plans to issue any shares of preferred stock.

SERIES B PREFERRED STOCK. The terms of the Series B preferred stock are described below under "-- Series B Preferred Stock."

34

SERIES C PREFERRED STOCK. The Series C preferred stock is to be issued only in connection with our rights agreement described below under "- Rights Agreement." Each share of Series C preferred stock has the following material terms:

- cumulative quarterly dividends in preference to the holders of

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

common stock equal to the greater of \$4.00 per share or 100 times the dividend paid per share to holders of common stock;

- 100 votes per share; and
- a preference on liquidation equal to the greater of \$16.00 per share or 100 times the amount payable per share to the holders of common stock.

SERIES B PREFERRED STOCK

As of June 1, 2004, 4,500 shares of our Series B preferred stock, par value \$.01 per share, were outstanding. The shares of our Series B preferred stock are validly issued, fully paid and non-assessable. The holders of our Series B preferred stock have no preemptive or preferential right to purchase or subscribe for stock, obligations, warrants or any other of our securities of any class. The Series B preferred stock is not listed, quoted or traded on any public market.

RANKING. Our Series B preferred stock ranks senior to our common stock and to our Series C preferred stock with respect to dividend rights and rights on liquidation, dissolution and winding-up. While any shares of Series B preferred stock are outstanding, we may not issue any equity securities, or securities exchangeable for or convertible into equity securities or measured by our earnings or profit, other than our Series C preferred stock, that rank senior to or on a parity with the Series B preferred stock as to liquidation, dividend and redemption rights without the consent of the holders of at least a majority of the outstanding shares of Series B preferred stock then outstanding, voting as a single class. We may, however, without the consent of any holder of Series B preferred stock, create or increase the amount of any class of capital stock that ranks junior to the Series B preferred stock with respect to liquidation, dividend and redemption rights.

DIVIDENDS. Holders of shares of Series B preferred stock are entitled to receive, when, as and if declared by our board of directors out of our funds which are legally available for payment, cumulative dividends in cash at the annual rate of 8% of the initial liquidation preference of \$1,000 per share of Series B preferred stock. This is equivalent to \$80.00 per share annually. These dividends are cumulative and accrue from the most recent date on which the dividends have been paid or, if no dividends have been paid, from the date of the original issuance of the Series B preferred stock. In addition to the 8% cumulative dividends discussed above, holders of Series B preferred stock are entitled to receive dividends out of funds legally available for payment of dividends at the times and in the amounts as our board of directors, in its sole discretion, may determine. We will not declare or pay any dividend in cash or common stock on any shares of common stock unless at the same time we declare or pay the same dividend on Series B preferred stock on the basis of the number of shares of common stock into Series B preferred stock held is then convertible.

So long as at least 1,000 shares of Series B preferred stock are outstanding and cumulative dividends on the Series B preferred stock have not been paid in full, we will not:

- pay or declare any dividend or make any distribution on any of our common stock or any other class of our capital stock ranking junior to or on a parity with the Series B preferred stock as to dividend, liquidation or redemption rights; or
- purchase, redeem or acquire, or pay, set aside or make available for a sinking fund any monies to purchase, redeem or acquire, any shares of our common stock or other class of our capital stock ranking junior to or on a parity with Series B preferred stock as to

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

dividend, liquidation or redemption rights.

MANDATORY REDEMPTION. On December 9, 2004, depending upon the legal availability of funds, we will be required to redeem all of the outstanding shares of Series B preferred stock at a redemption price, payable in cash,

35

equal to the initial liquidation preference plus accumulated and unpaid dividends, if any, to the date of redemption. We will not be required to make sinking fund payments with respect to the Series B preferred stock.

REDEMPTION UPON EXTRAORDINARY TRANSACTIONS. The holders of not less than a majority of the outstanding shares of Series B preferred stock may elect to either have their shares of Series B preferred stock redeemed in connection with, or to participate in, any significant transactions, such as certain mergers and consolidations, sales of substantially all of our assets, or other significant stock purchases or repurchases.

Unless the holders of Series B preferred stock have elected to convert their shares of Series B preferred stock into common stock, then as a condition to any extraordinary transaction we must either:

- redeem all outstanding shares of Series B preferred stock at a redemption price equal to the initial liquidation preference plus accumulated and unpaid dividends, if any, payable in cash or, at the election of the holders of the Series B preferred stock, payable in the same form of consideration as is paid to the holders of common stock in the extraordinary transaction, if the holders of Series B preferred stock elect to have their shares redeemed; or
- take those actions as are sufficient to facilitate the participation of the holders of the Series B preferred stock in the extraordinary transaction permitting them to receive, as a preferential amount, the amount they would have received upon redemption either in cash, or at the election of the holders of Series B preferred stock, in the same form of consideration as is paid to the holders of common stock in the extraordinary transaction, if the holders of Series B preferred stock elect to participate in the extraordinary transaction.

Upon any redemption due to an extraordinary transaction, if the holders of the Series B preferred stock, by converting their shares into common stock before the extraordinary transaction, would receive an amount greater than the redemption price payable to them if they do not convert their shares into common stock, then they will be entitled, upon an election by holders of a majority of the outstanding shares of the Series B preferred stock, to receive the greater amount in the extraordinary transaction. We are not permitted to participate in any extraordinary transaction or to make or agree to make any payments to holders of common stock or any other shares of our capital stock ranking junior to our Series B preferred stock unless the holders of the Series B preferred stock have received the full preferential amount to which they are entitled in the extraordinary transaction.

OPTIONAL REDEMPTION. If the market price of our common stock equals or exceeds 200% of the conversion price of the Series B preferred stock then in effect for at least 20 trading days within any 30 consecutive trading day period, we will have the right to redeem the outstanding shares of Series B preferred stock. If we redeem the Series B preferred stock, the redemption price will be equal to the initial liquidation preference, plus accumulated and unpaid dividends, if any, to the redemption date. We will give at least 30 days written notice to the holders of Series B preferred stock before we redeem the Series B

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

preferred stock, and the notice must be given within 30 days after the 30 consecutive trading day period referred to above. We may exercise this right to redeem the Series B preferred stock only if in the time between our giving of the notice of redemption and the date on which redemption is to occur a registration statement is in effect covering the sale by the holders of Series B preferred stock of all shares of common stock issuable upon conversion of the Series B preferred stock.

OTHER REDEMPTION PROVISIONS. If, on any date we are obligated to redeem the Series B preferred stock, we are prohibited under Delaware law from redeeming all outstanding shares of the Series B preferred stock, then we will redeem as many shares as we are permitted under Delaware law on a pro rata basis among the holders of the Series B preferred stock, and we will take any necessary or appropriate action to remove any impediments on our ability to redeem the remaining shares. If we are still unable to redeem all shares of Series B preferred stock, then the dividend rate on the unredeemed shares will increase to an annual rate of 10%, and will increase by an additional 0.5% annual rate at the end of each six month period, up to a maximum annual rate of 15%, until all outstanding shares of Series B preferred stock have been redeemed and the redemption price has been paid in full.

LIQUIDATION PREFERENCE. Upon our voluntary or involuntary liquidation, dissolution or winding-up, each holder of Series B preferred stock is entitled to be paid, out of our assets available for distribution to stockholders, an amount equal to the initial liquidation preference of \$1,000 per share of Series B preferred stock held by the holder, plus accumulated and unpaid dividends to the date fixed for liquidation, dissolution or winding up, before any

36

distribution is made on our common stock or any other class of our capital stock that is junior to the Series B preferred stock as to liquidation rights. If, upon our voluntary or involuntary liquidation, dissolution or winding-up, there are not sufficient assets to pay all amounts payable with respect to the Series B preferred stock, then the holders of the Series B preferred stock will share ratably in any distribution of our assets in proportion to the respective preferential amount to which they are entitled. In addition, if, upon our voluntary or involuntary liquidation, dissolution or winding-up, the holders of Series B preferred stock would have received more than the liquidation preference referred to above if they had converted their shares into common stock immediately before the liquidation, dissolution or winding up, then the holders of Series B preferred stock will receive the greater amount.

VOTING RIGHTS. The holders of Series B preferred stock have no voting rights, except as required under Delaware law or as provided in the provisions of Article Fourth of our second restated certificate governing the Series B preferred stock.

As long as at least 2,000 shares of Series B preferred stock are outstanding, then the holders of the outstanding shares of Series B preferred stock, voting together as a separate class, are entitled to elect one member of our board of directors. Since March 13, 2000, the holders of Series B preferred stock have elected Kevin P. Collins as their designated director.

If we fail to redeem all of the Series B preferred stock when we are required to do so by the terms of the Series B preferred stock, then the holders of the outstanding shares of Series B preferred stock, voting together as a separate class, will be entitled to elect to serve on our board of directors that number of directors constituting a majority of the members of our board of directors, and the number of members of our board of directors will be automatically increased by that number. These special voting rights of the Series B preferred stock will continue until we have paid the redemption price

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

of all outstanding shares of Series B preferred stock in full, including any interest due as a result of our failure to pay the redemption price, at which time the terms of any directors elected by the holders of Series B preferred stock under these special voting rights will terminate and the number of members of our board of directors will be immediately decreased by that number.

As long as at least 1,000 shares of Series B preferred stock remain outstanding, we may not, without the consent of at least a majority of the then outstanding shares of Series B preferred stock:

- merge, consolidate, recapitalize, reorganize or engage in any like transaction;
- liquidate or dissolve;
- sell or transfer all or substantially all of our consolidated properties or assets;
- dispose of assets for consideration in excess of \$1,000,000 without the approval of our board of directors; or
- borrow money, except up to \$3,000,000 under our primary credit agreement.

In addition, as long as any shares of Series B preferred stock are outstanding, we may not, without the consent of the holders of at least a majority of the then outstanding shares of Series B preferred stock:

- issue any equity security, or any securities exchangeable for or convertible into equity securities or measured by our earnings or profit, other than the Series C preferred stock, that rank senior to or parity with the Series B preferred stock as to liquidation, dividend and redemption rights;
- redeem, repurchase or otherwise acquire for value any of our equity securities other than the Series B preferred stock under its terms or up to 250,000 shares of common stock under restriction agreements with our employees, officers, directors, consultants or other persons performing services for us; or
- amend our certificate of incorporation, by-laws or other charter documents or those of any of our subsidiaries.

CONVERSION RIGHTS. Each share of Series B preferred stock is convertible, in whole or in part, at any time at the option of the holder, into that number of shares of common stock equal to the "conversion value," which is \$1,000 plus accumulated and unpaid dividends on the share, divided by the then applicable "conversion price" of the Series B preferred stock. The current conversion price of the Series B preferred stock is \$3.0571 per share of

37

common stock, subject to adjustment to prevent dilution from certain events, such as organic corporate events affecting the common stock or issuances of shares of options, warrants or rights to purchase shares at a price or conversion price, as applicable, per share of common stock less than the greater of the market price of the common stock or the conversion price of the Series B preferred stock in effect immediately before the issuance, other than certain excluded shares, options, warrants and other rights.

WARRANTS

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

As of June 1, 2004, warrants to purchase 2,978,727 shares of our common stock with exercise prices ranging from \$2.47 to \$88.96 were outstanding.

In the private placement we completed in February 2000, we issued 700,000 warrants, each warrant entitling the holder to purchase one share of common stock at a current exercise price of \$3.474 until December 9, 2004. The exercise price may be adjusted under the anti-dilution provisions of the warrants, which are substantially the same as the anti-dilution provisions of the Series B preferred stock described above in "--Series B Preferred Stock - Conversion Rights". Instead of paying the exercise price in cash, holders may exercise these warrants by delivering to us shares of common stock with a fair market value equal to the exercise price. Alternatively, holders of these warrants may make a cashless exercise of these warrants and receive, upon exercise and without making any payments of cash, common stock or any other asset, a net number of shares of common stock determined by a formula based on the amount the trading price of the common stock exceeds the exercise price then in effect.

In the May 2004 private placement, we issued warrants to purchase 702,109 shares of common stock to investors and warrants to purchase 351,055 shares of common stock to the placement agent. Each warrant is exercisable at an exercise price of \$3.41 per share until May 2009. The warrants issued to investors are exercisable on a cashless basis if no registration statement is effective at the time of exercise, which means that upon exercise the holder of the warrant will be entitled to recover a net number of shares of common stock without paying any cash, based on the market price of the common stock at the time of exercise. The warrants issued to the placement agent may be exercised on a cashless basis at any time. In May 2004, we also issued to the holders of Series B preferred stock, who converted some of their shares of Series B preferred stock into shares of common stock, warrants to purchase 1,209,133 shares at common stock exercisable at an exercise price of \$3.0571 per share until June 9, 2005. All warrants issued in May 2004 may be redeemed by us on 30 days prior written notice after May 3, 2005, at a price of \$.01 per warrant, if the average trading price of our common stock for any 30 consecutive trading day period is greater than or equal to twice the exercise price. In addition, the exercise price of all warrants issued in May 2004 is subject to adjustment to prevent dilution. This prospectus covers the shares issued upon the exercise of these warrants.

In July 1999, we issued warrants to purchase 15,000 shares of common stock at exercise prices of \$2.47 and \$4.50 per share exercisable until July 19, 2004 for consulting and advisory services rendered to us by the warrant holder.

When we acquired Metretek Florida in 1994, we issued warrants to purchase our common stock to the holders of then outstanding warrants to purchase Metretek Florida capital stock. As of June 1, 2004, warrants to purchase an aggregate of 1,430 shares of common stock were outstanding, with an expiration date of June 30, 2004 and with an exercise price of \$88.96 per share.

ANTI-TAKEOVER EFFECTS OF DELAWARE LAW AND OUR SECOND RESTATED CERTIFICATE AND BY-LAWS

Certain provisions of Delaware law, our second restated certificate and our by-laws, which are summarized below, may be deemed to have anti-takeover effects and may delay, defer or prevent another person from attempting to acquire us or engage in a change in control transaction, including those attempts that might result in a premium over the market price for the shares held by stockholders. These provisions which are summarized below, are expected to discourage coercive takeover practices and inadequate takeover bids. These provisions are also designed to encourage person seeking to acquire control of us to first negotiate with our board of directors. We believe that the benefits of increased protection of our potential ability to negotiate with an unfriendly or unsolicited acquirer outweigh the disadvantages of discouraging a proposal to acquire us because negotiation of these proposals could result in an improvement

of their terms.

BUSINESS COMBINATIONS WITH RELATED PERSON. Under our second restated certificate, "business combinations" with "related persons", which are persons who beneficially own 20% or more of our voting power, and their affiliates and associates, must be approved by the affirmative vote of the holders of not less than 80% of our outstanding voting stock, and the affirmative vote of the holders of not less than 67% of our outstanding voting stock held by stockholders other than related persons. This super-majority voting requirement does not apply to a business combination either in which the cash or the fair market value of the other consideration to be received per

38

share by stockholders in the business combination is not less than the highest per share price paid by the related person in acquiring any of its holdings of our common stock, or which has been approved in advance by two-thirds of our continuing directors.

SUPER-MAJORITY VOTING REQUIREMENTS. Under our second restated certificate, the affirmative vote of the holders of not less than 80% of our outstanding voting stock is required to approve fundamental corporate actions including mergers, consolidations, combinations, dissolutions, and sales of all or substantially all our assets, unless these actions are approved by two-thirds of our board of directors. Our second restated certificate also requires the affirmative vote of the holders of not less than 80% of our outstanding voting shares to amend or repeal any provision of our second restated certificate or our by-laws, if it is required or demanded that the stockholders vote on the amendment or repeal, unless the amendment or repeal is approved by two-thirds of our board of directors.

CLASSIFIED BOARD OF DIRECTORS. Our board of directors is divided into three classes, with the directors of each class being elected for three-year terms at the annual meeting of stockholders. In addition, under Delaware law, members of our board of directors may be removed only for cause. These provisions, when coupled with the provision of our second restated certificate authorizing the board of directors to fill vacant directorships, may delay a stockholder from removing incumbent directors and simultaneously gaining control of the board of directors by filling vacancies created by the removal with its own nominees.

LIMITS ON ABILITY OF SHAREHOLDER TO ACT BY WRITTEN CONSENT OR TO CALL SPECIAL MEETINGS. Our second restated certificate eliminates the ability of stockholders to act by written consent. Our by-laws provide that special meetings of our stockholders may be called only by our President or by our board of directors.

ADVANCE NOTICE REQUIREMENTS FOR STOCKHOLDER PROPOSALS AND DIRECTORS NOMINATIONS. Our by-laws provide that stockholders seeking to bring business before an annual meeting of stockholders, or to nominate candidates for election as directors at an annual meeting of stockholders, must provide timely notice in writing. To be timely, a stockholder's notice must be received at our principal executive offices not less than 45 days nor more than 120 days before the anniversary date on which we first mailed our proxy materials for the immediately preceding annual meeting of stockholders. If the annual meeting is called for a date that is not within 30 days before or after the anniversary date of the preceding annual meeting, notice from the stockholder must be received:

- not earlier than 180 days before to the annual meeting of stockholders; and

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- not later than the later of 75 days before the annual meeting of stockholders or the tenth day following the date on which we publicly announce the date of the annual meeting.

Our by-laws also specify the requirements of the form and content of a stockholder's notice. These provisions may preclude stockholders from bringing matters before an annual meeting of stockholders or from making nominations for directors at an annual meeting of stockholders.

AUTHORIZED BUT UNISSUED SHARES OF OUR CAPITAL STOCK. All authorized but unissued shares of our common stock and preferred stock are available for future issuance without stockholder approval, except for approvals required by stock exchange rules and, in the case of the issuance of preferred stock, the terms of the Series B preferred stock as described in "--Series B Preferred Stock - Voting Rights" above. These additional shares may be utilized for a variety of corporate purposes, including future public offerings to raise additional capital, corporate acquisitions and employee benefit plans. The existence of authorized but unissued shares of common stock and preferred stock could render more difficult or discourage an attempt to obtain control of us by means of a proxy contest, tender offer, merger or otherwise.

UNDESIGNATED PREFERRED STOCK. The ability authorize undersigned preferred stock makes it possible for our board of directors to issue preferred stock with voting or other rights or preferences that could impede the success of any attempt to acquire us. These and other provisions may have the effect of deferring hostile takeovers or delaying changes in control or management of our company.

DELAWARE ANTI-TAKEOVER LAW

As a Delaware corporation, the provisions of Section 203 of the Delaware General Corporation Law apply to us. In general, Section 203 prohibits a publicly-held Delaware corporation from engaging in a "business combination" with an "interested stockholder" for a period of three years following the date that the person became an interested stockholder, unless:

- before the transaction, the board of directors approved either the business combination or the transaction that resulted in the person becoming an interested stockholder;

39

- after the transaction that resulted in the person becoming an interested stockholder, the interested stockholder owned at least 85% of the voting stock of the corporation outstanding at the time the transaction commenced, excluding for purposes of determining the number of shares outstanding those shares owned by persons who are directors and also officers and by employee stock plans in which employee participants do not have the right to determine confidentially whether shares held under the plan will be tendered in a tender or exchange offer; or
- following the transaction in which the person became an interested stockholder, the business combination is approved by the board of directors and authorized at a meeting of the stockholders, by the affirmative vote of the holders of at least 66 2/3% of the outstanding voting stock that is not owned by the interested stockholder.

Section 203 defines a "business combination" to include:

- any merger or consolidation involving the corporation and the

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

interested stockholder;

- any sale, transfer, pledge or other disposition of 10% or more of the assets of the corporation involving the interested stockholder;
- any transaction that results in the issuance or transfer by the corporation of any stock of the corporation to the interested stockholder, with some exceptions;
- any transaction involving the corporation that has the effect of increasing the proportionate share of the stock of any class or series of the corporation beneficially owned by the interested stockholder; or
- the receipt by the interested stockholder of the benefit of any loans, advances, guarantees, pledges or other financial benefits provided by or through the corporation.

In general, Section 203 defines an "interested stockholder" as any entity or person beneficially owning 15% or more of the outstanding voting stock of a corporation and any entity or person affiliated with or controlling or controlled by that entity or person.

A Delaware corporation may "opt out" of Section 203 by including a provision in its original certificate of incorporation, or by adopting an amendment to its certificate of incorporation or by-laws resulting approved by holders of at least a majority of its outstanding voting stock, expressly electing not to be governed by Section 203. Neither our second restated certificate nor our by-laws contain any exclusion. Section 203 makes it more difficult for an "interested stockholder" to effect various business combinations with a corporation for a three-year period.

RIGHTS AGREEMENT

We have entered into a stockholder rights agreement. As with most rights agreements, the terms of our rights agreement are complex and not easily summarized, particularly as they relate to the acquisition of our common stock and to exercisability of the rights. This summary may not contain all of the information that is important to you. The following summary should be read in conjunction with, and is qualified in its entirety by reference to, our rights agreement, a copy of which has been filed with the SEC.

Under our rights agreement, each outstanding share of common stock has one right to purchase four one-hundredths of a share of Series C preferred stock attached to it. The purchase price per one one-hundredth of a share of Series C preferred stock under the stockholder rights agreement is \$15.00.

The rights under our rights agreement are attached to the outstanding certificates representing our common stock, and no separate certificates representing the rights have been distributed. The rights will separate from our common stock and be represented by separate certificates on the distribution date, which will occur on the tenth day after public announcement that any person or group has become an acquiring person, which means the beneficial owner of at least 15% of our outstanding common stock, or ten business days, or a later date as determined by the board of directors, after the date a person or group commences a tender offer for 15% or more of our outstanding common stock. After the rights separate from our common stock, certificates representing the rights will be mailed to record holders of our common stock. Once distributed, the rights certificates alone will represent the rights.

All shares of our common stock issued before the date the rights separate from the common stock will be issued with the rights attached. The rights are

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

not exercisable until the date the rights separate from the common stock. The rights will expire on November 30, 2011, unless the term of the rights agreement is extended by us or the rights are earlier redeemed or exchanged by us.

40

After a distribution date occurs, each right will entitle the holder to purchase one one-hundredths of a share of Series C preferred stock at a purchase price of \$15.00 per one one-hundredth of a share, subject to adjustment. In addition, after the distribution date, each right will entitle the holder to purchase a number of shares of our common stock having a then current market value of \$30.00 subject to adjustment. Further, after the distribution date, each right will entitle the holder to purchase a number of shares of common stock of the acquiring person having a then current market value of \$30.00, if any of the following occurs:

- we merge with or consolidate into another entity;
- an acquiring person which is an entity merges with or consolidates into us; or
- we sell more than 50% of our assets or earning power.

Under our rights agreement, any rights that are or were owned by an acquiring person will be null and void. Our rights agreement contains exceptions to the definition of "acquiring persons". No person or group who becomes a beneficial owner of 15% or more of the outstanding shares of our common stock, solely by virtue of acquiring securities issued or issuable in connection with the private placement we completed in February 2000 and in our May 2004 private placement and the May 2004 conversion of Series B preferred stock, or by exercising or converting any convertible securities included in these transactions, will be deemed to be an acquiring person. Holders of the rights will have no rights as our stockholders, including the right to vote or receive dividends, simply by virtue of holding the rights.

Our rights agreement contains exchange provisions which provide that after an acquiring person becomes a beneficial ownership owner of 15% or more, but less than 50%, of our outstanding common stock, our board of directors may, at its option, exchange all or part of the then outstanding and exercisable rights for common stock at an exchange ratio of four shares of common stock per right.

Our board of directors may, at its option, redeem all of the outstanding rights under our rights agreement before any person or group becoming an acquiring person. The redemption price under our rights agreement is \$0.01 per right. The right to exercise the rights will terminate upon the action of our board of directors ordering the redemption of the rights and the only right of the holders of the rights will be to receive the redemption price.

At any time prior to the distribution date, we may, without the approval of any holder of the rights, supplement or amend any provision of the rights agreement. After the distribution date, the rights agreement may be amended only:

- to cure ambiguities;
- to correct inconsistent provisions;
- to shorten or lengthen any time period under the rights agreement; or
- in ways that do not adversely affect the holders of the rights, other than an acquiring person or adverse person.

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

From and after the distribution date, the rights agreement may not be amended to lengthen:

- a time period relating to when the rights may be redeemed at any time when the rights are not then redeemable; or
- any other time period unless the lengthening is for the purpose of protecting, enhancing or clarifying the rights of, and/or the benefits to, the holders of the rights, other than an acquiring person or adverse person.

The prices and amounts above will be appropriately adjusted for stock splits and other changes to our capital stock.

Our rights agreement contain provisions that have anti-takeover effects. The rights may cause substantial dilution to a person or group that attempts to acquire us without conditioning the offer on the redemption or the termination of the rights. Accordingly, the existence of the rights may deter acquirers from making takeover proposals or tender offers for our common stock. However, the rights are not intended to prevent a takeover, but rather are designed to enhance the ability of our board or directors to negotiate with an acquirer on behalf of all the stockholders. In addition, the rights should not interfere with a proxy contest or with any merger or business combination approved by our board of directors.

41

TRANSFER AGENT AND REGISTRAR

The transfer agent and registrar for the common stock is ComputerShare Trust Company.

LISTING

Our common stock is traded on the OTC Bulletin Board under the trading symbol "MTEK".

LIMITATION OF LIABILITY AND INDEMNIFICATION

Section 145 of the Delaware General Corporation Law provides for broad indemnification of the directors, officers, employees and agents of a corporation. As permitted by Section 145 of the DGCL, our second restated certificate permits us to indemnify any person who was or is threatened to be made a party to any threatened, pending or completed action, suit or proceeding, whether civil, criminal, administrative or investigative, other than an action by us or in our right, by reason of the fact the person is or was our officer or director, or is or was serving at our request as a director, officer, employee or agent of another corporation, partnership, joint venture, trust or other enterprise, against expenses, including attorneys' fees, judgments, fines and amounts paid in settlement actually and reasonably incurred by the person in connection with the action, suit or proceeding, provided that the person acted in good faith and in a manner the person reasonably believed to be in or not opposed to our best interests and, with respect to any criminal action or proceeding, had no reasonable cause to believe the person's conduct was unlawful. We are also permitted to indemnify the same persons against expenses, including attorneys' fees, actually and reasonably incurred by these persons in connection with the defense or settlement of any threatened, pending or completed action or suit by us or in our right under the same conditions, except that no indemnification will be made in respect to any claim, issue or matter as to which the person has been adjudged to be liable to us unless, and only to the extent that, the adjudicating court determines that the indemnification is

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

proper under the circumstances. To the extent these persons are successful on the merits or otherwise in defense of any action, suit or proceeding, indemnification is mandatory. We may also pay the expenses incurred in any action, suit or proceeding in advance of its final disposition, upon receipt of an appropriate undertaking by the person. These rights are not exclusive of any other right which any person may have or hereafter acquire under any statute, or under any provision of our second restated certificate, our by-laws, or under any agreement, vote of stockholders or disinterested directors or otherwise. No repeal or modification of these provisions of our second restated certificate will in any way diminish or adversely affect the rights of any person to indemnification thereunder in respect of any occurrences or matters arising before any repeal or modification.

Our by-laws provide that we shall indemnify our directors, officers, employees and agents to the extent permitted by the DGCL. We have also entered into indemnification agreements with each of our directors requiring us to indemnify them against liabilities that they incur in their capacity as directors.

Our second restated certificate specifically authorizes us to maintain insurance and to grant similar indemnification rights to our employees or agents. We maintain an insurance policy indemnifying our directors and officers against liabilities, including liabilities arising under the Securities Act, which might be incurred by them in these capacities.

As permitted by Section 102(b)(7) of the DGCL, our second restated certificate also eliminates the personal liability of our directors to us and our stockholders for monetary damages for any breach of fiduciary duty as a director, except for liability:

- for any breach of a director's duty of loyalty to us or our stockholders;
- for acts or omissions not in good faith or which involve intentional misconduct or a knowing violation of law;
- under Section 174 of the DGCL, relating to unlawful payments of dividends or unlawful stock purchases or redemptions; and
- for any transaction in which a director derived an improper personal benefit.

These provisions do not limit or eliminate our rights or the rights of any stockholder to seek non-monetary relief, such as an injunction or rescission, in the event of a breach of a director's fiduciary duty. These provisions will also not alter a director's liability under federal securities laws.

42

The limitation of liability and indemnification provisions in our certificate of incorporation and bylaws may discourage stockholders from bringing a lawsuit against our directors for breach of their fiduciary duty. They may also reduce the likelihood of derivative litigation against our directors and officers, even though an action, if successful, might benefit us and other stockholders. Furthermore, a stockholder's investment may be adversely affected to the extent that we pay the costs of settlement and damage awards against directors and officers as required by these indemnification provisions. At present, there is no pending litigation or proceeding involving any of our directors, officers or employees regarding which indemnification is sought, and we are not aware of any threatened litigation that may result in claims for indemnification.

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

Insofar as indemnification for liabilities arising under the Securities Act may be permitted to directors, officers or persons controlling us pursuant to the foregoing provisions, we have been informed that in the opinion of the SEC such indemnification is against public policy as expressed in the Securities Act and is therefore unenforceable.

LEGAL MATTERS

Kegler, Brown, Hill & Ritter Co., L.P.A., Columbus, Ohio, will pass upon the validity of the common stock that may be offered by this prospectus.

EXPERTS

The consolidated financial statements and related financial statement schedule incorporated in this prospectus by reference from our Annual Report on Form 10-K for the year ended December 31, 2003 have been audited by Deloitte & Touche LLP, independent registered public accounting firm, as stated in their report, which is incorporated by reference herein, and is incorporated in reliance upon the report of such firm given upon their authority as experts in accounting and auditing.

WHERE YOU CAN FIND MORE INFORMATION

AVAILABLE INFORMATION

We have filed with the SEC a registration statement on Form S-2 under the Securities Act, relating to the shares of common stock that may be offered by this prospectus. This prospectus is a part of the registration statement, but does not include all of the information contained in the registration statement, and the extent to the registration statement. The registration statement, including the exhibits filed with it, can be obtained from the SEC or from us as indicated below.

We also file reports, proxy statements and other information with the SEC. You may read and copy any information we file with the SEC at the SEC's Public Reference Room at 450 Fifth Street, N.W., Washington, D.C. 20549. You may obtain information on the operation of the SEC's Public Reference Rooms by calling the SEC at 1-800-SEC-0330. The SEC maintains an internet site that contains reports, proxy statements and other information filed electronically with the SEC, and our SEC filings are available on the SEC's website at <http://www.sec.gov>.

INCORPORATION BY REFERENCE

The SEC allows us to "incorporate by reference" in this prospectus certain of the information we file with the SEC. This means we can disclose important information to you by referring you to another document we filed with the SEC that contains the information. The information incorporated by reference is considered to be part of this prospectus, and documents that we file later with the SEC will automatically update and supersede previously filed information.

We incorporate by reference in this prospectus the documents listed below, which we have previously filed with the SEC:

- our Annual Report on Form 10-K for the fiscal year ended December 31, 2003, a copy of which is being delivered with this prospectus;

43

- our Quarterly Report on Form 10-Q for the quarter ended March 31, 2004, a copy of which is being delivered with this prospectus;
- our definitive Proxy Statement dated as of May 11, 2004;

Edgar Filing: METRETEK TECHNOLOGIES INC - Form 424B3

- our Current Reports on Form 8-K filed with the SEC on January 22, 2004, February 5, 2004, March 30, 2004 (other than information furnished under Item (12)), April 30, 2004, May 6, 2004, May 17, 2004 (other than information furnished under Item (12)), and June 14, 2004;
- the description of our common stock, including the description of our preferred share purchase rights, contained in our registration statement on Form 8-A filed with the SEC on January 10, 1993, which was amended in Form 8-A/A Amendment No. 5 filed with the SEC on November 30, 2001 and Form 8-A/A Amendment No. 6 filed with the SEC on May 21, 2004, including any amendments or reports filed with the SEC for the purpose of updating such descriptions.

Any statements made in this prospectus or in a document incorporated or deemed to be incorporated by reference in this prospectus will be deemed to be modified or superseded for purposes of this prospectus to the extent that a statement contained in this prospectus or in any other subsequently filed document which is also incorporated or deemed to be incorporated by reference in this prospectus modifies or supersedes the statement. Any statement so modified or superseded will no be deemed, except as so modified or superseded, to constitute a part of this prospectus.

The information relating to us contained in this prospectus should be read together with the information in the documents incorporated or deemed to be incorporated by reference.

We will provide to each person, including any beneficial owner, to whom a prospectus is delivered, a copy of these filings, at no cost. You may request a copy of these filings by writing or telephoning us at the following address:

Metrotek Technologies, Inc.
303 East Seventeenth Avenue
Suite 660
Denver, Colorado 80203
Attention: Corporate Secretary
Telephone: (303) 785-8080

This prospectus is accompanied by our Annual Report on Form 10-K for the fiscal year ended December 31, 2003 and our Quarterly Report on Form 10-Q for the quarter ended March 31, 2004.

YOU SHOULD RELY ONLY ON THE INFORMATION CONTAINED IN THIS PROSPECTUS. NEITHER WE NOR THE SELLING SECURITYHOLDERS HAVE AUTHORIZED ANYONE TO PROVIDE YOU WITH ANY INFORMATION DIFFERENT FROM THAT CONTAINED IN THIS PROSPECTUS. NEITHER WE NOR THE SELLING SECURITYHOLDERS ARE MAKING AN OFFER TO SELL OR SEEKING AN OFFER TO BUY THESE SHARES IN ANY STATE WHERE THE OFFER OR SALE IS NOT PERMITTED. THE INFORMATION IN THIS PROSPECTUS IS ACCURATE AS OF THE DATE ON THE FRONT OF THIS PROSPECTUS REGARDLESS OF THE TIME OF DELIVERY OF THIS PROSPECTUS OR ANY SALE OF THE STOCK.