

HARRIS & HARRIS GROUP INC /NY/  
Form 10-K  
March 15, 2013

**UNITED STATES**

**SECURITIES AND EXCHANGE COMMISSION**

**WASHINGTON, DC 20549**

**Form 10-K**

**x Annual Report Pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934**

For the fiscal year ended December 31, 2012

or

**..TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the transition period from \_\_\_\_\_ to \_\_\_\_\_

Commission File No. 0-11576

HARRIS & HARRIS GROUP, INC.®  
(Exact Name of Registrant as Specified in Its Charter)

New York 13-3119827  
(State or Other Jurisdiction (I.R.S. Employer  
of Incorporation or Organization) Identification No.)

1450 Broadway, 24th Floor, New York, New York 10018  
(Address of Principal Executive Offices) (Zip Code)

Registrant's telephone number, including area code (212) 582-0900

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

| Title of Each Class           | Name of Each Exchange on Which Registered |
|-------------------------------|---|
| Common Stock, \$.01 par value | Nasdaq Global Market                      |

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

None  
(Title of Class)

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act.

Yes  No

Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Act.

Yes  No

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days.

Yes  No

Indicate by check mark whether the registrant has submitted electronically and posted on its corporate website, if any, every Interactive Data file required to be submitted and posted pursuant to Rule 405 of Regulation S-T during the preceding 12 months (or for such shorter period that the registrant was required to submit and post such files).

Yes  No

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

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

..

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

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

(Do not check if a smaller reporting company)

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Act).

Yes  No

The aggregate market value of the common stock held by non-affiliates of Registrant as of June 30, 2012 was \$116,285,476 based on the last sale price as quoted by the Nasdaq Global Market on such date (only officers and directors are considered affiliates for this calculation).

As of March 14, 2013, the registrant had 31,116,881 shares of common stock, par value \$.01 per share, outstanding.

DOCUMENTS INCORPORATED BY REFERENCE INCORPORATED AT

|   |                                       |
|---|---------------------------------------|
| Harris & Harris Group, Inc. Proxy Statement for the 2013 Annual Meeting of Shareholders | Part III, Items 10, 11, 12, 13 and 14 |
|---|---------------------------------------|

**TABLE OF CONTENTS**

|  | Page |
|--|------|
| <b>PART I</b>  |      |
| Item 1. Business   | 1    |
| Item 1A. Risk Factors  | 15   |
| Item 1B. Unresolved Staff Comments   | 34   |
| Item 2. Properties   | 34   |
| Item 3. Legal Proceedings  | 35   |
| Item 4. Mine Safety Disclosures  | 35   |
| <b>PART II</b>   |      |
| Item 5. Market For Registrant's Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities | 36   |
| Item 6. Selected Financial Data  | 39   |
| Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations                        | 40   |
| Item 7A. Quantitative and Qualitative Disclosures About Market Risk  | 91   |
| Item 8. Consolidated Financial Statements and Supplementary Data   | 94   |
| Item 9. Changes in and Disagreements With Accountants on Accounting and Financial Disclosure                         | 163  |
| Item 9A. Controls and Procedures   | 163  |
| Item 9B. Other Information   | 163  |
| <b>PART III</b>  |      |
| Item 10. Directors, Executive Officers and Corporate Governance  | 164  |
| Item 11. Executive Compensation  | 164  |
| Item 12. Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters              | 164  |
| Item 13. Certain Relationships and Related Transactions, and Director Independence                                   | 164  |
| Item 14. Principal Accountant Fees and Services  | 165  |
| <b>PART IV</b>   |      |
| Item 15. Exhibits and Financial Statements Schedules   | 166  |
| Signatures   | 169  |
| Exhibit  | 171  |
| Index  | 171  |

## **PART I**

### **Item 1. Business.**

Harris & Harris Group, Inc.<sup>®</sup> (the "Company," "us," "our," and "we"), is an internally managed venture capital company specializing in science-enabled technologies, particularly nanotechnology and microsystems. We have elected to be regulated as a business development company ("BDC") under the Investment Company Act of 1940, (the "1940 Act"). For tax purposes, we have elected to be treated as a regulated investment company ("RIC") under Subchapter M of the Internal Revenue Code of 1986. We were incorporated under the laws of the state of New York in August 1981. Our primary investment objective is to achieve long-term capital appreciation by making venture capital investments. Generation of current income is a secondary objective. We define venture capital investments as the money and resources made available to privately held and publicly traded small businesses that we believe have exceptional growth potential. Our investment approach is comprised of a patient examination of available opportunities, thorough due diligence and close involvement with management of our portfolio companies. As a venture capital company, we invest in and provide managerial assistance to our portfolio companies, many of which, in our opinion, have significant potential for growth. We are overseen by our Board of Directors and managed by our officers and have no external investment advisor.

We generally make venture capital investments in science-enabled companies, particularly those that are commercializing or integrating products enabled by nanotechnology or microsystems. This investment focus is not a fundamental policy and accordingly may be changed without shareholder approval, although we intend to give shareholders at least 60 days' prior notice of any change in our nanotechnology focus.

Nanotechnology is measured in nanometers, which are units of measurement in billionths of a meter. Microsystems are measured in micrometers, which are units of measurement in millionths of a meter. We sometimes use "tiny technology" to describe both of these disciplines. Nanotechnology and microsystems are multidisciplinary and widely applicable, and they incorporate technology that was not previously in widespread use. Products enabled by nanotechnology and microsystems are applicable to a large number of industries including pharmaceuticals, diagnostics, medical devices, telecommunications, electronics and semiconductors, as well as industries that seek to address global problems related to resource constraints.

We consider a company to fit our current investment thesis if the company employs or integrates or intends to employ or integrate technology that we consider to be at the microscale or smaller and if the employment of that technology is material to its business plan. Because it is in many respects a new field, tiny technology has significant scientific, engineering and commercialization risks. While we believe nanotechnology and microsystems are important foundations of our portfolio companies, these companies build businesses that must address needs in traditional industries. As such, we may highlight how our portfolio companies are addressing these needs without a specific discussion about the contribution of nanotechnology or microsystems to these efforts.



We believe companies that leverage scientific innovations, particularly those at the nanoscale, are emerging as leaders in their respective industry sectors. These industry sectors include life sciences, energy and electronics. The knowledge of core domains within each of these industry sectors can be augmented by exposure to the adjacent or even entirely "*white-field*" multi-disciplinary technology domains including: nanoscale materials, novel analytical instrumentation and manufacturing tools, ultrafast computational and modeling capabilities, high-function mobile devices, high-speed wireless data transfer and high-density, long-lasting and renewable sources of energy. Our investment team has the ability to identify and invest in such domains.

As of December 31, 2012, our venture capital portfolio comprised 81.8 percent of our total assets, our cash and U.S. Treasury holdings comprised 17.0 percent of our total assets, and other assets comprised the remaining 1.2 percent of our total assets. As of December 31, 2012, we had no debt outstanding.

Neither our investments, nor an investment in us, is intended to constitute a balanced investment program. We expect to be risk seeking rather than risk averse in our investment approach. To such end, we reserve the fullest possible freedom of action, subject to our certificate of incorporation, applicable law and regulations, and policy statements contained herein. There is no assurance that our investment objectives will be achieved.

We expect to invest a substantial portion of our assets in securities that we consider to be private venture capital equity investments. These private venture capital equity investments usually do not pay interest or dividends and typically are subject to legal or contractual restrictions on resale that may adversely affect the liquidity and marketability of such securities. Some of our convertible bridge notes may result in payment-in-kind ("PIK") interest. We do not limit our investments to any particular industries or categories of investments enabled by nanotechnology and microsystems. Our securities investments may consist of private, public or governmental issuers of any type, subject to the restrictions imposed on us as a BDC under the 1940 Act. Subject to the diversification requirements applicable to a RIC, we may commit all of our assets to only a few investments.

We currently invest our capital directly into portfolio companies. We may in the future seek to invest our capital alongside capital of other investors through investment funds that we control. Such funds would enable us to generate income from management fees and the potential to participate economically in the returns on the funds invested above and beyond the returns generated from investment of our capital. These funds would also enable us to increase the amount of capital invested per portfolio company.

Achievement of our investment objective is dependent upon the judgment of a team of four professional, full-time members of management, all of whom are designated as Managing Directors: Douglas W. Jamison, Daniel B. Wolfe, Alexei A. Andreev and Misti Ushio. This team collectively has expertise in venture capital investing, intellectual property and science and technology, particularly nanotechnology. There can be no assurance that a suitable replacement could be found for any of our officers upon their retirement, resignation, inability to act on our behalf, or death.





Subject to continuing to meet the compliance tests applicable to BDCs under the 1940 Act, there are no limitations on the types of securities or other assets in which we may invest. Investments may include the following:

- Venture capital investments, whether in corporate, partnership or other form, including small businesses;
  
- Equity, equity-related securities (including warrants and options) and debt with equity features from either private or public issuers;
  
- Debt obligations of all types having varying terms with respect to security or credit support, subordination, purchase price, interest payments and maturity;
  
- Foreign securities;
  
- Intellectual property or patents or research and development in technology or product development that may lead to patents or other marketable technology; and
  
- Miscellaneous investments.

### Investments and Strategies

The following is a summary description of the types of assets in which we may invest, the investment strategies we may use and the attendant risks associated with our investments and strategies.

#### **Venture Capital Investments**

We define venture capital as the money and resources made available to privately held and publicly traded small businesses that we believe have exceptional growth potential. These businesses can range in stage from pre-revenue to generating positive cash flow. Substantially all of our long-term venture capital investments are in thinly capitalized, unproven, small companies focused on commercializing risky technologies. These businesses also tend to lack management depth, to have limited or no history of operations and to have not attained profitability. Because of the speculative nature of these investments, these securities have a significantly greater risk of loss than traditional investment securities. Some of our venture capital investments will never realize their potential, and some will be unprofitable or result in complete loss of our investment.

We may own 100 percent of the securities of a small business for a period of time and may control the company for a substantial period. Small businesses are more vulnerable to adverse business or economic developments than better-capitalized companies. Small businesses generally have limited product lines, markets and/or financial resources. Publicly traded small businesses and those with small market capitalizations are not well known to the investing public and are generally subject to high volatility, to general movements in markets, to perceptions of potential growth and to potential bankruptcy.

In connection with our venture capital investments, we may participate in providing a variety of services to our portfolio companies, including the following:

recruiting management;

formulating operating strategies;

formulating intellectual property strategies;

assisting in financial planning;

providing management in the initial start-up stages;

introducing corporate and development partners; and

establishing corporate goals.

We may assist in raising additional capital for these companies from other potential investors and may subordinate our own investment to that of other investors. We typically find it necessary or appropriate to provide additional capital of our own in rounds of financing subsequent to our initial investment. We may introduce these companies to potential joint venture partners, suppliers and customers. In addition, we may assist in establishing relationships with investment bankers and other professionals. We may also assist management of our investee companies with strategy and execution of merger and acquisition ("M&A") transactions. While we do not currently derive income from these companies for the performance of any of the above services, we may seek to do so in the future.

We may control, be represented on, or have observer rights on the board of directors of a portfolio company through one or more of our officers or directors, who may also serve as officers of the portfolio company. We indemnify our officers and directors for serving on the boards of directors or as officers of portfolio companies, which exposes us to additional risks. Particularly during the early stages of an investment, we may, in rare instances, in effect be conducting the operations of the portfolio company. As a venture capital-backed company emerges from the developmental stage with greater management depth and experience, we expect that our role in the portfolio company's day-to-day operations will diminish. Our goal is to assist each company in establishing its own independent capitalization, management and board of directors. We expect to be able to reduce our involvement in those small businesses that become successful, as well as in those small businesses that fail.

Equity, Equity-Related Securities and Debt with Equity Features

We may invest in equity, equity-related securities and debt with equity features. These securities include common stock or units, preferred stock or units, debt instruments convertible into common or preferred stock or units, limited partnership interests, other beneficial ownership interests and warrants, options or other rights to acquire or agreements to sell any of the foregoing.

We primarily make investments in companies with operating histories that are unprofitable or marginally profitable, that have negative net worth or that are involved in bankruptcy or reorganization proceedings. These investments would involve businesses that management believes have potential for rapid growth through the infusion of additional capital and management assistance. In addition, we may make investments in connection with the acquisition or divestiture of companies or divisions of companies. There is a significantly greater risk of loss with these types of securities than is the case with traditional investment securities.

Warrants, options and convertible or exchangeable securities generally give the investor the right to acquire specified equity securities of an issuer at a specified price during a specified period or on a specified date. Warrants and options fluctuate in value in relation to the value of the underlying security and the remaining life of the warrant or option, while convertible or exchangeable securities fluctuate in value both in relation to the intrinsic value of the security without the conversion or exchange feature and in relation to the value of the conversion or exchange feature, which is like a warrant or option. When we invest in these securities, we incur the risk that the option feature will expire worthless, thereby either eliminating or diminishing the value of our investment.

Most of our current portfolio company investments are in the equity securities of private companies. Investments in equity securities of private companies often involve securities that are restricted as to sale and cannot be sold in the open market without registration under the Securities Act of 1933 or pursuant to a specific exemption from these registrations. Opportunities for sale are more limited than in the case of marketable securities, although these investments may be purchased at more advantageous prices and may offer attractive investment opportunities. Even if one of our portfolio companies completes an initial public offering ("IPO"), we are typically subject to a lock-up agreement for 180 days, and the stock price may decline substantially before we are free to sell or enter into contracts to sell these shares. These lock-up restrictions apply to us and our shares of the portfolio company and generally include provisions that stipulate that we are not permitted to offer, pledge or sell our shares, including selling covered call options on our shares, prior to the expiration of the lock-up period. We are also prohibited from entering into securities lending arrangements for these securities during the lock-up period.

We may employ an option strategy of writing (selling) covered call options or purchasing put options on one or more of our public portfolio companies once any restrictions and/or lock-up periods expire. Call options are contracts representing the right to purchase a common stock at a specified price (the "strike price") at a specified future date (the "expiration date"). Selling a covered call option represents an obligation to sell a specified number of shares of common stock at a strike price by an expiration date if the stock achieves the strike price and if it is called. A call option whose strike price is above the current price of the underlying stock is called "out-of-the-money." A call option whose strike price is below the current price of the underlying stock is called "in-the-money." When stocks in the portfolio rise, call options that were out-of-the-money when written may become in-the-money, thereby increasing the likelihood that they could be exercised, and we are forced to sell the stock. While this may be desirable in some instances, we may minimize undesirable option assignments by repurchasing the call options prior to expiration, generating a gain or loss in the options. If the options were not to be repurchased, the option holder could exercise its rights and buy the stock from us at the strike price if the stock traded at a higher price than the strike price. We will only "sell" or "write" options on common stocks held in our portfolio. We will not sell "naked" call options, *i.e.*, options representing more shares of the stock than are held in the portfolio. For conventional listed call options, the options' expiration dates are commonly up to nine months from the date the call options are first listed for trading. Longer-term call options can have expiration dates up to three years from the date of listing. We currently expect the majority of written call options to have expirations of equal to or less than one year from the date the call option is first listed for trading.

We may also purchase put options as a method of limiting the downside risk that the price per share of these companies may decrease substantially from current levels. A put option gives its holder the right to sell a specified number of shares of a specific security at a specific price (known as the exercise strike price) by a certain date. The buyer of a put option is betting that the price of the security will decrease before the option expires. The risk for us as the option holder is that the option expires unexercised, and we have lost the money spent on buying the option.

We may utilize instruments such as forward contracts, currency options and interest rate swaps, caps, collars and floors to seek to hedge against fluctuations in the relative values of our portfolio positions from changes in market conditions, currency exchange rates and market interest rates. Hedging against a decline in the values of our portfolio positions does not eliminate the possibility of fluctuations in the values of such positions or prevent losses if the values of such positions decline. However, such hedging can establish other positions designed to gain from those same developments, thereby offsetting the decline in the value of such portfolio positions.

We may also invest in publicly traded securities of whatever nature, including relatively small, emerging growth companies that management believes have long-term growth potential. These investments may be through open-market transactions or through private placements in publicly traded companies ("PIPEs"). Securities purchased in PIPE transactions are typically subject to a lock-up agreement for 180 days, or are issued as unregistered securities that are not freely tradable for six months.

Even if we have registration rights to make our investments in privately held and publicly traded companies more marketable, a considerable amount of time may elapse between a decision to sell or register the securities for sale and the time when we are able to sell the securities. The prices obtainable upon sale may be adversely affected by market conditions, by the level of average trading volume of the underlying stock as compared with the position offered for sale or negative conditions affecting the issuer during the intervening time. We may elect to hold formerly restricted securities after they have become freely marketable, either because they remain relatively illiquid or because we believe that they may appreciate in value. During this holding period, the value of these securities may decline and be especially volatile. If we need funds for investment or working capital purposes, we might need to sell marketable securities at disadvantageous times or prices.

## **Debt Investments**

We may hold debt securities, including in privately held and thinly traded public companies, for income and as a reserve pending more speculative investments. Debt obligations may include U.S. government and agency securities, commercial paper, bankers' acceptances, receivables or other asset-based financing, notes, bonds, debentures, or other debt obligations of any nature and repurchase agreements related to these securities. These obligations may have varying terms with respect to security or credit support, subordination, purchase price, interest payment and length of time to maturity from private, public or governmental issuers of any type located anywhere in the world. We may invest in debt obligations of companies with operating histories that are unprofitable or marginally profitable, that

have negative net worth or are involved in bankruptcy or reorganization proceedings, or that are start-up or development-stage small businesses. In addition, we may participate in the acquisition or divestiture of companies or divisions of companies through issuance or receipt of debt obligations. As of December 31, 2012, the debt obligations held in our portfolio consisted of convertible bridge notes, secured non-convertible notes, senior secured non-convertible debt through participation agreements and a subordinated non-convertible note. The convertible bridge notes generally do not generate cash payments to us, nor are they held for that purpose. Our convertible bridge notes and the interest accrued thereon are generally held for the purpose of potential conversion into equity at a future date.

Our investments in debt obligations may be of varying quality, including non-rated, unsecured, highly speculative debt investments with limited marketability. Investments in lower-rated and non-rated securities, commonly referred to as "junk bonds," including our non-convertible debt investments, are subject to special risks, including a greater risk of loss of principal and non-payment of interest. Generally, lower-rated and non-rated securities offer a higher return potential than higher-rated securities, but involve greater volatility of price and greater risk of loss of income and principal, including the possibility of default or bankruptcy of the issuers of these securities. Lower-rated securities and comparable non-rated securities will likely have large uncertainties or major risk exposure to adverse economic conditions and are predominantly speculative with respect to the issuer's capacity to pay interest and repay principal in accordance with the terms of the obligation. In addition, issuers of lower-rated securities and comparable non-rated securities are often highly leveraged and may not have more traditional methods of financing available to them; therefore, their ability to service their debt obligations during an economic downturn or during sustained periods of rising interest rates may be impaired. The risk of loss owing to default by these issuers is significantly greater because lower-rated securities and comparable non-rated securities generally are unsecured and frequently are subordinated to the prior payment of senior indebtedness. We may incur additional expenses to the extent that we are required to seek recovery upon a default in the payment of principal or interest on our portfolio holdings. In addition, many of the companies in which we invest have limited cash flows and no income, which may limit our ability to recover in the event of a default.

The markets in which lower-rated securities or comparable non-rated securities are traded generally are more limited than those in which higher-rated securities are traded. The existence of limited markets for these securities may restrict our ability to obtain accurate market quotations for the purposes of valuing lower-rated or non-rated securities and calculating net asset value or to sell securities at their fair value. The market values of lower-rated and non-rated securities also tend to be more sensitive to individual corporate developments and changes in economic conditions than higher-rated securities. The occurrence of adverse conditions and uncertainties to issuers of lower-rated securities would likely reduce the value of lower-rated or non-rated securities held by us, with a commensurate effect on the value of our shares, when applicable.

The market values of investments in debt securities that carry no equity conversion rights usually reflect yields generally available on securities of similar quality and type at the time purchased. When interest rates decline, the market value of a debt portfolio already invested at higher yields can be expected to rise if the securities are protected against early call. Similarly, when interest rates increase, the market value of a debt portfolio already invested at lower yields can be expected to decline. Deterioration in credit quality also generally causes a decline in market value of the security, while an improvement in credit quality generally leads to increased value.



## Foreign Securities

We may make investments in securities of issuers whose principal operations are conducted outside the United States, and whose earnings and securities are stated in foreign currency. In order to maintain our status as a BDC, our investments in non-qualifying assets, including the securities of companies organized outside the United States, would be limited to 30 percent of our assets, because under the 1940 Act, we must generally invest at least 70 percent of our assets in "qualifying assets," which exclude securities of foreign companies.

In comparison with otherwise comparable investments in securities of U.S. issuers, currency exchange risk of securities of foreign issuers is a significant variable. The value of these investments to us will vary with the relation of the currency in which they are denominated to the U.S. dollar, as well as with intrinsic elements of value such as credit risk, interest rates and performance of the issuer. Investments in foreign securities also involve risks relating to economic and political developments, including nationalization, expropriation of assets, currency exchange freezes and local recession. Securities of many foreign issuers are less liquid and more volatile than those of comparable U.S. issuers. Interest and dividend income and capital gains on our foreign securities may be subject to withholding and other taxes that may not be recoverable by us. We may seek to hedge all or part of the currency risk of our investments in foreign securities through the use of futures, options and forward currency purchases or sales.

## Intellectual Property

We believe there is a role for organizations that can assist in technology transfer. Scientists and institutions that develop and patent intellectual property perceive the need for and rewards of entrepreneurial commercialization of their inventions.

Our form of investment may be:

- funding research and development in the development of a technology;
- obtaining licensing rights to intellectual property or patents;
- acquiring intellectual property or patents; or
- forming and funding companies or joint ventures to commercialize further intellectual property.

Income from our investments in intellectual property or its development may take the form of participation in licensing or royalty income, fee income, or some other form of remuneration. In order to satisfy RIC requirements, these investments will normally be held in an entity taxable as a corporation. Investment in developmental intellectual property rights involves a high degree of risk that can result in the loss of our entire investment as well as additional risks, including uncertainties as to the valuation of an investment and potential difficulty in liquidating an investment. Further, investments in intellectual property generally require investor patience, as investment return may be realized only after or over a long period. At some point during the commercialization of a technology, our investment may be transformed into ownership of securities of a small business, as discussed under "Venture Capital Investments" above.

### **Borrowing and Margin Transactions**

We may from time to time borrow money or obtain credit by any lawful means from banks, lending institutions, other entities or individuals, in negotiated transactions. We may issue, publicly or privately, bonds, debentures or notes, in series or otherwise, with interest rates and other terms and provisions, including conversion rights, on a secured or unsecured basis, for any purpose, up to the maximum amounts and percentages permitted for BDCs under the 1940 Act. The 1940 Act currently prohibits us from borrowing any money or issuing any other senior securities (including preferred stock but excluding temporary borrowings of up to five percent of our assets), if after giving effect to the borrowing or issuance, the value of our total assets less liabilities not constituting senior securities would be less than 200 percent of our senior securities. We may pledge assets to secure any borrowings. As of December 31, 2012, we had no debt.

A primary purpose of our borrowing power is for leverage and to increase our ability to acquire larger positions in our investments while maintaining a substantial balance of cash on our balance sheet. As discussed in more detail below in "Management's Discussion and Analysis of Financial Condition and Results of Operations," we believe we need a strong balance sheet to have access to the best deal flow. Borrowings for leverage accentuate any increase or decrease in the market value of our investments and thus our net asset value. Because any decline in the net asset value of our investments will be borne first by holders of common stock, the effect of leverage in a declining market would be a greater decrease in net asset value applicable to the common stock than if we were not leveraged. Any decrease would likely be reflected in a decline in the market price of our common stock. To the extent the income derived from assets acquired with borrowed funds exceeds the interest and other expenses associated with borrowing, our total income will be greater than if borrowings were not used. Conversely, if the income from assets is not sufficient to cover the borrowing costs, our total income will be less than if borrowings were not used. If our current income is not sufficient to meet our borrowing costs (repayment of principal and interest), we might have to liquidate some or all of our investments when it may be disadvantageous to do so. Our borrowings for the purpose of buying most liquid equity securities will be subject to the margin rules, which require excess liquid collateral marked to market daily. If we are unable to post sufficient collateral, we will be required to sell securities to remain in compliance with the margin rules. These sales might be at disadvantageous times or prices. We may in the future use borrowings to make equity-focused investments.

### **Portfolio Company Turnover**

Changes with respect to portfolio companies will be made as our management considers necessary in seeking to achieve our investment objectives. The rate of portfolio turnover will not be treated as a limiting or relevant factor considered by management when making portfolio changes.

Although we expect that many of our investments will be relatively long term in nature, we may make changes in our particular portfolio holdings whenever it is considered that an investment no longer has substantial growth potential or has reached its anticipated level of performance, or (especially when cash is not otherwise available) that another investment appears to have a relatively greater opportunity for capital appreciation. We may also make general portfolio changes to increase our cash to position us in a defensive posture. We may make portfolio changes without regard to the length of time we have held an investment, or whether a sale results in profit or loss, or whether a purchase results in the reacquisition of an investment that we may have only recently sold. Our investments in privately held small businesses are illiquid, which limits portfolio turnover. The portfolio turnover rate may vary greatly during a year as well as from year to year and may also be affected by cash requirements.

### **Competition**

Numerous companies and individuals are engaged in the venture capital business, and such business is intensely competitive. We believe our corporate structure permits public market investors to participate in venture capital and to participate in the commercialization of science-related breakthroughs, particularly those enabled by nanotechnology, while many of the leading companies are still private. We also believe our corporate structure permits greater liquidity and better transparency than other venture capital businesses. We believe that we have invested in more nanotechnology-enabled small businesses than any venture capital firm and that we have assembled a team of investment professionals that, in addition to a proven track record of successful venture capital investing, have scientific and intellectual property expertise that is relevant to investing in science-related breakthroughs, particularly those enabled by nanotechnology. Nevertheless, many of our competitors have significantly greater financial and other resources than we do and are, therefore, in certain respects, in a better position than we are to obtain access to attractive venture capital investments. There can be no assurance that we will be able to compete against these venture capital businesses for attractive investments, particularly in capital-intensive companies.

### **Regulation**

The Small Business Investment Incentive Act of 1980 added the provisions of the 1940 Act applicable only to BDCs. BDCs are a special type of investment company. After a company files its election to be treated as a BDC, it may not withdraw its election without first obtaining the approval of holders of a majority of its outstanding voting securities. The following is a brief description of the 1940 Act provisions applicable to BDCs, qualified in its entirety by reference to the full text of the 1940 Act and the rules issued thereunder by the Securities and Exchange Commission ("SEC").

Generally, to be eligible to elect BDC status, a company must primarily engage in the business of furnishing capital and making significant managerial assistance available to companies that do not have ready access to capital through conventional financial channels. Such companies that satisfy certain additional criteria described below are termed "eligible portfolio companies." In general, in order to qualify as a BDC, a company must: (i) be a domestic company;

(ii) have registered a class of its securities pursuant to Section 12 of the Securities Exchange Act of 1934 (the "Exchange Act"); (iii) operate for the purpose of investing in the securities of certain types of portfolio companies, including early-stage or emerging companies and businesses suffering or just recovering from financial distress (see following paragraph); (iv) make available significant managerial assistance to such portfolio companies; and (v) file a proper notice of election with the SEC.

An eligible portfolio company generally is a domestic company that is not an investment company or a company excluded from investment company status pursuant to exclusions for certain types of financial companies (such as brokerage firms, banks, insurance companies and investment banking firms) and that: (i) has a fully diluted market capitalization of less than \$250 million and has a class of equity securities listed on a national securities exchange, (ii) does not have a class of securities listed on a national securities exchange, or (iii) is controlled by the BDC by itself or together with others (control under the 1940 Act is presumed to exist where a person owns at least 25 percent of the outstanding voting securities of the portfolio company) and has a representative on the Board of Directors of such company.

As with other companies regulated by the 1940 Act, a BDC must adhere to certain substantive regulatory requirements. A majority of the directors must be persons who are not interested persons, as that term is defined in the 1940 Act. Additionally, we are required to provide and maintain a bond issued by a reputable fidelity insurance company to protect the BDC. Furthermore, as a BDC, we are prohibited from protecting any director or officer against any liability to us or our shareholders arising from willful malfeasance, bad faith, gross negligence or reckless disregard of the duties involved in the conduct of such person's office. We may be periodically examined by the SEC for compliance with the 1940 Act.

The 1940 Act provides that we may not make an investment in non-qualifying assets unless at the time at least 70 percent of the value of our total assets (measured as of the date of our most recently filed financial statements) consists of qualifying assets. Qualifying assets include: (i) securities of eligible portfolio companies; (ii) securities of certain companies that were eligible portfolio companies at the time we initially acquired their securities and in which we retain a substantial interest; (iii) securities of certain controlled companies; (iv) securities of certain bankrupt, insolvent or distressed companies; (v) securities received in exchange for or distributed in or with respect to any of the foregoing; and (vi) cash items, U.S. government securities and high quality short-term debt. The SEC has adopted a rule permitting a BDC to invest its cash in certain money market funds. The 1940 Act also places restrictions on the nature of the transactions in which, and the persons from whom, securities can be purchased in some instances in order for the securities to be considered qualifying assets.

We are permitted by the 1940 Act, under specified conditions, to issue multiple classes of debt and a single class of preferred stock if our asset coverage, as defined in the 1940 Act, is at least 200 percent after the issuance of the debt or the preferred stock (i.e., such senior securities may not be in excess of our net assets). Under specific conditions, we are also permitted by the 1940 Act to issue warrants.

Except under certain conditions, we may sell our securities at a price that is below the prevailing net asset value per share only during the 12-month period after (i) a majority of our directors and our disinterested directors have determined that such sale would be in the best interest of us and our shareholders and (ii) the holders of a majority of our outstanding voting securities and the holders of a majority of our voting securities held by persons who are not affiliated persons of ours approve our ability to make such issuances. A majority of the disinterested directors must determine in good faith that the price of the securities being sold is not less than a price which closely approximates the market value of the securities, less any distribution discount or commission.

Certain transactions involving certain closely related persons of the Company, including its directors, officers and employees, may require the prior approval of the SEC. However, the 1940 Act ordinarily does not restrict transactions between us and our portfolio companies.

We have adopted a code of ethics pursuant to Rule 17j-1 under the 1940 Act and Rule 204A-1 under the Investment Advisers Act of 1940, as amended (the "Advisers Act") that establishes procedures for personal investments and restricts certain personal securities transactions. Personnel subject to the code may invest in securities for their personal investment accounts, including securities that may be purchased or held by us, so long as such investments are made in accordance with the code's requirements.

To the extent we are successful raising private funds that are controlled by us, we will also be subject to regulation under the Advisers Act. The Advisers Act establishes, among other things, recordkeeping and reporting requirements, disclosure requirements, limitations on transactions between the advisor's account and an advisory client's account, limitations on transactions between the accounts of advisory clients, and general anti-fraud prohibitions. We will also be examined by the SEC from time to time for compliance with the Advisers Act.

### **Tax Status**

We have elected to be treated as a RIC, taxable under Subchapter M of the Internal Revenue Code of 1986 (the "Code"), for federal income tax purposes. In general, a RIC is not taxable on its income or gains to the extent it distributes such income or gains to its shareholders. In order to qualify for favorable RIC tax treatment, we must, in general, (1) annually derive at least 90 percent of our gross income from dividends, interest and gains from the sale of securities and similar sources (the "Income Source Rule"); (2) quarterly meet certain investment asset diversification requirements (the "Asset Diversification Rule"); and (3) annually distribute at least 90 percent of our investment company taxable income as a dividend (the "Income Distribution Rule"). Any taxable investment company income not distributed will be subject to corporate level tax. Any taxable investment company income distributed generally will be taxable to shareholders as dividend income.

In addition to the requirement that we must annually distribute at least 90 percent of our investment company taxable income, we may either distribute or retain our realized net capital gains from investments, but any net capital gains not distributed may be subject to corporate level tax. It is our current intention not to distribute net capital gains. Any net capital gains distributed generally will be taxable to shareholders as long-term capital gains.



In lieu of actually distributing our realized net capital gains, we as a RIC may retain all or part of our net capital gains and elect to be deemed to have made a distribution of the retained portion to our shareholders under the "designated undistributed capital gain" rules of the Code. We currently intend to retain and so designate all of our net capital gains. In this case, the "deemed dividend" generally is taxable to our shareholders as long-term capital gains. Although we pay tax at the corporate rate on the amount deemed to have been distributed, our shareholders receive a tax credit equal to their proportionate share of the tax paid and an increase in the tax basis of their shares by the amount per share retained by us.

To the extent that we declare a deemed dividend, each shareholder will receive an IRS Form 2439 that will reflect each shareholder's receipt of the deemed dividend income and a tax credit equal to each shareholder's proportionate share of the tax paid by us. This tax credit, which is paid at the corporate rate, is often credited at a higher rate than the actual tax due by a shareholder on the deemed dividend income. The "residual" credit can be used by the shareholder to offset other taxes due in that year or to generate a tax refund to the shareholder. Tax exempt investors may file for a refund.

The following simplified examples illustrate the tax treatment under Subchapter M of the Code for us and our individual shareholders with regard to three possible distribution alternatives, assuming a net capital gain of \$1.00 per share, consisting entirely of sales of non-real property assets held for more than 12 months.

**Under Alternative A:** 100 percent of net capital gain declared as a cash dividend and distributed to shareholders:

1. No federal taxation at the Company level.
2. Taxable shareholders receive a \$1.00 per share dividend and pay federal tax at a rate not in excess of 15 percent\* or \$.15 per share, retaining \$.85 per share.
3. Non-taxable shareholders that file a federal tax return receive a \$1.00 per share dividend and pay no federal tax, retaining \$1.00 per share.

**Under Alternative B (Current Tax Structure Employed):** 100 percent of net capital gain retained by the Company and designated as "undistributed capital gain" or deemed dividend:

1. The Company pays a corporate-level federal income tax of 35 percent on the undistributed gain or \$.35 per share and retains 65 percent of the gain or \$.65 per share.
2. Taxable shareholders increase their cost basis in their stock by \$.65 per share. They pay federal capital gains tax at a rate not in excess of 15 percent\* on 100 percent of the undistributed gain of \$1.00 per share or \$.15 per share in tax. Offsetting this tax, shareholders receive a tax credit equal to 35 percent of the undistributed gain or \$.35 per share.
3. Non-taxable shareholders that file a federal tax return receive a tax refund equal to \$.35 per share.

\*Assumes all capital gains qualify for long-term rates of 15 percent, which may increase for gains realized after December 31, 2012.

**Under Alternative C:** 100 percent of net capital gain retained by the Company, with no designated undistributed capital gain or deemed dividend:

1. The Company pays a corporate-level federal income tax of 35 percent on the retained gain or \$.35 per share plus an excise tax of four percent of \$.98 per share, or about \$.04 per share.

2. There is no tax consequence at the shareholder level.

Although we may retain income and gains subject to the limitations described above (including paying corporate level tax on such amounts), we could be subject to an additional four percent excise tax if we fail to distribute 98 percent of our "regulated investment company ordinary income" and 98.2 percent of our "capital gain net income" for the relevant determination period.

As noted above, in order to qualify as a RIC, we must satisfy the Asset Diversification Rule each quarter. Because of the specialized nature of our investment portfolio, in some years we have been able to satisfy the diversification requirements under Subchapter M of the Code primarily as a result of receiving certification from the SEC under the Code with respect to each taxable year beginning after 1998 that we were "principally engaged in the furnishing of capital to other corporations which are principally engaged in the development or exploitation of inventions, technological improvements, new processes, or products not previously generally available" for such year.

Although we received SEC certifications for 1999-2011, there can be no assurance that we will receive such certification for subsequent years (to the extent we need additional certifications as a result of changes in our portfolio). We intend to apply for certification for 2012. If we require, but fail to obtain, the SEC certification for a taxable year, we may fail to qualify as a RIC for such year. We also will fail to qualify for favorable RIC tax treatment for a taxable year if we do not satisfy the Income Source Rule or Income Distribution Rule for such year. In the event we do not satisfy the Income Source Rule, the Asset Diversification Rule and the Income Distribution Rule for any taxable year, we will be subject to federal tax with respect to all of our taxable income, whether or not distributed. In addition, all our distributions to shareholders in that situation generally will be taxable as ordinary dividends.

Although we currently intend to qualify as a RIC for each taxable year, under certain circumstances we may choose to take action with respect to one or more taxable years to ensure that we would be taxed under Subchapter C of the

Code (rather than Subchapter M) for such year or years. We will choose to take such action only if we determine that the result of the action will benefit us and our shareholders.

## **Subsidiaries**

H&H Ventures Management, Inc.<sup>SM</sup> ("Ventures"), formerly Harris & Harris Enterprises, Inc.<sup>SM</sup>, is a 100 percent wholly owned subsidiary of the Company and is consolidated in our financial statements. Ventures holds the lease for our office space in Palo Alto, California, is a partner in Harris Partners I, L.P.<sup>SM</sup>, and is taxed as a C Corporation. Harris Partners I, L.P., is a limited partnership and has historically owned our interests in partnership investments. The partners of Harris Partners I, L.P., are Ventures (sole general partner) and the Company (sole limited partner). Ventures, as the sole general partner, consolidates Harris Partners I, L.P.

## **Available Information**

Additional information about us, including our Annual Report on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K and amendments to those reports filed or furnished pursuant to Section 13(a) or 15(d) of the Exchange Act, are available as soon as reasonably practicable free of charge on our website at [www.HHVC.com](http://www.HHVC.com). Information contained on our website is not incorporated by reference into this Annual Report on Form 10-K, and you should not consider that information to be part of this Annual Report on Form 10-K.

You may read and copy any materials we file with the SEC at the SEC's Public Reference Room at 100 F Street, NE, Washington, DC 20549. You may obtain information regarding the Public Reference Room by calling the SEC at 1-800-SEC-0330.

## **Employees**

As of December 31, 2012, we employed 11 full-time employees and two part-time employees. We believe our relations with our employees are generally good.

## **Item 1A. Risk Factors.**

Investing in our common stock involves significant risks relating to our business and investment objective. You should carefully consider the risks and uncertainties described below before you purchase any shares of our common stock. These risks and uncertainties are not the only ones we face. Unknown additional risks and uncertainties, or ones that we currently consider immaterial, may also impair our business. If any of these risks or uncertainties materialize,

our business, financial condition or results of operations could be materially adversely affected. In this event, the trading price of our common stock could decline, and you could lose all or part of your investment.

Risks related to our investments.

**Approximately 36.9 percent of the net asset value attributable to our equity-focused venture capital investment portfolio, or 29.5 percent of our net asset value, as of December 31, 2012, is concentrated in three companies, Solazyme, Inc., Xradia, Inc., and Adesto Technologies Corporation.**

At December 31, 2012, we valued our investment in Solazyme, which had a historical cost to us of \$4,248,476, at \$14,130,629, our investment in Xradia which had a historical cost to us of \$4,000,000 at \$12,303,684, and our investment in Adesto, which had a historical cost to us of \$7,278,678, at \$11,463,167, which collectively is 36.9 percent of the net asset value attributable to our equity-focused venture capital investment portfolio, excluding our rights to potential future milestone payments from the sale of BioVex to Amgen, or 29.5 percent of our net asset value.

Solazyme is now publicly traded on the Nasdaq Global Select Market. As of December 31, 2012, we owned an aggregate of 1,797,790 shares of Solazyme. Our valuation of Solazyme as of December 31, 2012, was based on the share price as of the close of trading on December 31, 2012, which was \$7.86. Any downturn in the business outlook of Solazyme, any failure of the products of Solazyme to receive widespread acceptance in the marketplace, any broad decrease in value of the public markets or negative events in the biofuel or algae-derived oil industry sectors could have a significant effect on the value of our current investment in Solazyme, and the overall value of our portfolio, and could have a significant adverse effect on the value of our common stock. As of March 14, 2013, Solazyme's closing price was \$8.88 per share.

Additionally, any downturn in the business outlook and/or substantial changes in the funding requirements of Xradia or Adesto could have a significant effect on the value of our current investments in those companies, and the overall value of our portfolio, and could have a significant adverse effect on the value of our common stock.

**The difficult venture capital investment and capital market climates could increase the non-performance risk for our portfolio companies.**

While the public markets and corporate growth are improving, unemployment remains high, and there are global instabilities, including sovereign debt issues and the potential for future inflation. Even with signs of economic improvement, the availability of capital for venture capital firms and venture-backed companies continues to be limited, particularly for capital-intensive, science-enabled, small businesses such as the ones in which we invest. Historically, difficult venture environments have resulted in a higher than normal number of small businesses not receiving financing and being subsequently closed down with a loss to venture investors, and other small businesses receiving financing but at significantly lower valuations than the preceding financing rounds. This issue is compounded by the fact that many existing venture capital firms have few remaining years of investment and available capital owing to the finite lifetime of the funds managed by these firms. Additionally, even if a firm was able to raise a new fund, commonly new funds are not permitted to invest with old funds in existing investments. As such, improvements in the liquidity environment for venture-backed companies through IPOs and M&A transactions and the currently improving public markets in general may not translate to an increase in the available capital to venture-backed companies, particularly those that have investments from funds that are in the latter stage of life unless such improvements continue for some time into the future. Further, many of our portfolio companies receive non-dilutive funding through government contracts and grants. Sequestration could have a direct and significant reduction in our portfolio companies' contract or grant awards. Sequestration will also likely result in reduced budgets at research facilities, which will reduce the volume of products they could potentially purchase from our portfolio

companies.

16



We believe that these factors continue to introduce significant non-performance risk for venture-backed companies that need to raise additional capital or that require substantial amounts of capital to execute on their business plans. We define non-performance as the risk that the price per share (or implied valuation of a portfolio company) or the effective yield of a debt security of a portfolio company, as applicable, does not appropriately represent the risk that a portfolio company that requires or seeks to raise additional capital will be: (a) unable to raise capital, will need to be shut down and will not return our invested capital; or (b) able to raise capital, but at a valuation significantly lower than the implied post-money valuation of the most recent round of financing. In these circumstances, the portfolio company could be recapitalized at a valuation significantly lower than the post-money valuation implied by our valuation method, sold at a loss to our investment or shut down. In addition, significant changes in the capital markets, including periods of extreme volatility and disruption, have had, and may in the future have, a negative effect on the valuations of our investments and on the potential for liquidity events involving our investments. We believe further that the long-term effects of the difficult venture capital investment and difficult, but improving, liquidity environments will continue to affect negatively the fundraising ability of some small businesses regardless of near-term improvements in the overall global economy and public markets.

**The average length of time from founding to a liquidity event is at historical highs, which could result in companies remaining in our portfolio longer, leading to lower returns, write-downs and write-offs.**

Beginning in about 2001, many fewer venture capital-backed companies per annum have been able to complete IPOs than in the years of the previous decade. On average, more capital and more time than in previous decades are required for companies to reach these liquidity events. This trend has and may continue to lead to companies remaining longer in our portfolio as illiquid, privately held entities that may require additional funding. In the best case, such stagnation would dampen returns, and in the worst case, could lead to write-downs and write-offs as some companies run short of cash and have to accept lower valuations in private financings or are not able to access additional capital at all. The difficult venture capital climate is also causing some venture capital firms to change their investment strategies. Accordingly, some venture capital firms are reducing funding of their portfolio companies, making it more difficult for such companies to access capital and to fulfill their potential. In some cases this leads to write-downs and write-offs of such companies by other venture capital firms, such as ourselves, who are co-investors in such companies.

Investing in small, privately held and publicly traded companies involves a high degree of risk and is highly speculative.

We have invested a substantial portion of our assets in privately held companies, the securities of which are inherently illiquid. We also seek to invest in publicly traded small businesses that we believe have exceptional growth potential. Although these companies are publicly traded, their stock may not trade at high volumes, and prices can be volatile, which may restrict our ability to sell our positions. These privately held and publicly traded small businesses tend to lack management depth, to have limited or no history of operations and to have not attained profitability. Companies commercializing products enabled by nanotechnology or microsystems are especially risky, involving scientific, technological and commercialization risks. Because of the speculative nature of these investments, these securities

have a significantly greater risk of loss than traditional investment securities. Some of our venture capital investments are likely to be complete losses or unprofitable, and some will never realize their potential. We have been and will continue to be risk seeking rather than risk averse in our approach to venture capital and other investments. Neither our investments nor an investment in our common stock is intended to constitute a balanced investment program.

**We invest in sectors including life sciences, energy and electronics that are subject to specific risks related to each industry.**

The three largest portions of our portfolio are invested in life sciences, energy and electronics companies. Our life sciences portfolio consists of companies that commercialize and integrate products in life sciences-related industries, including biotechnology, pharmaceuticals, diagnostics and medical devices. There are risks in investing in companies that target life sciences-related industries, including, but not limited to, the uncertainty of timing and results of clinical trials to demonstrate the safety and efficacy of products; failure to obtain any required regulatory approval of products; failure to develop manufacturing processes that meet regulatory standards; competition, in particular from companies that develop rival products; and the ability to protect proprietary technology. Adverse developments in any of these areas may adversely affect the value of our life sciences portfolio.

This life sciences industry is dominated by large multinational corporations with substantial greater financial and technical resources than generally will be available to the portfolio companies. Such large corporations may be better able to adapt to the challenges presented by continuing rapid and major scientific, regulatory and technological changes as well as related changes in governmental and third-party reimbursement policies.

Within the life sciences industry, the development of products generally is a costly and time-consuming process. Many highly promising products ultimately fail to prove to be safe and effective. There can be no assurance that the research or product development efforts of the portfolio companies or those of their collaborative partners will be successfully completed, that specific products can be manufactured in adequate quantities at an acceptable cost and with appropriate quality, or that such products can be successfully marketed or achieve customer acceptance. There can be no assurance that a product will be relevant and/or be competitive with products from other companies following the costly, time-consuming process of its development.

The research, development, manufacturing, and marketing of products developed by some life sciences companies are subject to extensive regulation by numerous government authorities in the United States and other countries. There can be no assurance that products developed by the portfolio companies will ever be approved by such governmental authorities.

Many life sciences portfolio companies will depend heavily upon intellectual property for their competitive position. There can be no assurance that the portfolio companies will be able to obtain patents for key inventions. Moreover, within the life sciences industry, patent challenges are frequent. Even if patents held by the portfolio companies are upheld, any challenges thereto may be costly and distracting to the portfolio companies' management.

Some of the life sciences portfolio companies will be at least partially dependent for their success upon governmental and third-party reimbursement policies that are under constant review and are subject to change at any time. Any such change could adversely affect the viability of one or more portfolio companies.

Our energy portfolio consists of companies that commercialize and integrate products targeted at energy-related markets. There are risks in investing in companies that target energy-related markets, including the rapid and sometimes dramatic price fluctuations of commodities, particularly oil and sugar, and of public equities, the reliance on the capital and debt markets to finance large capital outlays, change in climate, including climate-related regulations, and the dependence on government subsidies to be cost-competitive with non-renewable or energy-efficient solutions. For example, the attractiveness of alternative methods for the production of biobutanol and biodiesel can be adversely affected by a decrease in the demand or price of oil. Adverse developments in this market may significantly affect the value of our energy portfolio, and thus our venture capital portfolio as a whole.

Our electronics portfolio consists of companies that commercialize and integrate products targeted at electronics-related markets. There are risks in investing in companies that target electronics-related markets, including rapid and sometimes dramatic price erosion of products, the reliance on capital and debt markets to finance large capital outlays, including fabrication facilities, the reliance on partners outside of the United States, particularly in Asia, and inherent cyclicalities of the electronics market in general. Additionally, electronics-related companies are currently out of favor with many venture capital firms. Therefore, access to capital may be difficult or impossible for companies in our portfolio that are pursuing these markets.

**The three main industry sectors around which our nanotechnology investments have developed are all capital intensive.**

The industry sectors where nanotechnology and microsystems are gaining the greatest traction, life sciences, energy and electronics are all capital intensive. Currently, financing for capital-intensive companies remains difficult. In some successful companies, we believe we may need to invest more than we currently have planned to invest in these companies. There can be no assurance that we will have the capital necessary to make such investments. In addition, investing greater than planned amounts in our portfolio companies could limit our ability to pursue new investments and fund follow-on investments. Both of these situations could cause us to miss investment opportunities or limit our ability to protect existing investments from dilution or other actions or events that would decrease the value and potential return from these investments.

**Our board of directors may change our investment objective, operating policies and strategies without prior notice or shareholder approval, the effects of which may be adverse.**

We currently make venture capital investments exclusively in companies commercializing or integrating products enabled by nanotechnology or microsystems. This investment focus is not a fundamental policy and accordingly may be changed without shareholder approval, although we intend to give shareholders at least 60 days' prior notice of any change from this investment focus. Otherwise, our board of directors has the authority to modify or waiver our investment objective, current operating policies, investment criteria and strategies without prior notice and, without shareholder approval. We cannot predict the effect any changes to our current operating policies, investment criteria and strategies would have on our business, net asset value, operating results and value of our stock. However, the effects might be adverse, which could negatively impact our ability to pay you dividends and cause you to lose all or part of your investments.

We invest in illiquid securities and may not be able to dispose of them when it is advantageous to do so, or ever.

Most of our investments are or will be equity, equity-linked, or debt securities acquired directly from small businesses. These securities are generally subject to restrictions on resale or otherwise have no established trading market. The illiquidity of most of our portfolio of securities may adversely affect our ability to dispose of these securities at times when it may be advantageous for us to liquidate these investments. We may never be able to dispose of these securities.

In addition, we are typically subject to lock-up provisions that prohibit us from selling our investments into the public market for specified periods of time after IPOs. After a portfolio company completes an IPO, its shares are generally subject to lock-up restrictions for a period of time. These lock-up restrictions apply to us and our shares of the portfolio company and generally include provisions that stipulate that we are not permitted to offer, pledge or sell our shares, including selling covered call options on our shares, prior to the expiration of the lock-up period. We are also prohibited from entering into securities lending arrangements for these securities during the lock-up period. The market price of securities that we hold may decline substantially before we are able to sell these securities.

Our portfolio companies working with nanotechnology and microsystems may be particularly susceptible to intellectual property litigation.

Research and commercialization efforts in nanotechnology and microsystems are being undertaken by a wide variety of government, academic and private corporate entities. As additional commercially viable applications of nanotechnology emerge, ownership of intellectual property on which these products are based may be contested. From time to time, our portfolio companies are or have been involved in intellectual property disputes and litigation. Any litigation over the ownership of, or rights to, any of our portfolio companies' technologies or products could have a material adverse effect on those companies' values.

The value of our portfolio could be adversely affected if the technologies utilized by our portfolio companies are found, or even rumored or feared, to cause health or environmental risks, or if legislation is passed that limits the commercialization of any of these technologies.

Nanotechnology has received both positive and negative publicity and is the subject increasingly of public discussion and debate. For example, debate regarding the production of materials that could cause harm to the environment or the health of individuals could raise concerns in the public's perception of nanotechnology, not all of which might be rational or scientifically based. Nanotechnology in particular is currently the subject of health and environmental impact research. As nanotechnology commercialization increases and companies continue to mature, awareness about these safety and environmental concerns could increase as well. If health or environmental concerns about

nanotechnology or microsystems were to arise, whether or not they had any basis in fact, our portfolio companies might incur additional research, legal and regulatory expenses, and might have difficulty raising capital or marketing their products. Government authorities could, for social or other purposes, prohibit or regulate the use of nanotechnology. Legislation could be passed that could circumscribe the commercialization of any of these technologies.

**Our investments in debt securities of portfolio companies may be extremely risky, and we could lose all or part of our investments.**

A portfolio company's failure to satisfy financial or operating covenants imposed by us or other lenders could lead to defaults and, potentially, termination of its loans and foreclosure on its assets, which could trigger cross-defaults under other agreements and jeopardize our portfolio company's ability to meet its obligations under the debt securities that we hold. We may incur expenses to the extent necessary to seek recovery upon default or to negotiate new terms with a defaulting portfolio company. In addition, if a portfolio company goes bankrupt, even though we may have structured our interest as senior debt, depending on the facts and circumstances, including the extent to which we actually provided significant "managerial assistance" to that portfolio company, a bankruptcy court might recharacterize our debt holding and subordinate all or a portion of our claim to that of another creditor.

When we make an investment in a secured debt instrument of a portfolio company, we generally take a security interest in the available assets of the portfolio company, including the equity interests of its subsidiaries, which we expect to help mitigate the risk that we will not be repaid. However, there is a risk that the collateral securing our loans may decrease in value over time, may be difficult to sell in a timely manner, may be difficult to appraise and may fluctuate in value based upon the success of the business and market conditions, including as a result of the inability of the portfolio company to raise additional capital, and, in some circumstances, our lien could be subordinated to claims of other creditors. In addition, deterioration in a portfolio company's financial condition and prospects, including its inability to raise additional capital, may be accompanied by deterioration in the value of the collateral for the loan. Consequently, the fact that a loan is secured does not guarantee that we will receive principal and interest payments according to the loan's terms, or at all, or that we will be able to collect on the loan should we be forced to enforce our remedies.

**To the extent we use debt to finance our investments, changes in interest rates could affect our cost of capital and net investment income.**

To the extent we borrow money to make investments, our net investment income will depend, in part, upon the difference between the rate at which we borrow funds and the return from invested funds. As a result, we can offer no assurance that a significant change in market interest rates will not have a material adverse effect on our net investment income in the event we use debt to finance our investments. In periods of rising interest rates, our cost of funds could increase, which could reduce our net investment income. In addition, an increase in interest rates would make it more expensive to use debt to finance our investments. As a result, a significant increase in market interest rates could increase our cost of capital, which would reduce our net investment income. A decrease in market interest rates may adversely impact our returns on our cash invested in treasury securities, which would reduce our net investment income and cash available to fund operations.



On February 24, 2011, the Company established a \$10 million three-year revolving credit facility with TD Bank, N.A., to be used in conjunction with its investments in venture debt.

**Our portfolio companies may incur debt that ranks senior to our investments in such companies.**

We may make investments in our portfolio companies in the form of bridge notes that typically convert into preferred stock issued in the next round of financing of that portfolio company or other forms of convertible and non-convertible debt securities. Our portfolio companies usually have, or may be permitted to incur, other debt that ranks senior to the debt securities in which we invest. By their terms, debt instruments may provide that the holders are entitled to receive payment of interest and principal on or before the dates on which we are entitled to receive payments on the debt securities in which we invest. Also, in the case of insolvency, liquidation, dissolution, reorganization or bankruptcy of a portfolio company, holders of debt instruments ranking senior to our investment in that portfolio company would typically be entitled to receive payment in full before we receive any distribution in respect of our investment. After repaying such senior creditors, such portfolio company may not have any remaining assets to use for repaying its obligations to us. In addition, in companies where we have made investments in the form of bridge notes or other debt securities, we may also have investments in equity in the form of preferred shares. In some cases, a bankruptcy court may subordinate our bridge notes and/or other debt securities to debt holders that do not have equity in the portfolio company.

**Our portfolio companies face risks associated with international sales.**

We anticipate that certain of our portfolio companies could generate revenue from international sales. Risks associated with these potential future sales include:

- Political and economic instability;
- Export controls and other trade restrictions;
- Changes in legal and regulatory requirements;
- U.S. and foreign government policy changes affecting the markets for the technologies;
- Changes in tax laws and tariffs;

· Convertibility and transferability of international currencies; and

· International currency exchange rate fluctuations.

The effect of global climate change may impact our operations and the operations of our portfolio companies.

There may be evidence of global climate change. Climate change creates physical and financial risk, and some of our portfolio companies may be adversely affected by climate change. For example, the needs of customers of energy companies vary with weather conditions, primarily temperature and humidity. To the extent weather conditions are affected by climate change, energy use could increase or decrease depending on the duration and magnitude of any changes. Increases in the cost of energy could adversely affect the cost of operations of our portfolio companies if the use of energy products or services is material to their business. A decrease in energy use owing to weather changes may affect some of our portfolio companies' financial condition through decreased revenues. Extreme weather conditions in general may disrupt our operations and the operations of our portfolio companies and require more system backups and redundancies, adding to costs, and can contribute to increased system stresses, including service interruptions.

**Risks related to our Company and an investment in our securities.**

**The downgrade of the U.S. credit rating and the economic crisis in Europe could negatively impact our business, financial condition and results of operations.**

U.S. debt ceiling and budget deficit concerns, together with signs of deteriorating sovereign debt conditions in Europe, have increased the possibility of additional credit-rating downgrades and economic slowdowns. Standard & Poor's Ratings Services lowered its long-term sovereign credit rating on the United States from "AAA" to "AA+" in August 2011, owing, in part, to the continuing rise of the federal debt of the United States. The impact of this or any further downgrades to the U.S. government's sovereign credit rating, or its perceived creditworthiness, and the impact of the current crisis in Europe with respect to the ability of certain European Union countries to continue to service their sovereign debt obligations is inherently unpredictable and could adversely affect the U.S. and global financial markets and economic conditions. There can be no assurance that governmental or other measures to aid economic recovery will be effective. These developments, and the government's credit concerns in general, could cause interest rates and borrowing costs to rise, which may negatively impact our ability to access the capital markets on favorable terms. In addition, the decreased credit rating could create broader financial turmoil and uncertainty, adversely affect our business in many ways, including, but not limited to, decreasing our stock price, adversely impacting our portfolio companies' ability to obtain financing, or obtaining financing but at significantly lower valuations than the preceding financing rounds. The illiquidity of our investments may make it difficult for us to sell such investments if required. As a result, we may realize significantly less than the value at which we have recorded our investments. In addition, significant changes in the capital markets, including the disruption and volatility, have had, and may continue to have, a negative effect on the valuations of our investments and on the potential for liquidity events involving our investments. Market disturbances could also affect the value of our publicly traded portfolio companies and our privately held companies whose values are derived primarily from the values of publicly traded comparable companies, which as of December 31, 2012, accounted for 16.3 percent of the equity-focused venture capital portfolio. If any of these events were to occur, it could materially adversely affect our business, financial condition and results of operations.



**Our business may be adversely affected by the small size of our market capitalization.**

Changes in regulations of the financial industry have adversely affected coverage of small capitalization companies such as ours by financial analysts. A number of analysts that have covered us in the past are no longer able to continue to do so owing to changes in employment, to restrictions on the size of companies they are allowed to cover and/or their firms have shut down operations. An inability to attract analyst coverage may adversely affect the liquidity of our stock and our ability to raise capital from investors, particularly institutional investors. Our inability to access the capital markets on favorable terms, or at all, may adversely affect our future financial performance. The inability to obtain adequate financing capital sources could force us to seek debt financing, self-fund strategic initiatives or even forgo certain opportunities, which in turn could potentially harm our current and future performance.

Because there is generally no established market in which to value our investments, our Valuation Committee's value determinations may differ materially from the values that a ready market or third party would attribute to these investments.

There is generally no public market for the private equity securities in which we invest. Pursuant to the requirements of the 1940 Act, we value all of the privately held equity and debt securities in our portfolio at fair value as determined in good faith by the Valuation Committee, a committee made up of all of the independent members of our Board of Directors, pursuant to Valuation Procedures established by the Board of Directors. Determining fair value requires that judgment be applied to the specific facts and circumstances of each portfolio investment pursuant to specified valuation principles and processes. We are required by the 1940 Act to value specifically each individual investment on a quarterly basis and record unrealized depreciation for an investment that we believe has become impaired. Conversely, we must record unrealized appreciation if we believe that a security has appreciated in value. Our valuations, although stated as a precise number, are necessarily within a range of values that vary depending on the significance attributed to the various factors being considered.

We use the Black-Scholes-Merton option-pricing model to determine the fair value of warrants held in our portfolio. Option pricing models, including the Black-Scholes-Merton model, require the use of subjective input assumptions, including expected volatility, expected life, expected dividend rate, and expected risk-free rate of return. In the Black-Scholes-Merton model, variations in the expected volatility or expected term assumptions have a significant impact on fair value. Because the securities underlying the warrants in our portfolio are not publicly traded, many of the required input assumptions are more difficult to estimate than they would be if a public market for the underlying securities existed.

Without a readily ascertainable market value and because of the inherent uncertainty of valuation, the fair value that we assign to our investments may differ from the values that would have been used had an efficient market existed for the investments, and the difference could be material. Any changes in fair value are recorded in our Consolidated Statement of Operations as a change in the "Net (decrease) increase in unrealized appreciation on investments."



In the venture capital industry, even when a portfolio of early-stage, high-technology venture capital investments proves to be profitable over the portfolio's lifetime, it is common for the portfolio's value to undergo a so-called "J-curve" valuation pattern. This means that when reflected on a graph, the portfolio's valuation would appear in the shape of the letter "J," declining from the initial valuation prior to increasing in valuation. This J-curve valuation pattern results from write-downs and write-offs of portfolio investments that appear to be unsuccessful, prior to write-ups for portfolio investments that prove to be successful. Because early-stage small businesses typically have negative cash flow and are by their nature inherently fragile, a valuation process can more readily substantiate a loss of value than an increase in value. Even if our venture capital investments prove to be profitable in the long run, such J-curve valuation patterns could have a significant adverse effect on our net asset value per share and the value of our common stock in the interim. Over time, as we continue to make additional nanotechnology investments, this J-curve pattern may be less relevant for our portfolio as a whole, because the individual J-curves for each investment, or series of investments, may overlap with previous investments at different stages of their J-curves.

**Changes in valuations of our privately held, early-stage small businesses tend to be more volatile than changes in prices of established, more mature publicly traded securities.**

Investments in privately held, early- and mid-stage small businesses may be inherently more volatile than investments in more mature businesses. Such immature businesses are inherently fragile and easily affected by both internal and external forces. Our investee companies can lose much or all of their value suddenly in response to an internal or external adverse event. Conversely, these immature small businesses can gain suddenly in value in response to an internal or external positive development. Moreover, because of the lack of daily pricing mechanisms, our ownership interests in such investments are generally valued only at quarterly intervals by our Valuation Committee. Thus, changes in valuations from one valuation point to another may be larger than changes in valuations of marketable securities that are revalued in the marketplace much more frequently, in some highly liquid cases, virtually continuously. Although we carefully monitor each of our portfolio companies, information pertinent to our portfolio companies is not always known immediately by us, and, therefore, its availability for use in determining value may not always coincide with the timeframe of our valuations required by the federal securities laws.

**We expect to continue to experience material write-downs of securities of portfolio companies.**

Write-downs of securities of our privately held companies have always been a by-product and risk of our business. We expect to continue to experience material write-downs of securities of privately held portfolio companies. Write-downs of such companies occur at all stages of their development. Such write-downs may increase in dollar terms, frequency and as a percentage of our net asset value as our dollar investment activity in privately held companies continues to increase, and the number of such holdings in our portfolio continues to grow. If the average size of each of our investments in nanotechnology increases, the average size of our write-downs may also increase.

**Unfavorable regulatory changes could impair our ability to engage in liquidity events and dampen our returns.**

We rely on the ability to generate realized returns on our investments through liquidity events such as IPOs and merger and acquisition transactions. Recent government reforms affecting publicly traded companies, stock markets, investment banks and securities research practices have made it more difficult for privately held companies to complete successful IPOs of their equity securities, and such reforms have increased the expense and legal exposure of being a public company.

When companies in which we have invested as private entities complete IPOs of their securities, these newly issued securities are by definition unseasoned issues. Unseasoned issues tend to be highly volatile and have uncertain liquidity, which may negatively affect their price. In addition, we are typically subject to lock-up provisions that prohibit us from selling our investments into the public market for specified periods of time after IPOs. The market price of securities that we hold may decline substantially before we are able to sell these securities. Government reforms that affect the trading of securities in the United States have made market-making activities by broker-dealers less profitable, which has caused broker-dealers to reduce their market-making activities, thereby making the market for unseasoned stocks less liquid than they might be otherwise.

In addition, the structural changes in the public markets that currently value near-term cash flows and predictable revenues versus long-term prospects for growth, and the regulatory burden imposed on publicly traded companies by governments worldwide, have reduced the appetite for some of our portfolio companies to pursue IPOs or other steps that would increase the liquidity of our ownership in these portfolio companies. This trend may lengthen the time that our portfolio companies remain as privately held entities in our portfolio, and our returns on these investments may be dampened by the need or choice to seek monetization of such illiquid assets.

An inability to generate realized returns on our investments could negatively affect our liquidity, our reinvestment rate in new and follow-on investments and the value of our investment portfolio.

**We are subject to risks associated with our strategy of increasing assets under management by raising third-party funds to manage.**

We have announced our strategy to grow assets under management by raising one or more third-party funds to manage. It is possible that we will invest our capital alongside or through these funds in portfolio companies. These funds may be focused on investing in nanotechnology-enabled companies, or specific sectors such as life sciences, energy and electronics that are enabled by nanotechnology. It is also possible these funds will also invest in companies in each of these sectors that are not directly enabled by nanotechnology. We will not change our nanotechnology focus without giving shareholders 60 days notice. There is no assurance when and if we will be able to raise such fund(s) or,



if raised, whether they will be successful.

Our executive officers and employees, in their capacity as the investment advisor of a fund, may manage other investment funds in the same or a related line of business as we do. Accordingly, they may have obligations to such other entities, the fulfillment of which obligations may not be in the best interests of us or our shareholders.

**Our shares of common stock are trading at a discount from net asset value and may continue do so in the future.**

Shares of closed-end investment companies have frequently traded at a market price that is less than the net asset value that is attributable to those shares. In part as a result of adverse economic conditions and increasing pressure within the financial sector of which we are a part, our common stock traded below our net asset value per share during some periods in 2010 and consistently throughout 2011 and 2012. Our common stock may continue to trade at a discount to net asset value in the future. The possibility that our shares of common stock may trade at a discount from net asset value over the long term is separate and distinct from the risk that our net asset value will decrease. We cannot predict whether shares of our common stock will trade above, at or below our net asset value. On December 31, 2012, our stock closed at \$3.30 per share, a discount of \$0.83, or 20.1 percent, to our net asset value per share of \$4.13 as of December 31, 2012. On March 14, 2013, our stock closed at \$3.70 per share, a discount of \$0.43, or 10.4 percent, to our net asset value per share as of December 31, 2012.

**Because we do not choose investments based on a strategy of diversification, nor do we rebalance the portfolio should one or more investments increase in value substantially relative to the rest of the portfolio, the value of our portfolio is subject to greater volatility than the value of companies with more broadly diversified investments.**

We do not choose investments based on a strategy of diversification. We also do not rebalance the portfolio should one of our portfolio companies increase in value substantially relative to the rest of the portfolio. Therefore, the value of our portfolio may be more vulnerable to events affecting a single sector or industry and, therefore, subject to greater volatility than a company that follows a diversification strategy. Accordingly, an investment in our common stock may present greater risk to you than an investment in a diversified company.

We are dependent upon key management personnel for future success, and may not be able to retain them.

We are dependent upon the diligence and skill of our senior management and other key advisors for the selection, structuring, closing and monitoring of our investments. We utilize lawyers, and we utilize outside consultants to assist us in conducting due diligence when evaluating potential investments. There is generally no publicly available information about the companies in which we invest, and we rely significantly on the diligence of our employees and advisors to obtain information in connection with our investment decisions. Our future success, to a significant extent,

depends on the continued service and coordination of our senior management team. The departure of any of our senior management or key advisors could materially adversely affect our ability to implement our business strategy. We do not maintain for our benefit any key-man life insurance on any of our officers or employees.

**Our failure to make follow-on investments in our portfolio companies could impair the value of our portfolio.**

Following an initial investment in a portfolio company, we may make additional investments in that portfolio company as "follow-on" investments, in order to: (1) increase or maintain in whole or in part our ownership percentage; (2) exercise warrants, options or convertible securities that were acquired in the original or subsequent financing; or (3) attempt to preserve or enhance the value of our investment.

We may elect not to make follow-on investments or lack sufficient funds to make such investments. We have the discretion to make any follow-on investments, subject to the availability of capital resources. The failure to make a follow-on investment may, in some circumstances, jeopardize the continued viability of a portfolio company and our initial investment, or may result in a missed opportunity for us to increase our participation in a successful operation, or may cause us to lose some or all preferred rights pursuant to "pay-to-play" provisions that have become common in venture capital transactions. These provisions require proportionate investment in subsequent rounds of financing in order to preserve preferred rights such as anti-dilution protection, liquidation preferences and preemptive rights to invest in future rounds of financing. Even if we have sufficient capital to make a desired follow-on investment, we may elect not to make a follow-on investment because we may not want to increase our concentration of risk, because we prefer other opportunities or because we are inhibited by compliance with BDC requirements or the desire to maintain our tax status.

Bank borrowing or the issuance of debt securities or preferred stock by us, to fund investments in portfolio companies or to fund our operating expenses, would make our total return to common shareholders more volatile.

Use of debt or preferred stock as a source of capital entails two primary risks. The first is the risk of leverage, which is the use of debt to increase the pool of capital available for investment purposes. The use of debt leverages our available common equity capital, magnifying the impact on net asset value of changes in the value of our investment portfolio. For example, a BDC that uses 33 percent leverage (that is, \$50 of leverage per \$100 of common equity) will show a 1.5 percent increase or decline in net asset value for each one percent increase or decline in the value of its total assets. The second risk is that the cost of debt or preferred stock financing may exceed the return on the assets the proceeds are used to acquire, thereby diminishing rather than enhancing the return to common shareholders. If we issue preferred shares or debt, the common shareholders would bear the cost of this leverage. To the extent that we utilize debt or preferred stock financing for any purpose, these two risks would likely make our total return to common shareholders more volatile. In addition, we might be required to sell investments, in order to meet dividend, interest or principal payments, when it might be disadvantageous for us to do so.

As provided in the 1940 Act and subject to some exceptions, we can issue debt or preferred stock so long as our total assets immediately after the issuance, less some ordinary course liabilities, exceed 200 percent of the sum of the debt and any preferred stock outstanding. The debt or preferred stock may be convertible in accordance with SEC guidelines, which might permit us to obtain leverage at more attractive rates. The requirement under the 1940 Act to pay, in full, dividends on preferred shares or interest on debt before any dividends may be paid on our common stock means that dividends on our common stock from earnings may be reduced or eliminated. An inability to pay dividends on our common stock could conceivably result in our ceasing to qualify as a RIC under the Code, which would, in most circumstances, be materially adverse to the holders of our common stock.

On February 24, 2011, we established a \$10 million three-year revolving credit facility with TD Bank, N.A., to be used in conjunction with our investments in venture debt. As of December 31, 2012, we had no debt outstanding pursuant to this facility, and we did not have any preferred stock outstanding. We may in the future establish a credit facility in conjunction with our private venture capital equity investments.

On June 8, 2012, legislation was introduced in the U.S. House of Representatives intended to revise certain regulations applicable to BDCs. The legislation, among other things, provides for increasing the amount of funds BDCs may borrow by reducing asset to debt limitations from 2:1 to 3:2. As a result, we may be able to incur additional indebtedness in the future and therefore your risk of an investment in shares of our common stock may increase.

**We may expose ourselves to risks if we engage in hedging transactions.**

If we engage in hedging transactions, we may expose ourselves to risks associated with such transactions. We may utilize instruments such as forward contracts, currency options and interest rate swaps, caps, collars and floors to seek to hedge against fluctuations in the relative values of our portfolio positions from changes in market conditions, currency exchange rates and market interest rates. Hedging against a decline in the values of our portfolio positions does not eliminate the possibility of fluctuations in the values of such positions or prevent losses if the values of such positions decline. However, such hedging can establish other positions designed to gain from those same developments, thereby offsetting the decline in the value of such portfolio positions. Such hedging transactions may also limit the opportunity for gain if the values of the underlying portfolio positions should increase. It may not be possible to hedge against an exchange rate or interest rate fluctuation that is so generally anticipated that we are not able to enter into a hedging transaction at an acceptable price. Moreover, for a variety of reasons, we may not seek to establish a perfect correlation between such hedging instruments and the portfolio holdings being hedged. Any such imperfect correlation may prevent us from achieving the intended hedge and expose us to risk of loss. In addition, it may not be possible to hedge fully or perfectly against currency fluctuations affecting the value of securities denominated in non-U.S. currencies because the value of those securities is likely to fluctuate as a result of factors not related to currency fluctuations.



**We are authorized to issue preferred stock, which would convey special rights and privileges to its owners senior to those of common stock shareholders.**

We are currently authorized to issue up to 2,000,000 shares of preferred stock, under terms and conditions determined by our Board of Directors. These shares would have a preference over our common stock with respect to dividends and liquidation. The statutory class voting rights of any preferred shares we would issue could make it more difficult for us to take some actions that might, in the future, be proposed by the Board and/or holders of common stock, such as a merger, exchange of securities, liquidation or alteration of the rights of a class of our securities, if these actions were perceived by the holders of the preferred shares as not in their best interests. The issuance of preferred shares convertible into shares of common stock might also reduce the net income and net asset value per share of our common stock upon conversion.

**Loss of status as a RIC could reduce our net asset value and distributable income.**

We have elected to qualify, have qualified and currently intend to continue to qualify as a RIC under the Code. As a RIC, we do not have to pay federal income taxes on our income (including realized gains) that is distributed to our shareholders. Accordingly, we are not permitted under accounting rules to establish reserves for taxes on our unrealized capital gains. If we failed to qualify for RIC status in 2012 or beyond, we would be taxed in the same manner as an ordinary corporation and distributions to our shareholders would not be deductible in computing our taxable income, which could materially adversely impact the amount of cash available for distribution to our shareholders. In addition, to the extent that we had unrealized appreciation, we would have to establish reserves for taxes, which would reduce our net asset value, accordingly. To qualify again to be taxed as a RIC in a subsequent year, we would be required to distribute to our shareholders our earnings and profits attributable to non-RIC years, reduced by an interest charge on 50 percent of such earnings and profits, which charge would be payable by us to the IRS. In addition, if we failed to qualify as a RIC for a period greater than two taxable years, then, in order to qualify as a RIC in a subsequent year, we would be required to elect to recognize and pay tax on any net built-in gain in our assets (the excess of aggregate gain, including items of income, over aggregate loss that would have been realized if we had sold our assets to an unrelated party for fair market value) or, alternatively, be subject to taxation on such built-in gain recognized for a period of 10 years.

**A deemed dividend election would affect the value of our stock.**

If we, as a RIC, decide to make a deemed distribution of realized net capital gains and retain the net realized capital gains for any taxable year, also referred to as a deemed dividend, we would have to establish appropriate reserves for taxes that we would have to pay on behalf of shareholders. It is possible that establishing reserves for taxes could have a material adverse effect on the value of our common stock. Additionally, if we decide to make a deemed distribution and changes in tax law occur that would increase the dividend tax rates for individuals and corporations, the net benefit to shareholders from a deemed distribution could be adversely affected. Such changes, therefore, could reduce

the overall benefit to our shareholders from our status as a RIC.



We operate in a heavily regulated environment, and changes to, or non-compliance with, regulations and laws could harm our business.

We are subject to substantive SEC regulations as a BDC. Securities and tax laws and regulations governing our activities may change in ways adverse to our and our shareholders' interests, and interpretations of these laws and regulations may change with unpredictable consequences. Any change in the laws or regulations that govern our business could have an adverse impact on us or on our operations. Changing laws, regulations and standards relating to corporate governance, valuation, public disclosure and market regulation, including the Sarbanes-Oxley Act of 2002 and the Dodd Frank Act, new SEC regulations, new federal accounting standards and Nasdaq Stock Market rules, create additional expense and uncertainty for publicly traded companies in general, and for BDCs in particular. These new or changed laws, regulations and standards are subject to varying interpretations in many cases because of their lack of specificity, and as a result, their application in practice may evolve over time, which may well result in continuing uncertainty regarding compliance matters and higher costs necessitated by ongoing revisions to disclosure and governance practices.

We are committed to maintaining high standards of corporate governance and public disclosure. As a result, our efforts to comply with evolving laws, regulations and standards have and will continue to result in increased general and administrative expenses and a diversion of management time and attention from revenue-generating activities to compliance activities. If our efforts to comply with new or changed laws, regulations and standards differ from the activities intended by regulatory or governing bodies, our reputation may be harmed. This increased regulatory burden is causing us to incur significant additional expenses and is time consuming for our management, which could have a material adverse effect on our financial performance.

**Market prices of our common stock will continue to be volatile.**

We expect that the market price of our common stock price will continue to be volatile. The price of the common stock may be higher or lower than the price you pay for your shares, depending on many factors, some of which are beyond our control and may not be directly related to our operating performance. These factors include the following:

- stock market and capital markets conditions;

• internal developments in our Company with respect to our personnel, financial condition and compliance with all applicable regulations;

- announcements regarding any of our portfolio companies;

announcements regarding developments in the nanotechnology, energy, electronics or healthcare-related fields in general;

- environmental and health concerns regarding nanotechnology, whether real or perceptual;

announcements regarding government funding and initiatives related to the development of nanotechnology, energy, electronics or healthcare-related products;

- a mismatch between the long-term nature of our business and the short-term focus of many investors;

significant volatility in the market price and trading volume of securities of regulated investment companies, business development companies or other financial services companies;

changes in regulatory policies or tax guidelines with respect to regulated investment companies or business development companies; general economic conditions and trends; and/or

- departures of key personnel.

We will not have control over many of these factors, but expect that our stock price may be influenced by them. As a result, our stock price may be volatile, and you may lose all or part of your investment. 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. Due to the potential volatility of our stock price, we may therefore be the target of securities litigation in the future. Securities litigation could result in substantial costs and divert management's attention and resources from our business.

**Quarterly results fluctuate and are not indicative of future quarterly performance.**

Our quarterly operating results fluctuate as a result of a number of factors. These factors include, among others, variations in and the timing of the recognition of realized and unrealized gains or losses, the degree to which we and our portfolio companies encounter competition in our markets and general economic and capital markets conditions. As a result of these factors, results for any one quarter should not be relied upon as being indicative of performance in future quarters.

To the extent that we do not realize income or choose not to retain after-tax realized capital gains, we will have a greater need for additional capital to fund our investments and operating expenses.

As a RIC, we must annually distribute at least 90 percent of our investment company taxable income as a dividend and may either distribute or retain our realized net capital gains from investments. As a result, these earnings may not be available to fund investments. If we fail to generate net realized capital gains or to obtain funds from outside sources, it would have a material adverse effect on our financial condition and results of operations as well as our ability to make follow-on and new investments. Because of the structure and objectives of our business, we generally expect to experience net operating losses and rely on proceeds from sales of investments and investment income from our venture debt to defray a significant portion of our operating expenses. Investment sales are unpredictable and may not occur. In addition, as a BDC, we are generally required to maintain a ratio of at least 200 percent of total assets to total borrowings and preferred stock, which may restrict our ability to borrow to fund these requirements. Lack of capital could curtail our investment activities or impair our working capital.

Investment in foreign securities could result in additional risks.

We may invest in foreign securities, and we currently have one investment in a foreign security. When we invest in securities of foreign issuers, we may be subject to risks not usually associated with owning securities of U.S. issuers. These risks can include fluctuations in foreign currencies, foreign currency exchange controls, social, political and economic instability, differences in securities regulation and trading, expropriation or nationalization of assets and foreign taxation issues. In addition, changes in government administrations or economic or monetary policies in the

United States or abroad could result in appreciation or depreciation of our securities and could favorably or unfavorably affect our operations. It may also be more difficult to obtain and enforce a judgment against a foreign issuer. Any foreign investments made by us must be made in compliance with U.S. and foreign currency restrictions and tax laws restricting the amounts and types of foreign investments.

Although most of our investments are denominated in U.S. dollars, our investments that are denominated in a foreign currency are subject to the risk that the value of a particular currency may change in relation to the U.S. dollar, in which currency we maintain financial statements and valuations. Among the factors that may affect currency values are trade balances, the level of short-term interest rates, differences in relative values of similar assets in different currencies, long-term opportunities for investment and capital appreciation and political developments.

Investing in our stock is highly speculative and an investor could lose some or all of the amount invested.

Our investment objective and strategies result in a high degree of risk in our investments and may result in losses in the value of our investment portfolio. Our investments in small businesses are highly speculative and, therefore, an investor in our common stock may lose his or her entire investment. The value of our common stock may decline and may be affected by numerous market conditions, which could result in the loss of some or all of the amount invested in our common stock. The securities markets frequently experience extreme price and volume fluctuations that affect market prices for securities of companies in general, and technology and very small capitalization companies in particular. Because of our focus on the technology and very small capitalization sectors, and because we are a very small capitalization company ourselves, our stock price is especially likely to be affected by these market conditions. General economic conditions, and general conditions in nanotechnology and in the semiconductor and information technology, life sciences, materials science and other high-technology industries, including energy, may also affect the price of our common stock.

**Our strategy of writing covered calls and buying put options on public portfolio company securities held by us could result in us receiving a lower return for such investments than if we had not employed such strategy.**

There are several risks associated with transactions in options on securities. For example, there are significant differences between the securities and options markets that could result in an imperfect correlation between these markets, causing a given transaction not to achieve its objectives. A decision as to whether, when and how to use options involves the exercise of skill and judgment, and even a well-conceived transaction may be unsuccessful to some degree because of market behavior or unexpected events. As the writer of a covered call option, the Company forgoes, during the option's life, the opportunity to profit from increases in the market value of the security covering the call option above the sum of the premium and the strike price of the call, but has retained the risk of loss should the price of the underlying security decline. The writer of an option has no control over the time when it may be required to fulfill its obligation as a writer of the option. Once an option writer has received an exercise notice, it cannot effect a closing purchase transaction in order to terminate its obligation under the option and must deliver the underlying security at the exercise price.

As the buyer of a put option, we may incur losses if the price per share of the underlying stock to that option is above the strike price of the put option at the time of expiration, which would result in our put option expiring without value. Such expiration would reduce our overall returns on our investment in those publicly traded securities once they are

sold.

33

**The Board of Directors intends to grant restricted stock pursuant to the Company's Equity Incentive Plan. These equity awards may have a dilutive effect on existing shareholders.**

In accordance with the Company's Equity Incentive Plan, the Company's Board of Directors plans to grant equity awards in the form of restricted stock from time to time for up to 10 percent of the total shares of stock issued and outstanding. Issuance of shares of restricted stock results in existing shareholders owning a smaller percentage of the shares outstanding.

You have no right to require us to repurchase your shares.

You do not have the right to require us to repurchase your shares of common stock.

**Future sales of our common stock in the public market could cause our stock price to fall.**

Sales of a substantial number of shares of our common stock in offerings, such as follow-on public offerings, registered direct or PIPE transactions, or rights offerings, or the perception that these sales might occur, could depress the market price of our common stock and could impair our ability to raise capital through the sale of additional equity securities.

**Item 1B. Unresolved Staff Comments.**

None.

**Item 2. Properties.**

The Company maintains its offices at 1450 Broadway, New York, New York 10018, where it leases approximately 6,900 square feet of office space pursuant to a lease agreement expiring on December 31, 2019. (See "Note 11. Commitments and Contingencies" contained in "Item 8. Consolidated Financial Statements and Supplementary Data.")

On July 1, 2008, we signed a five-year lease for approximately 2,290 square feet of office space at 420 Florence Street, Suite 200, Palo Alto, California 94301, commencing on August 1, 2008, and expiring on August 31, 2013. We currently sublet all 2,290 square feet of this office space. We have no plans to extend this lease beyond August 31, 2013.

We believe that our office facilities are suitable and adequate for our business as it is contemplated to be conducted.



**Item 3. Legal Proceedings.**

The Company is not currently a party to any legal proceedings.

**Item 4. Mine Safety Disclosures.**

Not applicable.

**PART II****Item 5. Market for Registrant's Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities.****Market Information**

Our common stock is traded on the Nasdaq Global Market under the symbol "TINY." The following table sets forth the range of the high and low sales price of the Company's shares during each quarter of the last two fiscal years and the closing share price as a percentage of net asset value, as reported by Nasdaq Global Market. The quarterly stock prices quoted represent interdealer quotations and do not include markups, markdowns or commissions.

| Quarter Ended      | Market Price |        | Net Asset Value<br>("NAV") Per<br>Share at End of<br>Period | Premium or (Discount) as<br>a % of NAV |    |       |    |
|--------------------|--------------|--------|---|--|----|-------|----|
|                    | High         | Low    |   | High                                   |    | Low   |    |
| March 31, 2012     | \$4.70       | \$3.44 | \$ 4.89   | (3.9                                   | )% | (29.7 | )% |
| June 30, 2012      | \$4.47       | \$2.98 | \$ 4.88   | (8.4                                   | )% | (38.9 | )% |
| September 30, 2012 | \$4.25       | \$3.53 | \$ 4.78   | (11.1                                  | )% | (26.2 | )% |
| December 31, 2012  | \$3.97       | \$3.05 | \$ 4.13   | (3.9                                   | )% | (26.2 | )% |
| March 31, 2011     | \$6.30       | \$4.27 | \$ 4.73   | 33.2                                   | %  | (9.7  | )% |
| June 30, 2011      | \$5.92       | \$4.85 | \$ 5.43   | 9.0                                    | %  | (10.7 | )% |
| September 30, 2011 | \$5.58       | \$3.45 | \$ 4.38   | 27.4                                   | %  | (21.2 | )% |
| December 31, 2011  | \$4.15       | \$3.17 | \$ 4.70   | (11.7                                  | )% | (32.6 | )% |

Historically, our shares of common stock have traded at times at a discount and at other times at a premium to net asset value. The last reported price for our common stock on December 31, 2012, was \$3.30 per share, which was a 20.1 percent discount to our net asset value of \$4.13 as of December 31, 2012.

**Shareholders**

As of March 11, 2012, there were approximately 125 holders of record and approximately 15,929 beneficial owners of the Company's common stock.



## Dividends

We did not pay a cash dividend or declare a deemed dividend for 2012 or 2011. For more information about deemed dividends, please refer to the discussion under "Tax Status."

## Securities Authorized for Issuance Under Equity Compensation Plans

## EQUITY COMPENSATION PLAN INFORMATION

As of December 31, 2012

| Plan Category  | Number of securities to be issued upon exercise of outstanding options, warrants and rights <sup>(1)</sup> | Weighted-average exercise price of outstanding options, warrants and rights | Number of securities remaining available for future issuance under equity compensation plans (excluding securities reflected in Column (a)) |
|--|--|---|---|
|  | (a)  | (b)   | (c)   |
| Equity compensation plans approved by security holders     | 1,425,372  | \$ 9.77   | (2)   |
| Equity compensation plans not approved by security holders | -  | -   | -   |
| <b>TOTAL</b>   | <b>1,425,372</b>   | <b>\$ 9.77</b>  | <b>(2)</b>  |

<sup>(1)</sup> Represents shares subject to options.

<sup>(2)</sup> The Amended and Restated Harris & Harris Group, Inc. 2012 Equity Incentive Plan (the "Stock Plan") permits the issuance of stock options and restricted stock in an aggregate amount of up to 20 percent of our issued and outstanding common stock (the "Plan Maximum Shares") as of the effective date of the Stock Plan (June 7, 2012). Under the Stock Plan, all of the Plan Maximum Shares are available for grants of stock options, and half of the Plan Maximum Shares (up to 10 percent of our issued and outstanding common stock as of the effective date of the Stock Plan) is available for grants of restricted stock. As of December 31, 2012, there were 3,158,748 shares remaining available for issuance

under the Stock Plan, 1,495,688 of which were available for grant in the form of restricted stock. If any shares subject to an award granted under the Stock Plan are forfeited, cancelled, exchanged or surrendered, or if an award terminates or expires without a distribution of shares, those shares will again be available for awards under the Stock Plan.

### **Performance Graph**

The graph below compares the cumulative five-year total return of holders of the Company's common stock with the cumulative total returns of the Nasdaq Composite index and the Nasdaq Financial index. We chose broader indices for comparison because we make investments in multiple industries, and we do not believe there is an appropriate index of companies with an investment strategy similar to our own with which to compare the return on our common stock. The graph assumes that the value of the investment in the Company's common stock and in each of the indexes (including reinvestment of dividends) was \$100 on December 31, 2007, and tracks it through December 31, 2012.

|                             | 12/07  | 12/08 | 12/09 | 12/10 | 12/11 | 12/12  |
|-----------------------------|--------|-------|-------|-------|-------|--------|
| Harris & Harris Group, Inc. | 100.00 | 44.94 | 51.99 | 49.83 | 39.36 | 37.54  |
| NASDAQ Composite            | 100.00 | 59.03 | 82.25 | 97.32 | 98.63 | 110.78 |
| NASDAQ Financial            | 100.00 | 68.75 | 68.83 | 78.70 | 71.63 | 83.81  |

*The stock price performance included in this graph is not necessarily indicative of future stock price performance.*

*Source: Research Data Group, Inc.*

### **Stock Transfer Agent**

American Stock Transfer & Trust Company, 59 Maiden Lane, New York, New York 10038 (Telephone 800-937-5449, Attention: Ms. Jennifer Donovan) serves as our transfer agent. Certificates to be transferred should be mailed directly to the transfer agent, preferably by registered mail.

**Item 6. Selected Financial Data.**

The information below was derived from the audited Consolidated Financial Statements included in this report and in previous annual reports filed with the SEC. This information should be read in conjunction with those Consolidated Financial Statements and Supplementary Data and the notes thereto. These historical results are not necessarily indicative of the results to be expected in the future.

**Financial Position as of December 31:**

|  | 2012          | 2011          | 2010          | 2009          | 2008          |
|--|---------------|---------------|---------------|---------------|---------------|
| Total assets                                 | \$131,990,250 | \$150,343,653 | \$149,289,168 | \$136,109,101 | \$111,627,601 |
| Total liabilities                            | \$3,553,476   | \$4,645,246   | \$2,435,256   | \$1,950,843   | \$2,096,488   |
| Net assets <sup>1</sup>                      | \$128,436,774 | \$145,698,407 | \$146,853,912 | \$134,158,258 | \$109,531,113 |
| Net asset value per outstanding share        | \$4.13        | \$4.70        | \$4.76        | \$4.35        | \$4.24        |
| Cash dividends paid                          | \$0.00        | \$0.00        | \$0.00        | \$0.00        | \$0.00        |
| Cash dividends paid per outstanding share    | \$0.00        | \$0.00        | \$0.00        | \$0.00        | \$0.00        |
| Shares outstanding, end of year <sup>1</sup> | 31,116,881    | 31,000,601    | 30,878,164    | 30,859,593    | 25,859,573    |

**Operating Data for Year Ended December 31:**

|                             | 2012           | 2011           | 2010           | 2009           | 2008           |
|-----------------------------|----------------|----------------|----------------|----------------|----------------|
| Total investment income     | \$722,227      | \$702,765      | \$446,038      | \$247,848      | \$1,987,347    |
| Total expenses <sup>2</sup> | \$9,525,570    | \$9,041,130    | \$8,001,845    | \$9,009,063    | \$12,674,498   |
| Net operating loss          | \$(8,803,343 ) | \$(8,338,365 ) | \$(7,555,807 ) | \$(8,761,215 ) | \$(10,687,151) |
| Total tax expense (benefit) | \$15,236       | \$6,922        | \$4,461        | \$(753 )       | \$34,121       |

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

|   |                |               |               |                |                |
|---|----------------|---------------|---------------|----------------|----------------|
| Net realized gain (loss) income from investments  | \$2,406,433    | \$2,449,705   | \$(3,740,518) | \$(11,105,577) | \$(8,323,634)  |
| Net (decrease) increase in unrealized appreciation on investments                         | \$(13,589,990) | \$2,347,297   | \$21,883,175  | \$19,718,327   | \$(30,170,712) |
| Net (decrease) increase in net assets resulting from operations                           | \$(19,986,900) | \$(3,541,363) | \$10,586,850  | \$(148,465)    | \$(49,181,497) |
| (Decrease) increase in net assets resulting from operations per average outstanding share | \$(0.65)       | \$(0.12)      | \$0.34        | \$(0.01)       | \$(1.99)       |

<sup>1</sup> We completed offerings of our common stock as follows: 0 shares in each of 2012, 2011 and 2010; 4,887,500 shares in 2009; and 2,545,000 shares in 2008.

<sup>2</sup> Included in total expenses is non-cash, stock-based compensation expense of \$2,928,943 in 2012; \$1,894,800 in 2011; \$2,088,091 in 2010; \$3,089,520 in 2009; and \$5,965,769 in 2008.



## Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations.

The information contained in this section should be read in conjunction with the Company's 2012 Consolidated Financial Statements and notes thereto.

### Cautionary Statement Regarding Forward-Looking Statements

This Annual Report on Form 10-K contains forward-looking statements that involve substantial risks and uncertainties. These forward-looking statements are not historical facts, but rather are based on current expectations, estimates and projections about the Company, our current and prospective portfolio investments, our industry, our beliefs, and our assumptions. Words such as "anticipates," "expects," "intends," "plans," "will," "may," "continue," "believes," "seeks," "estimates," "would," "could," "should," "targets," "projects," and variations of these words and similar expressions are intended to identify forward-looking statements. The forward-looking statements contained in this Annual Report involve risks and uncertainties, including statements as to:

- our future operating results;
- our business prospects and the prospects of our portfolio companies;
- the impact of investments that we expect to make;
- our contractual arrangements and relationships with third parties;
- the dependence of our future success on the general economy and its impact on the industries in which we invest;
- the ability of our portfolio companies to achieve their objectives;
- our expected financings and investments;
- the adequacy of our cash resources and working capital; and
- the timing of cash flows, if any, from the operations and/or monetization of our positions in our portfolio companies.

These statements are not guarantees of future performance and are subject to risks, uncertainties, and other factors, some of which are beyond our control and difficult to predict and could cause actual results to differ materially from those expressed or forecasted in the forward-looking statements, including without limitation:

an economic downturn could impair our portfolio companies' ability to continue to operate, which could lead to the loss of some or all of our investments in such portfolio companies;

a contraction of available credit and/or an inability to access the equity markets could impair our investment activities;

interest rate volatility could adversely affect our results, particularly if we elect to use leverage as a material part of our investment strategy;

currency fluctuations could adversely affect the results of our investments in foreign companies, particularly to the extent that we receive payments denominated in foreign currency rather than U.S. dollars; and

the risks, uncertainties and other factors we identify in "Risk Factors" and elsewhere in this Annual Report on Form 10-K and in our other filings with the SEC.

Although we believe that the assumptions on which these forward-looking statements are based are reasonable, any of those assumptions could prove to be inaccurate, and as a result, the forward-looking statements based on those assumptions also could be inaccurate. Important assumptions include our ability to originate new investments, certain margins and levels of profitability and the availability of additional capital. In light of these and other uncertainties, the inclusion of a projection or forward-looking statement in this Annual Report on Form 10-K should not be regarded as a representation by us that our plans and objectives will be achieved. These risks and uncertainties include those described or identified in "Risk Factors" and elsewhere in this Annual Report on Form 10-K. You should not place undue reliance on these forward-looking statements, which apply only as of the date of this Annual Report on Form 10-K.

## **Background and Overview**

We incorporated under the laws of the state of New York in August 1981. In 1983, we completed an IPO. In 1984, we divested all of our assets except Otisville BioTech, Inc., and became a financial services company with the investment in Otisville as the initial focus of our business activity.

In 1992, we registered as an investment company under the 1940 Act, commencing operations as a closed-end, non-diversified investment company. In 1995, we elected to become a BDC subject to the provisions of Sections 55 through 65 of the 1940 Act.

We believe we provide five core benefits to our shareholders. First, we are an established firm with a positive track record of investing in venture capital-backed companies. Second, we provide shareholders with access to disruptive science-enabled companies, particularly ones that are enabled by nanotechnology that would otherwise be difficult to access or inaccessible for most current and potential shareholders. Third, we have an existing portfolio of companies at varying stages of maturity that provide for a potential pipeline of investment returns over time. Fourth, we are able to invest opportunistically in a range of types of securities to take advantage of market inefficiencies. Fifth, we provide access to venture capital investments in a vehicle that, unlike private venture capital firms, is both transparent and liquid.

We are an early-stage, active investor in transformative companies. We make venture capital investments in companies enabled by multi-disciplinary, scientific innovations, particularly those enabled by nanotechnology and microsystems. We define venture capital investments as the money and resources made available to privately held and publicly traded small businesses with exceptional growth potential. Nanotechnology and microsystems are technologies that allow for the characterization, design, manipulation and manufacture of materials and systems on the molecular and micro levels, respectively.

We believe companies that leverage scientific innovations, particularly those at the nanoscale, are emerging as leaders in their respective industry sectors. These industry sectors include life sciences, energy and electronics. Innovations within each sector often have very different, sometimes unexpected, origins. The knowledge of core domains within each of these industry sectors can be augmented by exposure to the adjacent or even entirely "*white-field*" multi-disciplinary technology domains including: nanoscale materials, novel analytical instrumentation and manufacturing tools, ultrafast computational and modeling capabilities, high-function mobile devices, high-speed wireless data transfer and high-density, long-lasting and renewable sources of energy. Our investment team has the ability to identify and invest in such domains.

We believe that as the impact of scientific innovation, and particularly nanotechnology, occurs, our portfolio companies are well positioned to profit and that we will see investment returns as a result.

We consider a company to fit our investment thesis if the company employs, or intends to employ, science-enabled technologies, particularly those that we consider to be at the microscale or smaller, and if the employment of that technology is material to its business plan. By making these investments, we seek to provide our shareholders with a portfolio of venture capital investments that address a variety of industries, markets and products leveraging science-related innovations, particularly in nanotechnology and microsystems.

## *Industry Sector Overview*

### Life Sciences

We classify companies in our life sciences portfolio as those that address problems in life sciences-related industries, including biotechnology, agriculture, advanced materials and chemicals, diagnostics, healthcare, bioprocessing, water, industrial biotechnology, food, nutrition and energy. We historically referred to our life sciences portfolio using the term "healthcare." We believe "life sciences" is a more appropriate term to describe this portion of our portfolio owing to the scope of applications for life sciences-related companies and technologies outside of traditional healthcare markets, including agriculture, food and industrial biotechnology.

We are living through an unprecedented rate of change in our understanding of biological systems and the ability to manipulate the fundamental building blocks of nature. Novel, rapidly maturing discovery, characterization, analysis, control and manufacturing techniques can have profound impact on life sciences and related industries that can be addressed through the understanding of biological systems and the ability to manipulate the fundamental building blocks of nature. Trends generating disruptive investment opportunities include:

Healthcare budgets are out of balance globally, with the aging population jeopardizing the financial viability of the leading economies of the world. Life sciences innovations in diagnostics, treatment and monitoring of disease must simultaneously reduce cost and improve the quality of life;

Continuing global growth in population and in improvements in quality of life substantially increase demand for raw materials, water, food and energy. This demand cannot be adequately met with conventional methods of manufacturing, generation, mining or harvesting. Biological pathways are becoming economically viable and ecologically preferable for production, utilization, and disposal/remediation; and

The ubiquity of data and internet access, while stationary and increasingly mobile, enable handheld devices to become a natural access point for communication and data sharing between healthcare service providers and their patients. Soon, they could be acting as diagnostic and treatment companions too.

We continue to believe we are positioned well to take advantage of today's growth markets within life sciences having been early investors in many of these markets. We believe our initial investments in single-cell analysis (Enumeral), three-dimensional biology (Champions Oncology), metabolomics (Metabolon), synthetic carbohydrates (Ancora), oncolytic viruses (BioVex, which was acquired by Amgen in 2011), solid state pH sensors (Senova), positioned us well to capture the growth of commercial interest in personalized medicine, industrial biotechnology, vaccines and molecular diagnostics. We also believe we have an emerging pipeline of companies that are developing solutions for growth markets that exist today or may develop in future years such as long-read genomic analysis (OpGen) and

agricultural products from the microbiome (AgBiome, formerly AgInnovation). We discuss these companies in more detail in the section below titled, "New Investments in 2012."

We also have a number of portfolio companies that address life sciences-related sectors as a secondary industry focus of their businesses. These related industries and portfolio companies include environmental remediation (ABSMaterials), chemical and fuel production (Cobalt and Solazyme), nanofabrication for life sciences-related tools (Molecular Imprints) and non-destructive, soft-tissue analysis (Xradia).

Our interest in life sciences will continue to be multi-disciplinary. For example, analytical, modeling and data acquisition techniques accelerated drastically in the first decade of the century, rapidly increasing the development of new diagnostic testing. We believe that this trend will continue owing to successful migration of well-developed semiconductor manufacturing and computational technologies into life sciences applications. There have been numerous examples, such as gene sequencing, metabolomics or bioinformatics, where transition from matter to data resulted in positive shifts in performance of the underlying machinery. Furthermore, as Moore's law scaling in the semiconductor manufacturing industry is expected to continue for at least another two decades, we expect to see continuing migration of the novel techniques and computational capabilities into life-sciences applications.

The rapid development of internet and mobile computing represents another vector of developing innovation for the life sciences market. The move from central lab to hand-held devices changes how diagnostic information is used in decision making for patient care. Real-time information can be shared and analyzed by one or more physicians immediately at the point of care in a single visit rather than requiring multiple, sometimes lengthy delays and follow-up visits.

The next step in this direction will be sensing networks and life sciences functionality embedded into always-on devices. These devices will generate substantial amounts of data that will require significant computing capability and new software algorithms for analyzing and using the data to derive suggestions for clinical diagnosis and, potentially, treatment options for consideration by healthcare providers. The data generated by these devices will need to be transferred at high speed, often wirelessly, to data centers where such analysis could take place. While a number of technologies exist today that can address some of these needs, substantial improvements in speed, cost and capability are required for the realization of all of the capabilities desired by healthcare providers. Such needs present significant opportunity for innovations such as those targeted by us.

Manufacturing techniques are also undergoing rapid changes, and the cross-pollination is bi-directional. Biological- and life-sciences-inspired techniques are penetrating natural resources and mining industries. Water treatment, usage and utilization and fermentation technologies are influencing other unrelated verticals. Synthetic biology promises to impact the oil-derived chemical industry. Membrane science is impacting food production, ore enrichment and waste remediation. As such, our portfolio companies will often produce products and/or services that are applicable to multiple industry sectors. We sometimes address this cross-sector nature by indicating a primary and secondary industry sector focus for some of our portfolio companies, as applicable.



The table below lists the equity-focused companies in our portfolio as of December 31, 2012, and the equity-focused companies that were formerly in our portfolio that target life sciences-related needs as either the primary or secondary focus of those businesses and the year in which we initially invested in each company:

**Current Life Sciences Portfolio Companies    Past Life Sciences Portfolio Companies**

ABS Materials, Inc.  
AgBiome, LLC

(formerly AgInnovation, LLC)  
Ancora Pharmaceuticals Inc.  
Champions Oncology, Inc. (OTC:CSBR)  
Cobalt Technologies, Inc.  
D-Wave Systems, Inc.  
Ensemble Therapeutics Corporation  
Enumeral Biomedical Corp.  
HzO, Inc.  
Mersana Therapeutics, Inc.  
Metabolon, Inc.  
Molecular Imprints, Inc.  
OpGen, Inc.  
Senova Systems, Inc.  
Solazyme, Inc. (NASDAQ:SZYM)  
Xradia, Inc.

Alliance Pharmaceutical Corporation

BioVex Group, Inc.

Chlorogen, Inc.  
Crystal IS, Inc.  
ENDOfcare, Inc.  
Evolved Nanomaterial Sciences, Inc.  
Gel Sciences, Inc.  
Genomica Corporation  
Guilford Pharmaceuticals, Inc.  
Heartware, Inc.  
Kereos, Inc.  
Kriton Medical, Inc.  
Magellan Health Services  
MedLogic Global Corporation  
MultiTarget, Inc.  
NanoGram Devices Corporation  
Nanomix, Inc.  
NeuroMetrix, Inc.  
Pharmaceutical Peptides, Inc.  
Phoenix Molecular, Inc.  
PolyRemedy Inc.  
SciQuest, Inc.  
TetraVitae Bioscience, Inc.

The percent of life sciences investments in our portfolio has been increasing over the past ten years. Approximately 70 percent of our initial investments since 2007, and all of our investments in 2012, were in companies addressing needs in the life sciences.

Our life sciences companies demonstrate progress and growth through different mechanisms depending on their respective businesses. Businesses that provide services, such as Metabolon, generate revenues from the commercial sale of these services. Businesses that develop and sell products, such as Senova, generate revenues from the sale of those products. Businesses that enter into partnerships for discovery and development of therapeutics, vaccines and diagnostics, such as Ensemble, Enumeral, Mersana and Champions Oncology, may generate revenue from upfront fees, milestone payments and royalties on sales of approved products. Businesses that endeavor to advance a therapeutic, diagnostic or vaccine product through clinical trials may not generate revenue until an approved product

is on the market, if ever. Progress for these types of companies can be measured by progress through clinical trials.

## Energy

We classify companies in our energy portfolio as those that seek to improve performance, productivity or efficiency, and to reduce environmental impact, waste, cost, energy consumption or raw materials. Energy is a term used commonly to describe products and processes that solve global problems related to resource constraints. The term, "cleantech," is also used commonly in a similar manner.

We are experiencing record levels of demand for energy, chemicals and resources that are crucial components of the global economy. This demand coupled with energy security concerns and volatility of commodity prices, leads to trends that yield disruptive investment opportunities. These trends include:

Identification and extraction of natural resources is becoming more of a science and less of an art. Such a shift in approach is driven, in part, by the need to manage the significant costs associated with energy-related projects, particularly in remote areas, and the availability of new methods of generating, analyzing and using data that was heretofore not available.

Recovery of resources is occurring in exceedingly remote areas and from increasingly more difficult sources to access as the traditional easy-to-access sources of these resources are being drained of supply. This trend is leading to the need for new extraction technologies.

New techniques for extraction of natural gas are increasing the supply and lowering the cost of this resource. Natural gas-powered devices can be more efficient and less polluting than petroleum-powered devices. Advances in distribution could enable natural gas to replace petroleum in certain applications.

Governments and industry worldwide are looking for new and cleaner forms of energy. This has increased interest in the ability to produce chemicals and fuels from renewable resources.

Governments, corporations and individuals worldwide seek ways to translate significant amounts of data generated by today's monitoring capabilities into ways to optimize use of energy and resources.

We expect that the foundation of products and services that address the trends above and other energy-related trends will be interdisciplinary. Tools that are commonly used for inspection and certification of electronic devices could find use in analyzing soil and rock samples in oil and gas exploration. Organisms that are used to manufacture therapeutics could find use in the producing of renewable chemicals and fuels. These multidisciplinary products and services will seek to improve performance, productivity and efficiency and to reduce environmental impact, waste, cost, energy consumption or raw materials.



We believe innovations in energy markets include:

**New Approaches to Production:** The term “production,” is defined here to indicate the process of combining one or more individual components into a final product. A final product made using a process can be quite diverse and include a physical device (e.g., a solar panel, battery or solid-state coolers), a chemical (e.g., butanol, ethanol or biodiesel), or even a component that produces light. Although many existing processes are capable of producing these types of products in large quantities and of high quality, they each suffer from various inefficiencies that could be overcome using new approaches and solutions.

**New Materials:** The physical properties of a product are defined primarily by the materials that comprise it. In some cases, these properties limit the ability of a product to meet the needs of the industry. The semiconductor industry is a classic example of this phenomenon with its efforts to reduce the dimensions of the transistors to allow them to pack more transistors into a device to increase its speed while decreasing the size of the die itself to reduce manufacturing costs. As this reduction in size occurs, the silicon dioxide insulating layer in the transistors begins to leak electrons, which results in a reduction in performance and an increase in energy use. At dimensions of less than approximately 10 nm, the insulating behavior of silicon dioxide degrades in performance, and the transistor cannot function properly. This example of reduced performance as a layer of a traditional material is reduced in thickness is a common problem of traditional materials that limits product development and advancement in a number of industries. This and other inherent limitations in the properties of traditional materials often force companies to use underperforming devices that present difficulties such as environmental hazards, low energy efficiency or incompatible form factors because alternative technology is not available. New advanced materials permit the development of new products that overcome inherent limitations of existing technology and approaches.

We continue to believe we are positioned well to take advantage of today’s growth markets within energy. We have been early investors in many of these markets. Our initial investments in renewable chemicals and biofuels (Solazyme), produced water remediation (Produced Water Absorbents), light-emitting diodes (Bridgelux) and alternative sources for high-intensity light (Laser Light Engines) positioned us well to participate in the growth of these respective industries. Additionally, a number of our energy portfolio companies completed recent liquidity events. Solazyme completed a successful IPO in the second quarter of 2011, raising over \$200 million. DuPont acquired Innovalight in the third quarter of 2011. Asahi Kasei acquired Crystal IS in the fourth quarter of 2011.

We also have a number of portfolio companies that address energy-related needs as a secondary focus of their respective businesses. These companies are targeting needs such as low-power memory (Nantero and Adesto) and low-power, uncooled infrared image sensors (SiOnyx).

The table below lists the equity-focused companies in our portfolio as of December 31, 2012, and the equity-focused companies that were formerly in our portfolio that target energy-related needs as either the primary or secondary focus of those businesses and the year in which we initially invested in each company:

| <b>Current Energy Portfolio Companies</b> | <b>Past Energy Portfolio Companies</b> |
|---|--|
| ABSMaterials, Inc.                        | CORDEX Petroleums, Inc.                |
| Adesto Technologies Corporation           | Crystal IS, Inc.                       |
| Bridgelux, Inc.                           | Dynecology Incorporated                |
| Cobalt Technologies, Inc.                 | Innovalight, Inc.                      |
| Contour Energy Systems, Inc.              | Molten Metal Technology, Inc.          |
| Laser Light Engines, Inc.                 | NanoGram Corporation                   |
| Nanosys, Inc.                             | NanoGram Devices Corporation           |
| Nantero, Inc.                             | Siluria Technologies, Inc.             |
| Nextreme Thermal Solutions, Inc.          | Starfire Systems, Inc.                 |
| Produced Water Absorbents, Inc.           | TetraVitae Bioscience, Inc.            |
| SiOnyx, Inc.                              |  |
| Solazyme, Inc. (NASDAQ:SZYM)              |  |
| Ultora, Inc.                              |  |

Many of our Energy portfolio companies are generating commercial revenues and/or have entered into partnerships and joint development agreements with large corporations.

### Electronics

We classify companies in our electronics portfolio as those that address problems in electronics-related industries, including semiconductors, telecommunications and data communications, metrology and test and measurement. We believe macroeconomic and microeconomic trends, including global connectivity, demand for increasing bandwidth owing to pervasiveness of electronics in daily life, the desire to see not just hear, the need for real-time availability of data and demand for more functionality driven by increasing global prosperity, create attractive investment opportunities in electronics. We believe innovations in electronics include:

- **New Methods of Production:** Continuation of Moore's Law allows for exponential increases of the number of integrated circuits in semiconductor devices.

- **New Materials:** New materials enable unique capabilities, performance and form-factors in electronic devices.

**New Forms of Computation:** New methods of solving equations and other problems that would be difficult or impossible with standard digital computing techniques.

We continue to believe we are positioned well to take advantage of today's growth markets within electronics having been early investors in many of these markets. We believe our initial investments in non-volatile memory (Nantero and Adesto), transparent conductors (Cambrios), image sensors (SiOnyx), integrated photonics (NeoPhotonics), waterproofing (HzO) and metrology (Xradia), positioned us well to capture the growth of commercial interest in smartphones and tablet computers with touchscreens, the exponential increase in demand for bandwidth for data and telecommunications, and the demand for non-destructive imaging capabilities in a variety of industries. We also believe we have an emerging pipeline of companies that are developing solutions for growth markets that exist today or may develop in future years such as high-performance computing enabled by quantum mechanics (D-Wave Systems) and radio-frequency identification and near-field communication devices enabled by printed electronics (Kovio).

We also have a number of portfolio companies that address electronics-related needs as a secondary focus of their respective businesses. These companies are targeting needs such as high-efficiency, high-color-gamut LED displays (Nanosys), high-energy density storage devices (Contour and Ultora) and novel, electrically driven, solid-state sensors (Senova).

The table below lists the equity-focused companies in our portfolio as of December 31, 2012, and the equity-focused companies that were formerly in our portfolio that target electronics-related needs as either the primary or secondary focus of those businesses and the year in which we initially invested in each company:

**Current Electronics Portfolio Companies**

Adesto Technologies Corporation  
 Bridgelux, Inc.  
 Cambrios, Inc.  
 Contour Energy Systems, Inc.  
 D-Wave Systems, Inc.  
 HzO, Inc.  
 Kovio, Inc.  
 Laser Light Engines, Inc.  
 Molecular Imprints, Inc.  
 Nanosys, Inc.  
 Nantero, Inc.  
 NeoPhotonics Corporation (NYSE:NPTN)\*  
 Nextreme Thermal Solutions, Inc.  
 Senova Systems, Inc.  
 SiOnyx, Inc.  
 Ultora, Inc.

**Past Electronics Portfolio Companies**

Agile Materials and Technologies, Inc.  
 CMA Group, Inc.  
 Continuum Photonics, Inc.  
 Cswitch Corporation  
 Informio, Inc  
 Micracor, Inc.  
 NanoGram Corporation  
 Nanomix, Inc.  
 NanoOpto Corporation  
 Nanophase Technologies Corporation  
 Nanotechnologies, Inc.  
 NBX Corporation  
 nFX Corporation  
 Optiva, Inc.  
 Princeton Video Image, Inc.  
 Schwoo, Inc.



Xradia, Inc.

Starfire Systems, Inc.  
Voice Control Systems, Inc.  
Zia Laser, Inc.

\* As of February 16, 2013, we no longer hold any shares of NeoPhotonics Corporation.

Many of our electronics portfolio companies are generating commercial revenues and/or have entered into partnerships and joint development agreements with large corporations.

### **Maturity of Current Equity-Focused Venture Capital Portfolio**

Our equity-focused venture capital portfolio is composed of companies at varying maturities facing different types of risks. We have defined these levels of maturity and sources of risk as: 1) Early Stage/Technology Risk, 2) Mid Stage/Market Risk and 3) Late Stage/Execution Risk. Early-stage companies have a high degree of technical, market and execution risk, which is typical of initial investments by venture capital firms, including us. These companies often require substantial development of their technologies before they begin introducing products to market. Mid-stage companies are those that have overcome most of the technical risk associated with their products and are now focused on addressing the market acceptance for their products. For those companies developing therapeutics or medical devices, the focus is on bringing their products through the first phases of clinical trials. Late-stage companies are those that have determined there is a market for their products, and they are now focused on sales execution and scale. Late-stage, life-sciences companies are typically generating revenue from the commercial sale of one or more products or, in the case of therapeutic or medical device-focused life-sciences companies, are in Phase III Clinical Trials, which are the pivotal trials before a possible FDA approval and commercial launch of a product.

We seek to create a portfolio of companies that enables consistent flows of potential liquidity events in multiple industries in three sectors, life sciences, energy, and electronics, which can be monetized as these companies mature.

We believe a portfolio of companies focused on a diverse set of industries reduces the potential impact of cyclicity of any one industry. Our current portfolio is comprised of companies at varying stages of maturity in a diverse set of industries within three sectors. As our portfolio companies mature, we seek to invest in new early- and mid-stage companies that may mature into mid- and late-stage companies. This continuous progression creates a pipeline of investment maturities that may lead to future sources of positive contributions to net asset value per share as these companies mature and potentially experience liquidity and exit events. This diversity of industries and our pipeline of investment maturities are demonstrated by the distribution of our current early- and mid-stage portfolio companies that primarily address needs in the sectors shown in the table below.

The interdisciplinary nature of science-based inventions enables our portfolio companies to address needs in multiple sectors rather than being confined to addressing needs in one sector. As such, many of our companies can adjust their business foci to address needs in a secondary sector should opportunities in the company's primary sector decrease in number or magnitude. We discuss this attribute in more detail in the section above titled, "Industry Sector Overview."

We expect some of our portfolio companies to transition between stages of maturity over time. This transition may be forward if the company is maturing and is successfully executing its business plan or may be backward if the company is not successfully executing its business plan or decides to change its business plan substantially from its original plan. Transitions backward are commonly accompanied by an increase in non-performance risk, which reduces valuation. We discuss non-performance risk and its implications on value below in the section titled "Valuation of Investments."

During the fourth quarter of 2012, we transitioned ABSMaterials from a mid-stage company to an early-stage company owing to a change in its primary target market during the quarter.

### **Portfolio Company Revenue**

We currently have 24 companies in our equity-focused venture capital portfolio that generate revenues ranging from nominal to significant from commercial sales of products and/or services, from commercial partnerships and/or from government grants. In aggregate, our portfolio companies had approximately \$532 million in revenue in 2012, a 25.5 percent increase from aggregate 2011 revenue of approximately \$424 million, a 39.9 percent increase from aggregate 2010 revenue of approximately \$380 million and a 99.1 percent increase from aggregate 2009 revenue of \$267 million.

### **New Investments in 2012**

In 2012, we made two new investments. In both cases, we invested more dollars and took ownership positions that are more meaningful than we had done historically. This is a strategy we implemented over the past few years.

During 2012, we invested \$3.26 million in OpGen, Inc. OpGen is an innovator in providing rapid, accurate, DNA analysis products and services. The company's proprietary Whole Genome Mapping technology provides high-resolution, whole genome maps for sequence assembly and validation, strain typing and comparative genomics.

The company is dedicated to positively influencing individual healthcare outcomes, advancing scientific research and enhancing public health by delivering precise, actionable information and results to customers in the life sciences and healthcare communities. OpGen's customers include genomic research centers, public health agencies, bio-defense organizations, academic institutions, clinical research organizations and biotechnology companies.

In December 2012, we made a \$2 million investment in AgBiome, LLC. We are a founding investor in AgBiome. AgBiome is a provider of early-stage research and discovery for agriculture and is utilizing the crop microbiome to identify products that reduce risk and improve yield.

### **Early-Stage, Active Investing**

Despite rapidly expanding research and development budgets, publications and patents covering life sciences, the number of early-stage venture capitalists investing in science-enabled companies has decreased substantially. This has resulted in decreased competition for attractive investment opportunities and increased attractive pricing available to investors in those opportunities.

\* Includes data through September 1, 2011.

Source: Lux Research, Inc.

According to data from Lux Research, between 2006 and 2011, seed/Series A venture capital investments, as a percentage of all financings in the type of investments made by us, fell from a high of 33 percent to approximately 11 percent. Owing to financial conditions, many venture capital firms have substantially reduced or ceased completely participation in the financing of early-stage, companies, particularly in the industry sectors in which we invest. Many of these firms are now focused on financing later stage, and/or, in the case of life sciences-related companies, therapeutics-focused, clinical-stage companies.

Despite this shift to later stage investing, over the previous decade, research by Palo Alto Venture Science, a venture capital firm that employs analytical models for investing in early-stage companies, showed that the risk of later stage investing is not significantly less than early stage investing. Over the previous decade, there was a 49 percent failure rate in early rounds yielding a 2.8 times money multiple versus a 45 percent failure rate in later rounds yielding a 1.3 times multiple. We believe the money multiple will increase as more funds have exited early-stage investing.

The shift of many venture capital firms away from early-stage investing has created opportunity for us. Innovation continues to accelerate, and with a dearth of funding available, high-quality investment opportunities at attractive valuations are prevalent. Additionally, the turmoil in the venture capital industry has made start-up companies more interested in engaging with strategic corporations as partners and investors. Our ability to bring early-stage financing and strong corporate partnering early in the development process could be perceived as valuable by potential portfolio companies and may be of particular benefit in investment opportunities that become competitive.

### **Corporate Partnerships are Increasingly Important to Us**

We have historically built our portfolio companies through a combination of investment from other venture capital firms, high-net-worth individuals and other sources of equity capital, partnerships and investments from corporations and federal funding. The venture capital industry is undergoing contraction that is reducing the amount of capital available for investment, particularly in the types of companies that we invest in. The U.S. government is reducing spending, and the partisan gridlock creates substantial uncertainty around the availability of federal funding. Corporations, on the other hand, have substantial amounts of cash, know-how and a need to harness innovation to drive future growth.

As such, we believe that corporate involvement is evolving to become more critical for the success of early-stage companies in the years ahead. In addition to the points discussed above, two other factors are driving this evolution. First, corporations and the public markets have become less willing to take technology, scale and manufacturing risk. Corporations and the public markets often are requiring more mature companies with proven scale and customers prior to an IPO or acquisition. Second, the time period between investment and exit over the past decade has lengthened considerably. This extension of time results in the need for start-up companies to secure larger amounts of capital from dilutive and non-dilutive sources than was historically required before being acquired or seeking capital in IPOs.

At the same time, facing a depleting pool of acquisition targets and the necessity to supplement downsized internal research and development operations, large corporations are investing actively in venture capital-backed companies. Early-stage entrepreneurs and investors have proven effective at company formation, early intellectual property strategy, building management teams, and characterizing, reproducing and establishing base-line processes. The challenges for early-stage companies have been in scale and manufacturing and end-market access. Thus, active corporate involvement is becoming increasingly valuable, especially as technology becomes more complex, to overcome these challenges. The combination of 1) rapid development capabilities of small companies, and 2) manufacturing expertise and channel access of large corporations has become exceedingly powerful for all entities involved in such efforts.

We are actively working to increase our engagement with corporate partners as we believe that working closely with corporations will permit us to 1) identify and diligence technologies more efficiently and effectively, 2) gather market intelligence that these corporations have from their involvement in the industry, 3) gain a better perspective on the dynamic competitive landscape, 4) better understand integration challenges of bringing a new technology to this industry, and 5) provide insights into the requirements of scale and manufacturing while we work actively with our portfolio companies to ready the technology for launch. We also believe it will help these young companies identify and pursue markets for products where there is a proven demand.

## Investment Objective and Strategy

Our principal investment objective is to achieve long-term capital appreciation by making equity-focused venture capital investments in companies that we believe have exceptional growth potential. Therefore, a significant portion of our current venture capital investment portfolio provides little or no income in the form of dividends or interest. Current income is a secondary investment objective. We seek to reach the point where future growth is financed through reinvestment of our capital gains from our venture capital investments and where current income offsets significant portions of our annual expenses during periods of time between realizations of capital gains on our investments. We also plan to implement a strategy to grow assets under management and generate current income by raising one or more third-party funds to manage. It is possible that we will invest our capital alongside or through these funds in portfolio companies. These funds may be focused on specific sectors such as life sciences, energy and electronics that are enabled by scientific breakthroughs, including nanotechnology. It is also possible these funds will also invest in companies in each of these sectors that are not directly enabled by nanotechnology. There is no assurance when and if we will be able to raise such fund(s) or, if raised, whether they will be successful.

We have discretion in the investment of our capital to achieve our objectives. Our venture capital investments are made primarily in equity-related securities of companies that can range in stage from pre-revenue to generating positive cash flow. These businesses tend to be thinly capitalized, unproven, small companies that lack management depth, have little or no history of operations and are developing unproven technologies. These businesses may be privately held or publicly traded. We historically have invested in equity securities of these companies that are generally illiquid due to restrictions on resale and to the lack of an established trading market. We refer to our portfolio of investments in equity and equity-related securities in later sections of the Management's Discussion and Analysis of Financial Condition and Results of Operations ("MD&A") as our "equity-focused" portfolio of investments. We have historically, from time to time, taken advantage of opportunities to generate near-term cash flow by investing in non-convertible debt securities of small businesses. These businesses tend to be generating cash or have near-term visibility to reaching positive cash flow. We refer to our portfolio of investments in non-convertible debt in later sections of the MD&A as our "venture debt" portfolio of investments. While we have historically made venture debt investments, we currently plan to focus our efforts on equity-focused investments and on raising and managing one or more third-party funds.

We are both early-stage and long-term investors. We seek to identify investment opportunities in industries and markets that will be growth opportunities three to seven years from the date of our initial investment. We expect to invest capital in these companies at multiple points in time subsequent to our initial investment. We refer to such investments as "follow-on" investments. Our efforts to identify and predict future growth industries and markets rely on patient and deep due diligence in nanotechnology-enabled innovations developed at universities and corporate and government research laboratories, and the examination of macroeconomic and microeconomic trends and industry dynamics. We believe it is the early identification of and investments in these growth opportunities that will lead to investment returns for our shareholders, growth of our net assets, and capital for us to invest in tomorrow's growth opportunities.



### **Involvement with Portfolio Companies**

The 1940 Act requires that BDCs offer to "make available significant managerial assistance" to portfolio companies. We are actively involved with our portfolio companies through membership on boards of directors, as observers to the boards of directors and/or through frequent communication with management. As of December 31, 2012, we held at least one board seat or observer rights on 24 of our 29 equity-focused portfolio companies (83 percent).

We may hold two or more board seats in early-stage portfolio companies or those in which we have significant ownership. We may transition off of the board of directors to an observer role as our portfolio companies raise additional capital from new investors, as they mature or as they are able to attract independent members who have relevant industry experience and contacts. We also typically step off the board of directors upon the completion of an IPO. Our observer rights at board of directors meetings commonly cease when companies complete an IPO. We have not held a board seat or observer rights at either Solazyme, Inc., or NeoPhotonics Corporation since each company completed an IPO in May 2011 and February 2011, respectively.

We may be involved actively in the formation and development of business strategies of our earliest stage portfolio companies. This involvement may include hiring management, licensing intellectual property, securing space and raising additional capital. We also provide managerial assistance to late-stage companies looking for potential exit opportunities by leveraging our relationships with the banking and investment community and our knowledge and experience in running a micro-capitalization publicly traded business.

### **Investments and Current Investment Pace**

Since our investment in Otisville in 1983 through December 31, 2012, we have made a total of 95 equity-focused venture capital investments. We have completely exited 66 of these 95 investments and partially exited through the sale of shares and/or the sale of call options covered by shares of two of these 95 investments, recognizing aggregate net realized gains of \$69,347,255 on invested capital of \$99,559,771. For the securities of the 29 companies in our equity-focused portfolio held at December 31, 2012, we have net unrealized depreciation of \$3,964,152 on invested capital of \$106,568,131. We have aggregate net realized gains and unrealized depreciation for our 95 equity-focused investments of \$65,383,103 on invested capital of \$206,127,902.

The amount of net realized gains includes:

\$13,992,952 in upfront payments received in 2011 from the sale of BioVex Group, Inc., to Amgen, Inc., the sale of Innovalight, Inc., to DuPont and the sale of Crystal IS, Inc., to Asahi Kasei Group. We had invested a total of \$11,383,299 in these three portfolio companies;

\$953,480 from the portion of our upfront payment held in escrow from the sale of BioVex Group, Inc., to Amgen, Inc., which was released on March 16, 2012;

\$11,140 from the portion of our upfront payment held in escrow from the sale of Crystal IS, Inc., to Asahi Kasei Group, which was released on April 30, 2012;



\$5,199,223 from the sale of shares of Solazyme, Inc., on invested capital of \$1,195,693. \$2,911,500 of the total proceeds was generated from the call of shares of Solazyme under option contracts. \$2,287,723 in total proceeds was generated from the sale of 182,359 shares of Solazyme through open market transactions;

\$2,000,500 from the call of shares under option contracts of NeoPhotonics Corporation on invested capital of \$6,477,619; and

\$1,605,907 in realized gains on our sale of call option contracts covered by our shares of NeoPhotonics Corporation and Solazyme, Inc.

The aggregate net realized gains and the cumulative invested capital also do not reflect the cost or value of our shares of NeoPhotonics Corporation or Solazyme, Inc., which completed IPOs on February 2, 2011, and May 27, 2011, respectively, that we owned as of December 31, 2012, or the premiums received on open option contracts of \$50,000. The aggregate net realized gains also do not include potential escrow payments from the sale of Crystal IS, Inc., or Innovalight, Inc., or potential milestone payments that could occur as part of the acquisition of BioVex Group, Inc., by Amgen, Inc., at points in time in the future as of December 31, 2012. If these amounts were included, our aggregate net realized gains and cumulative invested capital would be \$86,022,057 and \$107,921,968, respectively.

From August 2001 through December 31, 2012, all 53 of our initial equity-focused investments have been in science-enabled companies commercializing or integrating products enabled by nanotechnology or microsystems. From August 2001 through December 31, 2012, we have invested a total (before any subsequent write-ups, write-downs or dispositions) of \$159,140,325 in these companies. We currently have 27 equity-focused companies in our portfolio that have yet to complete liquidity events (e.g., IPO or M&A transactions). At December 31, 2012, from first dollar in, the average and median holding periods for these 27 investments were 5.4 years and 5.7 years, respectively. Historically, as measured from first dollar in to last dollar out, the average and median holding periods for the 66 investments we have exited were 4.2 years and 3.3 years, respectively.

The following is a summary of our initial and follow-on equity-focused investments in nanotechnology companies from January 1, 2008, to December 31, 2012. We consider a "round led" to be a round where we were the new investor or the leader of a group of investors in an investee company. Typically, but not always, the lead investor negotiates the price and terms of the deal with the investee company.

## Investments in Our Equity-Focused Portfolio of Investments

### in Privately Held and Publicly Traded Companies

|                                    | 2008         | 2009         | 2010        | 2011         | 2012         |
|------------------------------------|--------------|--------------|-------------|--------------|--------------|
| Total Incremental Investments      | \$17,779,462 | \$12,334,051 | \$9,560,721 | \$17,688,903 | \$15,141,941 |
| No. of New Investments             | 4            | 2            | 3           | 4            | 2            |
| No. of Follow-On Investment Rounds | 25           | 29           | 27          | 31           | 26           |
| No. of Rounds Led                  | 4            | 5            | 5           | 4            | 3            |
| Average Dollar Amount – Initial    | \$683,625    | \$174,812    | \$117,069   | \$1,339,744  | \$1,407,500  |
| Average Dollar Amount – Follow-On  | \$601,799    | \$413,256    | \$341,093   | \$397,740    | \$474,113    |

### Importance of Availability of Liquid Capital

Private venture capital funds are structured commonly as limited partnerships with a committed level of capital and finite lifetime. Capital is "called" from limited partners to make investments and pay for expenses of running the firm at various points within the lifetime of the fund. For each initial investment, the fund must reserve additional capital for follow-on investments at later stages of the life of the portfolio companies. These follow-on investments are required because often venture-backed portfolio companies in areas in which we invest, whether privately held or publicly traded, operate with negative cash flow for lengthy periods of time. In general, the cumulative total of initial invested capital and reserves cannot exceed the committed level of capital of the fund.

Our strategy for investing capital is similar to this approach in some respects. We make initial investments in privately held and publicly traded companies and project the amount of capital that may be required should the company mature successfully. These projections, equivalent to the reserves of private venture capital funds, are reviewed weekly by management, are updated frequently and are a component of the data that guide our decisions on whether to make new and follow-on investments. As a publicly traded, internally managed venture capital company, our cash used to make investments and pay expenses is held by us and not called from external sources when needed. Accordingly, it is crucial that we operate the company with a substantial balance of liquid capital for this reason and for four additional reasons.

We manage the company and our investment criteria and pace such that our projected needs for capital to make new and follow-on investments do not exceed the total of our liquid investments. Although we use best efforts to predict 1) when this capital will be required for use in new and follow-on investments, we cannot predict with certainty the timing for these investments. We would be unable to make new or follow-on investments in our portfolio companies without having substantial liquid resources of capital available to us.



Venture capital firms traditionally invest beside other venture capital firms in a process called syndication. The size of the fund and the amount of capital reserves available to syndicate partners is often an attribute that potential 2)co-investors consider when deciding on syndicate partners. As we do not have committed capital from limited partners, we believe we must have adequate available liquid capital on our balance sheet to be able to have access to high-quality deal flow.

We rarely commit the total amount of cumulative capital intended for investment in any portfolio company at one point in time. Instead, our investments consist of multiple rounds of financing of a given portfolio company, in which we typically participate if we believe that the merits of such an investment outweigh the risks. We also commonly have preemptive rights to invest additional capital in our privately held portfolio companies. These rights 3)are useful to protect and potentially increase the value of our positions in our portfolio companies as they mature. Commonly, the terms of such financings in privately held companies also include penalties for those investors that do not invest in these subsequent rounds of financing. Without available capital at the time of investment, our ownership in the company would be subject to these penalties that can lead to a partial or complete loss of the capital invested prior to that round of financing.

We may have the opportunity to increase ownership in late rounds of financing in some of our most mature companies. Many private venture capital funds that invested in these companies are reaching the end of the term associated with their limited partnerships. This issue may limit the available capital to these funds for follow-on 4) investments, and the ability to take advantage of potentially valuable terms given to those who have investable capital. Having permanent, liquid capital available for investment and access to the capital markets allows us to take advantage of these opportunities as they arise.

### **Our Sources of Liquid Capital**

The sources of liquidity that we use to make our investments are classified as primary and secondary liquidity. As of December 31, 2012, and December 31, 2011, our total primary and secondary liquidity was \$38,231,691 and \$65,368,303, respectively. We do not include funds available from our credit facility as primary or secondary liquidity. We believe it is important to examine both our primary and secondary liquidity when assessing the strength of our balance sheet and our future investment capabilities.

Primary liquidity is comprised of cash, U.S. Treasury securities and certain receivables. As of December 31, 2012, we held \$13,998,880 in U.S. government obligations, and we had an additional \$8,379,111 in cash, of which \$4,775,143 was held in non-interest-bearing, fully FDIC insured bank accounts. As of December 31, 2011, we held \$33,841,394 in cash, of which \$25,251,666 was held in non-interest-bearing, fully FDIC insured bank accounts. The temporary unlimited FDIC insurance coverage expired on January 1, 2013. As of December 31, 2011, we held \$0 in U.S. government obligations. With the expiration of the full FDIC insurance on non-interest-bearing accounts on December 31, 2012, we expect to resume holding a portion of our cash in U.S. government obligations.





On March 16, 2012, the Company received payment of its portion of the proceeds held in escrow since the closing of the transaction on March 4, 2011, from Amgen, Inc.'s acquisition of BioVex Group, Inc., totaling \$953,480. On April 30, 2012, the Company received \$11,140 from the portion of our upfront payment held in escrow from the sale of Crystal IS, Inc., to Asahi Kasei Group. These payments immediately added to our primary liquidity. Payments upon achieving milestones of the BioVex Group, Inc., sale or expiration of the escrow periods for the Crystal IS, Inc., and Innovalight, Inc., dispositions would also add to our primary liquidity in future quarters if these milestones are achieved successfully and escrowed funds are released in part or in full. The probability-adjusted values of the future milestone payments for the sale of BioVex and of the funds held in escrow from the dispositions of Crystal IS and Innovalight, as determined at the end of each fiscal quarter, are included as an asset on our Consolidated Statements of Assets and Liabilities and will be included in primary liquidity only if and when payment is received for achievement of the milestones and the funds held in escrow are released, respectively. During the year ended December 31, 2012, 324,000 shares of our investment in Solazyme, Inc., were called under option contracts. We received \$2,911,500 in gross proceeds from these transactions, which added to our primary liquidity. We also sold an additional 182,359 shares of Solazyme on the open market during this period for gross proceeds of \$2,287,723. During the year ended December 31, 2012, 400,100 shares of our investment in NeoPhotonics Corporation were called under option contracts. We received \$2,000,500 in gross proceeds from these transactions, which also added to our primary liquidity.

Our secondary liquidity is comprised of the stock of publicly traded companies. Although these companies are publicly traded, their stock may not trade at high volumes and prices may be volatile, which may restrict our ability to sell our positions at any given time. As of December 31, 2012, our secondary liquidity was \$15,770,488. NeoPhotonics Corporation and Solazyme, Inc., account for \$14,422,261 of this amount based on the closing price of each company as of December 31, 2012. As of December 31, 2012, shares of NeoPhotonics and Solazyme were trading below the strike price of the call options that were open and outstanding. The fair value of our shares of Champions Oncology, Inc., accounts for \$1,348,227 of the total amount of secondary liquidity. As of December 31, 2011, our secondary liquidity was \$31,457,861. NeoPhotonics and Solazyme account for \$29,484,527 of this amount based on the closing price of each company as of December 31, 2011. Champions Oncology accounts for \$1,973,334 of the total amount of secondary liquidity. As of December 31, 2012, and December 31, 2011, our shares of each of these companies were freely tradable securities. A decision to sell our shares would result in the cash received from the sale of these assets being included in primary liquidity. Until that time, we will continue to include the value of our shares of our publicly traded portfolio companies in secondary liquidity unless the average trading volume of each company reaches sufficient levels for us to monetize our stock in such companies over a short period of time.

#### **Potential Pending Liquidity Events from Our Portfolio as of December 31, 2012**

During the fourth quarter of 2012, one of our portfolio companies received letters of intent to acquire the company. As of December 31, 2012, discussions between this portfolio company and the potential acquirers are ongoing, and there can be no assurance that this company will be able to consummate a transaction within the next twelve months, if at all.



Additionally, our companies often plan for and/or begin the process of pursuing potential sales and/or IPOs of those companies by hiring bankers and/or advisors to attempt to pursue such liquidity events. We consider these efforts to be in the ordinary course of business for those companies until the potential and timing of a transaction become tangible through events such as receipt of letters of intent to acquire a company and/or drafting of registration documents to pursue an IPO. Other than the company mentioned above, as of December 31, 2012, we did not have any additional companies for which the potential and timing of a transaction are tangible.

As of December 31, 2012, we valued potential milestone payments from the sale of BioVex Group, Inc., at \$3,400,734. If all the remaining milestone payments were to be paid by Amgen, Inc., we would receive \$9,526,393. We have not received any milestone payments as of December 31, 2012, and there can be no assurance as to the timing and how much of this amount we will ultimately realize in the future, if any.

### **Strategy for Managing Publicly Traded Positions**

Our equity-focused portfolio companies may seek to raise capital and provide liquidity to shareholders through IPOs. It is generally rare that pre-IPO investors are afforded the ability to sell a portion of shares owned in the IPO. These pre-IPO shares are often subject to lock-up provisions that prevent the sale of those shares, options against those shares or other transactions associated with those shares until expiration of the lock-up period, which is often 180 days from the date of the IPO. We commonly plan to hold our shares of our publicly traded portfolio companies following the expiration of the lock-up restrictions if we believe that the prospects for future growth of the portfolio company and the underlying value of our shares are as great or greater than other opportunities we are currently encountering. We believe we are able to make such assessments using our extensive knowledge of the companies having actively worked with them and their management teams over multiple years as pre-IPO investors. As such, we may hold our shares of publicly traded portfolio companies for extended periods of time from the date of IPO.

Following the expiration of the lock-up restrictions, we may pursue the sale of call options covered by our ownership of shares in our publicly traded portfolio companies. The Company will only "sell" or "write" options on common stocks held in the Company's portfolio. We will not sell "naked" call options, *i.e.*, options representing more shares of the stock than are held in the portfolio. These call options give the buyer the right to purchase our stock at a given price, the "strike price," prior to a specific date, the "expiration date." A call option whose strike price is above the current price of the underlying stock is called "out-of-the-money." A call option whose strike price is below the current price of the underlying stock is called "in-the-money." When stocks in the portfolio rise, call options that were out-of-the-money when written may become in-the-money, thereby increasing the likelihood that they could be exercised, and we would be forced to sell the stock. The opposite would occur for an in-the-money option that would become out-of-the-money if the stock were to fall below the strike price of the option. We have used and currently plan to continue to use both in-the-money and out-of-the-money options as part of our strategy for managing our ownership in publicly traded portfolio companies.



We may also purchase put options as a method of limiting the downside risk that the price per share of these companies may decrease substantially from current levels. This type of option is particularly useful for hedging risk for volatile stocks such as NeoPhotonics Corporation and Solazyme, Inc., that are relatively illiquid compared to the number of shares owned by us. A put option gives its holder the right to sell a specified number of shares of a specific security at a specific price (known as the exercise strike price) by a certain date. The buyer of a put option is betting that the price of the security will decrease before the option expires. The risk for us as the option holder is that the option expires unexercised, and we have lost the money spent on buying the option.

For conventional listed call options, the options' expiration dates are commonly up to nine months from the date the call options are first listed for trading. Longer-term call options can have expiration dates up to three years from the date of listing. We currently expect the majority of written call options to be ones with expirations of equal to or shorter than one year from the date the call option is first listed for trading.

We believe this strategy of selling covered call options on our publicly traded portfolio companies provides at least three benefits:

1) We receive payment of a premium in cash at the time of the sale of the call option. The amount of the premium received is negotiated between the buyer and us and is influenced generally by the market price of the underlying stock, the volatility of the stock and the length of time between the date of sale of the call option and the expiration date. If the option expires out-of-the-money, we retain the premium as a gain on our investment.

2) If the option is exercised, it enables the monetization of the stock held by us in an orderly transaction that yields known returns. Our publicly traded portfolio companies currently trade at small average daily volumes of shares compared with our positions in these companies. As such, a decision by us to sell a portion or all of our shares in these companies in the public markets through brokers could negatively affect the price at which we would be able to sell these shares and, therefore, our ultimate returns. The sale of a call option sets a price at which our shares would sell if the option is exercised, which negates the potential impact of illiquidity or other market dynamics on our returns from the sale of these shares. That said, it also sets an upper limit for the proceeds we would receive in such sale. We plan to enter into such contracts at a price per share and in a timeframe that we would be willing to sell those shares. While we may repurchase call options when advantageous to us, we commonly do not sell call options with the expectation that we will repurchase them at a future date.

3) The sale of options may help generate interest and liquidity in the stock of our publicly traded portfolio companies. Current market dynamics make it difficult for small capitalization stocks to attract interest from institutional and retail investors. This difficulty leads to low average trading volumes and low liquidity options for existing shareholders. We believe the sale of call options may aid in increasing the interest and liquidity in the stock of these companies and may be beneficial to our future potential returns on these investments.

During the twelve months ended December 31, 2012, our strategy for managing our publicly traded positions has generated approximately \$1,444,840 in net cash proceeds from premiums on call options sold and put options purchased of Solazyme, Inc. We added approximately \$2,911,500 in gross cash proceeds to our primary liquidity resulting from options called that were covered by a portion of our shares of Solazyme. During 2012, we sold an additional 182,359 shares of Solazyme for gross cash proceeds of \$2,287,723. The net increase in our primary liquidity from these transactions was \$6,644,063. The average sale price on assignments under option contracts and open market sales for Solazyme was \$10.27 for the year. Our cost basis in Solazyme is \$2.36 per share. The proceeds from the premiums received from the sale of call options and the cash from the sale of shares discussed above have yielded cash that is approximately the same as the original amount we invested in Solazyme. This increase in primary liquidity is important for our efforts to continue to fund existing and new portfolio companies that could generate future investment returns. As of December 31, 2012, we had 150,000 of our remaining 1,797,790 shares of Solazyme under the following option contracts:

| No. of Shares | Expiration Date | Strike Price |
|---------------|-----------------|--------------|
| 150,000       | March 16, 2013  | \$ 10.00     |

During the twelve months ended December 31, 2012, our strategy for managing our publicly traded positions has generated approximately \$195,717 in net cash proceeds from premiums on call options sold and put options purchased of NeoPhotonics Corporation. We also added approximately \$2,000,500 in gross cash proceeds to our primary liquidity resulting from options called that were covered by a portion of our shares of NeoPhotonics. The net increase in our primary liquidity from these transactions was \$2,196,217. The average sale price on assignments under option contracts of NeoPhotonics was \$5.00 for the year. Our cost basis in NeoPhotonics is \$16.19 per share. As of December 31, 2012, we had 50,000 of our remaining 50,807 shares of NeoPhotonics under the following option contracts:

| No. of Shares | Expiration Date   | Strike Price |
|---------------|-------------------|--------------|
| 50,000        | February 16, 2013 | \$ 7.50      |

### **Current Business Environment**

The fourth quarter of 2012 ended with decreases in value in the public market indices. These decreases coincided with a decrease in the number of IPOs and M&A transactions, though IPO values increased. Compared with 2011, M&A activity was comparable and the number of IPOs decreased by 11 percent. These dynamics continue to lead to a difficult fundraising environment for venture capital firms and for venture-backed companies, particularly those in the middle stages of development.

Eight U.S. venture-backed companies raised \$1.4 billion through IPOs in the fourth quarter of 2012, which is a slight decline in number from the third quarter of 2012 (10 companies) and from the fourth quarter of 2011 (11 companies), according to Dow Jones VentureSource, Thomson Reuters and the National Venture Capital Association ("NVCA"). However, the capital raised increased from the third quarter of 2012 by \$300 million. The capital raised in the fourth quarter of 2012 was approximately half of the capital raised in the same period of 2011. M&A transactions of venture-backed companies remained steady from the third to the fourth quarter, with 95 deals in the fourth quarter. There was a 23 percent decrease in the number of transactions as compared with the fourth quarter of 2011. The number of M&A transactions of venture-backed companies decreased from 488 in 2011 to 435 in 2012 (11 percent decline), according to Thomson Reuters and the NVCA. The average disclosed deal value for venture-backed M&A transactions (26 disclosed of 95 deals) in the fourth quarter of 2012 was \$134 million, which is comparable with the fourth quarter of 2011, but \$100 million less than the third quarter of 2012. The information technology sector dominated these deals, with 65 of the 95 deals. Life sciences companies had 18 deals, with an average disclosed price (12 disclosing of 18) of \$130 million.

Forty-two U.S. venture capital funds raised \$3.3 billion in the fourth quarter of 2012, according to Thomson Reuters and the NVCA. Compared with the third quarter of 2012, this is a 25 percent decrease in the number of funds (down from fifty-three) and a 35 percent decrease in the amount of capital raised (down from \$5.0 billion). The top five venture capital funds accounted for 55 percent of the total fundraising in the fourth quarter, which is comparable with the third quarter. Venture capital fundraising for 2012 totaled \$20.6 billion, a 10 percent increase in commitments as compared with 2011 (\$18.7 billion). This increase in monetary commitments comes despite a three percent decline in the number of funds with closings (182 funds). Of the 182 funds that raised capital, 55 were new funds.

The current business environment is also complicated by global economic uncertainty and regional unrest. It remains unclear if and how the debt crisis in Europe will develop and whether it will result in a slowing of worldwide economic growth or even trigger a further global financial crisis. It is unclear if the rising budget deficits and partisan politics in the United States will result in further downgrades in its credit rating. Any outcome could be heightened potentially should an alternative to U.S. Treasury securities emerge as the global safe-haven for invested capital or should large holders of these securities, such as China, decide to divest of them in large quantities or in full. Further, many of our portfolio companies receive non-dilutive funding through government contracts and grants. Sequestration could have a direct and significant reduction in our portfolio companies' contract or grant awards. Sequestration will also likely result in reduced budgets at research facilities, which will reduce the volume of products they could potentially purchase from our portfolio companies.

All of this uncertainty could lead to a further broad reduction in risk taken by investors and corporations, which could reduce further the capital available to our portfolio companies, could affect the ability of our portfolio companies to build and grow their respective businesses, and could decrease the liquidity options available to our portfolio companies.

Historically, difficult venture environments have resulted in a higher than normal number of companies not receiving financing and being subsequently closed down with a loss to venture investors, and other companies receiving

financing but at significantly lower valuations than the preceding financing rounds. This issue is compounded by the fact that many existing venture capital firms have few remaining years of investment and available capital owing to the finite lifetime of the funds managed by these firms. Additionally, even if a firm was able to raise a new fund, commonly venture capital firms are not permitted to invest new funds in existing investments. This limitation of available capital can lead to fractured syndicates of investors. A fractured syndicate can result in a portfolio company being unable to raise additional capital to fund operations; this issue is especially acute in capital-intensive sectors that are enabled by science-related innovations, such as life sciences, energy and electronics, which are generally not in favor among venture capital firms. The result of these difficulties is that the portfolio company may be forced to sell before reaching its full potential or be shut down entirely if the remaining investors cannot financially support the company. As such, improvements in the exit environment for venture-backed companies through IPOs and M&A transactions may not translate to an increase in the available capital to venture-backed companies, particularly those that have investments from funds that are in the latter stage of life unless the markets improve for some time into the future.



Our overall goal remains unchanged. We want to maintain our leadership position in investing in science-enabled companies, particularly those enabled by nanotechnology and microsystems and to increase our net asset value. The current environment for venture capital financings continues to favor those firms that have capital to invest regardless of the stage of the investee company. We continue to finance our new and follow-on equity and convertible debt investments from our cash reserves held in bank accounts. We may in the future invest borrowed capital to take advantage of opportunities that we believe will return greater than the cost of such borrowed capital. We have historically held, and may in the future again hold, our cash in U.S. Treasury securities. We believe the current status of the venture capital industry and the current economic climate provide opportunities to invest this capital at historically low valuations and under favorable terms in equity and convertible and non-convertible debt of new and existing privately held and publicly traded companies.

### **Valuation of Investments**

We value our privately held venture capital investments each quarter as determined in good faith by our Valuation Committee, a committee of all the independent directors, within guidelines established by our Board of Directors in accordance with the 1940 Act. (See "Footnote to Consolidated Schedule of Investments" contained in "Consolidated Financial Statements.")

The values of privately held, venture capital-backed companies are inherently more difficult than publicly traded companies to assess at any single point in time because securities of these types of companies are not actively traded. We believe, perhaps even more than in the past, that illiquidity, and the perception of illiquidity, can affect value. Management believes further that the long-term effects of the difficult venture capital market and difficult exit environments will continue to affect negatively the fundraising ability of weak companies regardless of near-term improvements in the overall global economy and public markets, and that these factors can also affect value.

In each of the years in the period 2008 through 2012, the Company recorded the following gross write-ups in privately held securities as a percentage of net assets at the beginning of the year ("BOY"), gross write-downs in privately held securities as a percentage of net assets at the beginning of the year, and change in value of private portfolio securities as a percentage of net assets at the beginning of the year.

**Gross Write-Ups and Write-Downs of the Privately Held Portfolio**

|   | 2008            | 2009            | 2010            | 2011            | 2012            |
|---|-----------------|-----------------|-----------------|-----------------|-----------------|
| Net Asset Value, BOY                                      | \$ 138,363,344  | \$ 109,531,113  | \$ 134,158,258  | \$ 146,853,912  | \$ 145,698,407  |
| Gross Write-Downs During Year                             | \$(39,671,588 ) | \$(12,845,574 ) | \$(11,391,367 ) | \$(11,375,661 ) | \$(19,604,046 ) |
| Gross Write-Ups During Year                               | \$ 820,559      | \$ 21,631,864   | \$ 30,051,847   | \$ 11,997,991   | \$ 14,099,904   |
| Gross Write-Downs as a Percentage of Net Asset Value, BOY | (28.67 )%       | (11.7 )%        | (8.5 )%         | (7.8 )%         | (13.5 )%        |
| Gross Write-Ups as a Percentage of Net Asset Value, BOY   | 0.59 %          | 19.7 %          | 22.4 %          | 8.2 %           | 9.7 %           |
| Net Change as a Percentage of Net Asset Value, BOY        | (28.08 )%       | 8.0 %           | 13.9 %          | 0.4 %           | (3.8 )%         |

From December 31, 2011, to December 31, 2012, the value of our equity-focused venture capital portfolio, including our rights to potential future milestone payments from the sale of BioVex Group, Inc., to Amgen, Inc., decreased by \$5,794,638, from \$111,799,351 to \$106,004,713.

Not including our rights to potential future milestone payments from the sale of BioVex Group, Inc., to Amgen, Inc., our equity-focused portfolio companies decreased in value by \$5,832,581. This decrease was primarily owing to 1) a net decrease in the valuations of two of our publicly traded portfolio companies and sales of a portion of our shares of these companies of \$15,062,266. These sales yielded gross cash proceeds to us of \$7,199,723 that are not included in the valuation of these portfolio companies as of December 31, 2012; 2) a net decrease in the values of comparables of \$5,914,918 and 3) a net decrease in value owing to a net increase in discounts for non-performance risk of \$4,458,011. These changes were offset by 1) new and follow-on investments of \$15,141,941 and 2) a net increase in value owing to the terms and pricing of new rounds of financing and indications of value from potential acquirers of \$4,291,036. The remaining component of the change of the value of our equity-focused portfolio companies of \$169,637 was owing to changes in the value of warrants, currency fluctuations and interest on convertible bridge notes.

We note that our Valuation Committee and ultimately our Board of Directors take into account multiple sources of quantitative and qualitative inputs to determine the value of our privately held portfolio companies and our publicly traded portfolio companies whose values are not derived solely from the closing price on the last day of the quarter.

We also note that our Valuation Committee does not set the value of our freely tradable publicly traded portfolio companies, Solazyme, Inc., and NeoPhotonics Corporation. Even though our position in Champions Oncology, Inc., is freely tradable as of December 31, 2012, subjective inputs are also included in the determination of value. Therefore, our Valuation Committee sets the value of this position.

We define non-performance as the risk that the price per share (or implied valuation of a portfolio company) or the effective yield of a debt security of a portfolio company, as applicable, does not appropriately represent the risk that a portfolio company that requires or seeks to raise additional capital will be (a) unable to raise capital, will need to be shut down and will not return our invested capital; or (b) able to raise capital, but at a valuation significantly lower than the implied post-money valuation. Our best estimates of non-performance risk of our portfolio companies during the fourth quarter of 2012 are included in the valuation of the companies as of December 31, 2012. Changes in non-performance risk led to a net decrease in value of \$7,130,210. In the future, as these companies receive terms for additional financings or if they are unable to receive additional financing and, therefore, proceed with sales or shutdowns of the business, we expect the contribution of the discount for non-performance risk to vary in importance in determining the fair values of our securities of these companies. Changes in discounts for non-performance risk could positively or negatively affect the value of our portfolio companies in future quarters. As of December 31, 2012, non-performance risk was a significant factor in determining the values of nine of our 27 equity-focused portfolio companies that are fair valued by our Board of Directors. These nine companies accounted for approximately \$34.6 million, or 33.7 percent, of the total value of our equity-focused venture capital portfolio, not including our rights to milestone payments from the sale of BioVex Group, Inc., to Amgen, Inc. As of December 31, 2011, non-performance risk was a significant factor in determining the values of 10 of our 25 equity-focused portfolio companies that are fair valued by our Board of Directors. These 10 companies accounted for approximately \$30.3 million, or 28 percent, of the total value of our equity-focused venture capital portfolio, not including our rights to milestone payments from the sale of BioVex Group, Inc., to Amgen, Inc.

We also note that our valuation of our securities of Molecular Imprints, Inc., includes \$3,033,338 that is ascribed to a non-convertible bridge note. The principal plus interest of this note was repaid in full in the third quarter of 2011. The remaining value results from a liquidation preference that survived the repayment of the note and, as currently written, would pay the Company \$4,044,450 should the company be sold for more than its outstanding debt and a contractual payment to management of Molecular Imprints. This amount assumes that the total non-convertible bridge note preferences of \$10.5 million are paid in full. Our value of this portion of our securities of Molecular Imprints as of December 31, 2012, reflects a probability-weighted discount applied to the total amount of the preference.

As of December 31, 2012, our top ten investments by value accounted for approximately 73 percent of the value of our equity-focused venture capital portfolio.

## Results of Operations

We present the financial results of our operations utilizing accounting principles generally accepted in the United States of America ("GAAP") for investment companies. On this basis, the principal measure of our financial performance during any period is the net increase (decrease) in our net assets resulting from our operating activities, which is the sum of the following three elements:

*Net Operating Income (Loss)* - the difference between our income from interest, dividends, and fees and our operating expenses.

*Net Realized Gain (Loss) on Investments* - the difference between the net proceeds of sales of portfolio securities and their stated cost, plus income from interests in limited liability companies.

*Net Increase (Decrease) in Unrealized Appreciation or Depreciation on Investments* - the net unrealized change in the value of our investment portfolio.

Owing to the structure and objectives of our business, we generally expect to experience net operating losses and seek to generate increases in our net assets from operations through the long-term appreciation and monetization of our venture capital investments. We have relied, and continue to rely, primarily on proceeds from sales of investments, rather than on investment income, to defray a significant portion of our operating expenses. Because such sales are unpredictable, we attempt to maintain adequate working capital to provide for fiscal periods when there are no such sales. During 2012 and 2011, we made two and three venture debt investments, respectively.

The potential for, or occurrence of, inflation could result in rising interest rates for government-backed debt. This trend would have two effects on our business. First, the spread between the interest rates we can obtain from investing in low-risk government debt versus high-risk venture debt will compress, which would result in a reduction of the risk premium associated with investments in venture debt. We may reduce the number and amount invested in venture debt should this risk premium decrease substantially as to not compensate us adequately for the risk associated with such investments. Second, funds drawn from our line of credit will accrue interest at a rate that fluctuates with either the London Interbank Offered Rate (LIBOR) or the prime rate. LIBOR and the prime rate are expected to increase in times of inflation. Our venture debt investments may include both fixed and floating interest rates. Our net interest income would decrease if the spread between the interest rate on funds from our line of credit and our venture debt investments decrease.



*Comparison of Years Ended December 31, 2012, 2011, and 2010*

During the years ended December 31, 2012, and December 31, 2011, we had net decreases in net assets resulting from operations of \$19,986,900 and \$3,541,363, respectively.

During the year ended December 31, 2010, we had a net increase in net assets resulting from operations of \$10,586,850.

Investment Income and Expenses:

During the years ended December 31, 2012, 2011, and 2010, we had net operating losses of \$8,803,343, \$8,338,365, and \$7,555,807, respectively. The variation in these results is primarily owing to the changes in investment income and operating expenses, including non-cash, stock-based compensation expense of \$2,928,943 in 2012, \$1,894,800 in 2011, and \$2,088,091 in 2010. The increase in non-cash, stock-based compensation expense in 2012 is primarily associated with the compensation cost for restricted stock and the compensation cost for the voluntary cancellation of stock options during the second quarter of 2012. The employees who cancelled stock options realized no value from those options. During the years ended December 31, 2012, 2011, and 2010, total investment income was \$722,227, \$702,765, and \$446,038, respectively. During the years ended December 31, 2012, 2011, and 2010, total operating expenses were \$9,525,570, \$9,041,130, and \$8,001,845, respectively.

During 2012, as compared with 2011, investment income increased from \$702,765 to \$722,227, reflecting an increase in interest income from non-convertible promissory notes, subordinated and senior secured debt, and senior secured debt through a participation agreement, offset by a decrease in interest income from convertible bridge notes and a decrease in our average holdings of U.S. government securities. During the twelve months ended December 31, 2012, we accrued net bridge note interest of \$235,806, as compared with \$368,479 during the twelve months ended December 31, 2011. During the twelve months ended December 31, 2012, our average holdings of U.S. government securities were \$3,884,228, as compared with \$24,295,971 during the twelve months ended December 31, 2011, primarily owing to the decrease in yield available over the durations of maturities in which we were willing to invest and the availability of fully FDIC insured demand deposit bank accounts. The average yield on our U.S. government securities for the twelve months ended December 31, 2012, and 2011, was 0.10 percent and 0.08 percent, respectively.

Operating expenses, including non-cash, stock-based compensation expenses, were \$9,525,570 and \$9,041,130 for the twelve months ended December 31, 2012, and December 31, 2011, respectively. The increase in operating expenses for the twelve months ended December 31, 2012, as compared with the twelve months ended December 31, 2011, was primarily owing to increases in salaries, benefits and stock-based compensation expense, administration and operations expense and rent expense, offset by decreases in professional fees, directors' fees and expenses and custody fees. Salaries, benefits and stock-based compensation expense increased by \$610,527, or 10.2 percent, through December 31, 2012, as compared with December 31, 2011, primarily as a result of an increase in non-cash expense of \$1,034,143 associated with the Stock Plan. In May 2012, the executive officers of the Company voluntarily cancelled all of their outstanding stock options for no consideration. This resulted in a one-time charge of \$1,365,242 to recognize all of the previously unrecognized compensation cost related to these options. While the non-cash, stock-based compensation expense for the Stock Plan increased our operating expenses by \$2,928,943, this increase was offset by a corresponding increase to our additional paid-in capital, resulting in no net impact to our net asset value. We also had increases in salaries of employees owing to cost of living adjustments and costs associated with the hiring of one full-time employee and two part-time employees, offset by a decrease in year-end employee bonus expense of \$425,000 and a decrease of \$415,854 in the projected benefit obligation expense accrual for medical retirement benefits. Administration and operations expense increased by \$33,914, or 3.2 percent, through December 31, 2012, as compared with December 31, 2011, primarily as a result of increases in expenses associated with investor outreach expenses and costs of approximately \$37,898 related to Meet the Portfolio Day. We did not hold a Meet the Portfolio Day during the comparable period in 2011. Rent expense increased by \$32,172, or 8.5 percent, for the period ended December 31, 2012, as compared with the twelve months ended December 31, 2011. Our rent expense of \$408,659 for the twelve months ended December 31, 2012, includes \$418,662 of rent paid in cash, net of \$10,003 non-cash rent expense, credits and abatements that we recognize on a straight-line basis over the lease term. Our rent paid in cash of \$418,662 includes \$9,320 of real estate tax escalation charges on our corporate headquarters located at 1450 Broadway in New York City. Professional fees decreased by \$154,362, or 13.4 percent, through December 31, 2012, as compared with December 31, 2011, primarily as a result of decreases in certain legal and consulting fees associated with investor outreach and marketing efforts, offset by an increase in accounting fees. Directors' fees and expenses decreased by \$43,440, or 12.8 percent, through December 31, 2012, as compared with December 31, 2011, primarily owing to the retirement of two members of our Board of Directors in 2012. Custody fees decreased by \$12,989, or 20.8 percent, for the twelve months ended December 31, 2012, as compared with December 31, 2011, owing to the lower fees charged by our new custodian, Union Bank.

During 2011, as compared with 2010, investment income increased from \$446,038 to \$702,765, reflecting an increase in interest income from convertible bridge notes, non-convertible promissory notes, subordinated and senior secured debt, and senior secured debt through a participation agreement, offset by a decrease in interest earned on our U.S. government securities. During the twelve months ended December 31, 2011, our average holdings of U.S. government securities were \$24,295,971, as compared with \$47,139,264 during the twelve months ended December 31, 2010. The average yield on our U.S. government securities for the twelve months ended December 31, 2011, and 2010, was 0.08 percent and 0.10 percent, respectively. We decreased our average holdings of U.S. government securities and ended 2011 with no holdings of U.S. government securities primarily due to the decrease in yield available over the durations of maturities in which we were willing to invest and the availability of fully FDIC insured demand deposit bank accounts.



Operating expenses, including non-cash, stock-based compensation expenses, were \$9,041,130 and \$8,001,845 for the twelve months ended December 31, 2011, and December 31, 2010, respectively. The increase in operating expenses for the twelve months ended December 31, 2011, as compared with the twelve months ended December 31, 2010, was primarily owing to increases in salaries, benefits and stock-based compensation expense, administration and operations expense and professional fees, offset by decreases in rent expense and custody fees. Salaries, benefits and stock-based compensation expense increased by \$684,801, or 13.0 percent, through December 31, 2011, as compared with December 31, 2010, primarily as a result of an increase of \$529,179 in the projected benefit obligation expense accrual for medical retirement benefits and an increase in year-end employee bonuses of \$400,000, offset by a decrease in non-cash expense of \$193,291 associated with the Stock Plan and a decrease in salaries and benefits owing primarily to a decrease in our head count. While the non-cash, stock-based compensation expense for the Stock Plan increased our operating expenses by \$1,894,800, this increase was offset by a corresponding increase to our additional paid-in capital, resulting in no net impact to our net asset value. Administration and operations expense increased by \$34,977, or 3.5 percent, through December 31, 2011, as compared with December 31, 2010, primarily as a result of an increase in accrued expenses associated with increased investor outreach expenses and a one-time leasing commission expense associated with subletting our office space located 420 Florence Street, Suite 200, Palo Alto, CA, commencing on July 1, 2011, offset by a decrease in our directors' and officers' liability insurance expense, decreases in the cost of non-employee-related insurance and decreases in managing directors' travel-related expenses. Professional fees increased by \$403,608, or 53.6 percent, through December 31, 2011, as compared with December 31, 2010, primarily as a result of an increase in legal and accounting fees of \$50,058 and \$40,000, respectively, associated with exploring alternative means for increasing assets under management by potentially raising one or more third-party funds and increases in consulting fees related to investor outreach and marketing efforts. Rent expense decreased by \$25,745, or 6.4 percent, for the period ended December 31, 2011, as compared with the twelve months ended December 31, 2010. Our rent expense of \$376,487 for the twelve months ended December 31, 2011, includes \$336,265 of rent paid in cash and \$40,222 non-cash rent expense, credits and abatements that we recognize on a straight-line basis over the lease term. For the twelve months ended December 31, 2010, we had a loss of \$56,540 as a result of abandoning our lease at our former office prior to the end of the lease term that expired in April 2010. Custody fees decreased by \$33,662, or 35.1 percent, for the twelve months ended December 31, 2011, as compared with December 31, 2010, owing to the lower fees charged by our new custodian, Union Bank.

#### Realized Income and Losses from Investments:

During the years ended December 31, 2012 and 2011, we realized net gains on investments of \$2,406,433 and \$2,449,705, respectively. During the year ended December 31, 2010, we realized net losses on investments of \$3,740,518. The variation in these results is primarily owing to variations in gross realized gains and losses from investments. For the years ended December 31, 2012, and 2011, we realized gains from investments, before taxes, of \$2,421,669 and \$2,456,627, respectively. For the year ended December 31, 2010, we realized losses from investments, before taxes, of \$3,736,057. Income tax expense for the years ended December 31, 2012, 2011, and 2010 was \$15,236, \$6,922, and \$4,461, respectively.

During the year ended December 31, 2012, we realized net gains of \$2,421,669, consisting primarily of a realized gain of \$4,101,673 on the sale of 506,359 shares of Solazyme, Inc., including the sale of 324,000 shares that were called subject to the terms of call option contracts and a realized gain of \$1,605,907 on the repurchase and expiration of certain Solazyme and NeoPhotonics Corporation written call option contracts, offset by a realized loss of \$4,307,592 on the sale of 400,100 shares of NeoPhotonics that were called subject to the terms of call option contracts. At December 31, 2012, we still owned 1,797,790 shares of Solazyme and 50,807 shares of NeoPhotonics. We had a realized gain of \$464,485 on our escrow payment from the sale of Innovalight, Inc., in 2011. We also had realized gains on our escrow payments from the sales of BioVex Group, Inc., and Crystal IS, Inc.

During the year ended December 31, 2011, we realized net gains of \$2,456,627, consisting primarily of realized gains on our investments in BioVex Group, Inc., of \$7,508,365, Crystal IS, Inc., of \$120,668, and in Siluria Technologies, Inc., of \$25,000, offset by realized losses on our investments in Innovalight, Inc., of \$664,880, Molecular Imprints, Inc., of \$93,405, Polatis, Inc., of \$2,018,278, PolyRemedy, Inc., of \$204,206, Questech Corporation of \$1,966,591, and in TetraVitae Bioscience, Inc., of \$250,000. The realized loss in Molecular Imprints, Inc., was owing to the cashless exercise of the warrant to purchase shares of preferred stock upon its expiration. The cashless exercise resulted in an increase in our ownership of preferred shares as of December 31, 2011.

During the year ended December 31, 2010, we realized net losses of \$3,736,057, consisting primarily of realized losses on a portion of our investment in Kovio, Inc., of \$257,007, on a portion of our investment in Mersana Therapeutics, Inc., of \$190,902, in NanoGram Corporation of \$3,136,552, in Orthovita, Inc., of \$167,300, and realized losses on the disposal of fixed assets, offset by realized gains on our investment in Satcon Technology Corporation of \$14,320 and realized gains on the sale of U.S. government securities. The realized losses on our investments in Kovio, Inc., and Mersana Therapeutics, Inc., were owing to the termination and expiration of certain warrants, respectively. The warrant from Kovio, Inc., was terminated pursuant to the terms of the Series A' financing which closed during the second quarter of 2010. The warrant from Mersana Therapeutics, Inc., expired unexercised on October 21, 2010. On July 11, 2010, NanoGram was acquired for an undisclosed amount; holders of common stock did not receive any proceeds from this transaction. During the second quarter of 2010, we received a dividend payment of \$13,218 representing our pro rata portion of the residual net proceeds from the liquidation of Optiva, Inc. We had invested in Optiva during 2002, and in 2005, it began liquidation under an assignment for the benefit of creditors. This sum represents the final payment from the liquidation.

Net Unrealized Appreciation and Depreciation of Portfolio Securities:

During the year ended December 31, 2012, net unrealized appreciation on total investments decreased by \$13,589,990.

During the year ended December 31, 2011, net unrealized appreciation on total investments increased by \$2,347,297.

During the year ended December 31, 2010, net unrealized depreciation on total investments decreased by \$21,883,175.

During the year ended December 31, 2012, net unrealized appreciation on total investments decreased by \$13,589,990, or 137.9 percent, from net unrealized appreciation of \$9,851,603 at December 31, 2011, to net unrealized depreciation of \$3,738,387 at December 31, 2012. During the year ended December 31, 2011, net unrealized appreciation on total investments increased by \$2,347,297, or 31.3 percent, from net unrealized appreciation of \$7,504,306 at December 31, 2010, to net unrealized appreciation of \$9,851,603 at December 31, 2011.

During the year ended December 31, 2012, net unrealized appreciation on our venture capital investments decreased by \$13,480,234, from net unrealized appreciation of \$9,731,603 at December 31, 2011, to net unrealized depreciation of \$3,748,631 at December 31, 2012, owing primarily to decreases in the valuations of the following investments held:

| Investment                        | Amount of Write-Down |
|-----------------------------------|----------------------|
| Solazyme, Inc.                    | 6,524,259            |
| Bridgelux, Inc.                   | 6,121,656            |
| Ancora Pharmaceuticals Inc.       | 4,330,723            |
| Kovio, Inc.                       | 1,721,913            |
| Mersana Therapeutics, Inc.        | 1,524,629            |
| ABSMaterials, Inc.                | 1,434,082            |
| Contour Energy Systems, Inc.      | 1,279,064            |
| Laser Light Engines, Inc.         | 1,172,892            |
| HzO, Inc.                         | 732,651              |
| Produced Water Absorbents, Inc.   | 721,830              |
| Champions Oncology, Inc.          | 625,107              |
| Senova Systems, Inc.              | 441,363              |
| Cambrios Technologies Corporation | 54,040               |
| SiOnyx, Inc.                      | 50,342               |
| NanoTerra, Inc.                   | 18,861               |

The write-downs for the year ended December 31, 2012, were offset by write-ups in the valuations of the following investments held:

| Investment                        | Amount of Write-Up |
|-----------------------------------|--------------------|
| Xradia, Inc.                      | 5,324,907          |
| Nanosys, Inc.                     | 2,453,186          |
| Adesto Technologies Corporation   | 2,393,372          |
| Nantero, Inc.                     | 1,210,298          |
| Ensemble Therapeutics Corporation | 1,077,795          |
| Cobalt Technologies, Inc.         | 823,029            |

|                           |         |
|---------------------------|---------|
| NeoPhotonics Corporation  | 563,061 |
| D-Wave Systems, Inc.      | 450,972 |
| Enumeral Biomedical Corp. | 215,342 |
| GEO Semiconductor, Inc.   | 16,335  |
| OHSO Clean, Inc.          | 10,742  |
| Metabolon, Inc.           | 22      |

We had an increase in unrealized appreciation of \$37,943 on the rights to milestone payments from Amgen, Inc.'s acquisition of BioVex Group, Inc.

We had an increase in unrealized appreciation owing to foreign currency translation of \$123,904 on our investment in D-Wave Systems, Inc.

We had an increase in unrealized appreciation of \$4,141,035 on our investment in NeoPhotonics Corporation owing to realized losses on the sale of its securities.

We had a decrease in unrealized appreciation of \$5,568,765 on our investment in Solazyme, Inc., owing to realized gains on the sale of its securities.

Unrealized appreciation on our U.S. government securities portfolio increased from unrealized appreciation of \$0 at December 31, 2011, to \$2,744 at December 31, 2012.

During the year ended December 31, 2011, net unrealized appreciation on our venture capital investments increased by \$2,228,565, from net unrealized appreciation of \$7,503,038 at December 31, 2010, to net unrealized appreciation of \$9,731,603 at December 31, 2011, owing primarily to increases in the valuations of the following investments held:

| Investment                        | Amount of Write-Up |
|-----------------------------------|--------------------|
| Solazyme, Inc.                    | \$ 4,193,551       |
| Molecular Imprints, Inc.          | 2,988,447          |
| Bridgelux, Inc.                   | 2,201,705          |
| Metabolon, Inc.                   | 1,979,920          |
| Adesto Technologies Corporation   | 1,571,117          |
| ABSMaterials, Inc.                | 1,125,000          |
| Cambrios Technologies Corporation | 754,344            |
| Kovio, Inc.                       | 620,397            |
| HzO, Inc.                         | 563,577            |
| GEO Semiconductor, Inc.           | 86,583             |
| Enumeral Biomedical Corp.         | 83,333             |
| NanoTerra, Inc.                   | 23,568             |

The write-ups for the year ended December 31, 2011, were offset by write-downs of the following investments held:

| Investment                        | Amount of Write-Down |
|-----------------------------------|----------------------|
| NeoPhotonics Corporation          | \$ 2,734,461         |
| Xradia, Inc.                      | 2,300,249            |
| Laser Light Engines, Inc.         | 2,033,591            |
| Mersana Therapeutics, Inc.        | 1,869,902            |
| Nanosys, Inc.                     | 1,450,495            |
| Ensemble Therapeutics Corporation | 1,075,003            |
| Ancora Pharmaceuticals Inc.       | 952,303              |
| Nantero, Inc.                     | 561,602              |
| Nextreme Thermal Solutions, Inc.  | 550,657              |
| Cobalt Technologies, Inc.         | 246,482              |
| Contour Energy Systems, Inc.      | 206,118              |
| D-Wave Systems, Inc.              | 67,877               |
| Champions Oncology, Inc.          | 26,666               |
| SiOnyx, Inc.                      | 8,189                |

We had an increase in unrealized appreciation for Innovalight, Inc., of \$1,489,110, Molecular Imprints, Inc., of \$121,527, Polatis, Inc., of \$2,018,288, PolyRemedy, Inc., of \$312,313, Questech Corporation of \$1,632,310, and TetraVitae Bioscience, Inc., of \$250,000, owing to realized losses on the sale of these securities. The realized loss on our investment in Molecular Imprints, Inc., was owing to the exercise of certain warrants on December 31, 2011.

We had an increase in unrealized appreciation for Crystal IS, Inc., of \$1,746,837 owing to a realized gain on the sale of its securities.

We had an increase in unrealized appreciation of \$71,041 on the rights to milestone payments from Amgen from its acquisition of BioVex in the first quarter of 2011.

We had a decrease in unrealized appreciation for BioVex of \$7,467,615, which resulted from a realized gain on the sale of its securities.

We had a decrease in unrealized appreciation owing to foreign currency translation of \$53,193 on our investment in D-Wave Systems, Inc.

Unrealized appreciation on our U.S. government securities portfolio decreased from unrealized appreciation of \$1,268 at December 31, 2010, to \$0 at December 31, 2011.

During the year ended December 31, 2010, net unrealized depreciation on our venture capital investments decreased by \$21,869,464, or 152.2 percent, from net unrealized depreciation of \$14,366,426 at December 31, 2009, to net unrealized appreciation of \$7,503,038 at December 31, 2010, owing primarily to increases in the valuations of the following investments held:



| Investment                        | Amount of Write-Up |
|-----------------------------------|--------------------|
| Solazyme, Inc.                    | \$ 10,971,812      |
| BioVex Group, Inc.                | 9,060,913          |
| Xradia, Inc.                      | 3,555,811          |
| SiOnyx, Inc.                      | 3,076,044          |
| D-Wave Systems, Inc.              | 1,121,841          |
| Mersana Therapeutics, Inc.        | 937,882            |
| Ensemble Therapeutics Corporation | 500,000            |
| Laser Light Engines, Inc.         | 118,907            |
| Questech Corporation              | 72,755             |
| Metabolon, Inc.                   | 58,366             |

The write-ups for the year ended December 31, 2010, were partially offset by decreases in the valuations of the following investments held:

| Investment                       | Amount of Write-Down |
|----------------------------------|----------------------|
| Nextreme Thermal Solutions, Inc. | \$ 3,854,600         |
| Molecular Imprints, Inc.         | 2,031,749            |
| Kovio, Inc.                      | 1,750,165            |
| NeoPhotonics Corporation         | 1,519,991            |
| Innovalight, Inc.                | 1,241,665            |
| Ancora Pharmaceuticas Inc.       | 301,573              |
| Nanosys, Inc.                    | 280,649              |
| Bridgelux, Inc.                  | 220,252              |
| TetraVitae Bioscience, Inc.      | 125,000              |
| PolyRemedy, Inc.                 | 53,893               |
| GEO Semiconductor Inc.           | 11,830               |

We had a decrease in unrealized depreciation for Kovio, Inc., of \$227,469, and Mersana Therapeutics, Inc., of \$171,752, owing to the termination and expiration of certain warrants, respectively. The warrant for Kovio, Inc., was terminated pursuant to the terms of the Series A' financing which closed during the second quarter of 2010. The warrant for Mersana Therapeutics, Inc., expired unexercised on October 21, 2010.

We had a decrease in unrealized depreciation for NanoGram Corporation of \$3,136,552, which resulted from a realized loss on such investment during the period. On July 11, 2010, NanoGram was acquired for an undisclosed amount. Holders of common stock did not receive any proceeds from this transaction.

We had a decrease in unrealized depreciation for Orthovita, Inc., of \$72,432 owing to the sale of its securities.



We had a decrease in unrealized depreciation owing to foreign currency translation of \$178,295 on our investment in D-Wave Systems, Inc.

Unrealized depreciation on our U.S. government securities portfolio decreased from unrealized depreciation of \$12,443 at December 31, 2009, to unrealized appreciation of \$1,268 at December 31, 2010.

## **Financial Condition**

### ***December 31, 2012***

At December 31, 2012, our total assets and net assets were \$131,990,250 and \$128,436,774, respectively. At December 31, 2011, they were \$150,343,653 and \$145,698,407, respectively. At December 31, 2012, our net asset value per share was \$4.13 as compared with \$4.70 at December 31, 2011.

At December 31, 2012, our shares outstanding increased to 31,116,881 from 31,000,601 at December 31, 2011, owing to the vesting of 116,280 shares related to restricted stock awards.

Significant developments in the twelve months ended December 31, 2012, included a decrease in the holdings of our venture capital investments of \$5,046,059 and a decrease in our cash of \$11,463,403. The decrease in the value of our venture capital investments from \$113,048,250 at December 31, 2011, to \$108,002,191 at December 31, 2012, resulted primarily from a decrease in the net value of our venture capital investments of \$13,480,234, offset by an increase owing to three new and 27 follow-on investments of \$16,511,941. The decrease in our cash and treasury holdings from \$33,841,394 at December 31, 2011, to \$22,377,991 at December 31, 2012, is primarily owing to the payment of cash for operating expenses of \$6,254,427 and to new and follow-on venture capital investments totaling \$16,511,941, offset by net proceeds of \$7,167,816 received from the sale of certain of our shares of Solazyme, Inc., and NeoPhotonics Corporation, net premium proceeds of \$1,640,557 received from certain Solazyme and NeoPhotonics written call option contracts, \$953,480 from the portion of our upfront payment held in escrow from the sale of BioVex Group, Inc., to Amgen, Inc., and \$11,140 from the portion of our upfront payment held in escrow from the sale of Crystal IS, Inc., to Asahi Kasei Group.

The following table is a summary of additions to our portfolio of venture capital investments made during the twelve months ended December 31, 2012:

| New Investments                           | Amount of Investment |
|---|----------------------|
| AgBiome, LLC (formerly AgInnovation, LLC) | \$ 2,000,000         |
| OpGen, Inc.                               | 815,000              |
| OhSo Clean, Inc.                          | 720,000              |

| Follow-On Investments             | Amount of Investment |
|-----------------------------------|----------------------|
| OpGen, Inc.                       | \$ 2,445,000         |
| Adesto Technologies Corporation   | 1,393,147            |
| SiOnyx, Inc.                      | 1,255,523            |
| Ancora Pharmaceuticals Inc.       | 1,000,000            |
| HzO, Inc.                         | 1,000,000            |
| Enumeral Biomedical Corp.         | 750,000              |
| Senova Systems, Inc.              | 657,692              |
| Kovio, Inc.                       | 588,000              |
| Contour Energy Systems, Inc.      | 480,000              |
| D-Wave Systems, Inc.              | 440,999              |
| Laser Light Engines, Inc.         | 434,784              |
| NanoTerra, Inc.                   | 650,000              |
| Mersana Therapeutics, Inc.        | 316,453              |
| Cambrios Technologies Corporation | 216,168              |
| Ultora, Inc.                      | 215,000              |
| ABSMaterials, Inc.                | 200,000              |
| Laser Light Engines, Inc.         | 186,955              |
| Nantero, Inc.                     | 139,075              |
| Mersana Therapeutics, Inc.        | 124,542              |
| Ensemble Therapeutics Corporation | 109,433              |
| Ultora, Inc.                      | 107,753              |
| Ultora, Inc.                      | 67,821               |
| Ultora, Inc.                      | 64,652               |
| Cobalt Technologies, Inc.         | 45,097               |
| Nanosys, Inc.                     | 43,821               |
| Cobalt Technologies, Inc.         | 29,994               |
| Cobalt Technologies, Inc.         | 15,032               |
| Total                             | \$ 16,511,941        |

### ***December 31, 2011***

At December 31, 2011, our total assets and net assets were \$150,343,653 and \$145,698,407, respectively. At December 31, 2010, they were \$149,289,168 and \$146,853,912, respectively. At December 31, 2011, our net asset value per share was \$4.70 as compared with \$4.76 at December 31, 2010.

At December 31, 2011, our shares outstanding increased to 31,000,601 from 30,878,164 at December 31, 2010, owing to the exercise of 122,437 options. These options provided \$491,058 of cash to the Company.



Significant developments in the twelve months ended December 31, 2011, included an increase in the holdings of our venture capital investments of \$6,897,828 and decreases in our holdings of U.S. government obligations and cash of \$8,190,142. The increase in the value of our venture capital investments from \$106,150,422 at December 31, 2010, to \$113,048,250 at December 31, 2011, resulted primarily from an increase in the net value of our venture capital investments of \$2,228,565 and by five new and 32 follow-on investments of \$19,088,903, offset by the sale of our securities in BioVex Group, Inc., Crystal IS, Inc., Innovalight, Inc., Polatis, Inc., PolyRemedy, Inc., Questech Corporation, Siluria Technologies, Inc., and TetraVitae BioScience, Inc. The decrease in the value of our U.S. government obligations and cash from \$42,031,536 at December 31, 2010, to \$33,841,394 at December 31, 2011, is primarily owing to the payment of cash for operating expenses of \$6,323,055 and to new and follow-on venture capital investments totaling \$19,088,903, offset by cash received from the sale of our securities in BioVex Group, Inc., Crystal IS, Inc., Innovalight, Inc., Polatis, Inc., PolyRemedy, Inc., Questech Corporation and Siluria Technologies, Inc.

The following table is a summary of additions to our portfolio of venture capital investments made during the twelve months ended December 31, 2011:

| New Investments                 | Amount of Investment |
|---------------------------------|----------------------|
| Champions Oncology, Inc.        | \$ 2,000,000         |
| HzO, Inc.                       | 1,666,667            |
| Produced Water Absorbents, Inc. | 750,000              |
| Senova Systems, Inc.            | 692,308              |
|                                 |                      |
| Follow-On Investments           | Amount of Investment |
| Metabolon, Inc.                 | \$ 1,499,999         |
| Ancora Pharmaceuticals Inc.     | 1,300,000            |
| Adesto Technologies Corporation | 1,032,058            |
| Kovio, Inc.                     | 892,315              |
| Molecular Imprints, Inc.        | 866,668              |
| Bridgelux, Inc.                 | 813,805              |
| Contour Energy Systems, Inc.    | 720,000              |
| Enumeral Biomedical Corp.       | 650,000              |
| NeoPhotonics Corporation        | 550,000              |
| Bridgelux, Inc.                 | 538,945              |
| Ancora Pharmaceuticals Inc.     | 500,000              |
| Molecular Imprints, Inc.        | 481,482              |
| Adesto Technologies Corporation | 445,659              |
| D-Wave Systems, Inc.            | 337,579              |
| Mersana Therapeutics, Inc.      | 298,900              |
| Innovalight, Inc.               | 272,369              |
| Ancora Pharmaceuticals Inc.     | 200,000              |
| Ancora Pharmaceuticals Inc.     | 200,000              |

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

|                             |               |
|-----------------------------|---------------|
| Laser Light Engines, Inc.   | 200,000       |
| Innovalight, Inc.           | 181,579       |
| Ultora, Inc.                | 150,500       |
| GEO Semiconductor, Inc.     | 150,000       |
| Cobalt Technologies, Inc.   | 121,560       |
| Ancora Pharmaceuticals Inc. | 100,000       |
| Enumeral Biomedical Corp.   | 99,999        |
| Laser Light Engines, Inc.   | 95,652        |
| Laser Light Engines, Inc.   | 82,609        |
| Ultora, Inc.                | 63,250        |
| ABSMaterials, Inc.          | 60,000        |
| Mersana Therapeutics, Inc.  | 25,000        |
| Mersana Therapeutics, Inc.  | 25,000        |
| Mersana Therapeutics, Inc.  | 25,000        |
| Total                       | \$ 19,088,903 |



The following tables summarize the values of our portfolios of venture capital investments and U.S. government obligations, as compared with their cost, at December 31, 2012, and December 31, 2011:

|   | December 31, 2012 | December 31, 2011 |
|---|-------------------|-------------------|
| Venture capital investments, at cost                      | \$ 111,750,822    | \$ 103,316,647    |
| Net unrealized (depreciation) appreciation <sup>(1)</sup> | (3,748,631        | ) 9,731,603       |
| Venture capital investments, at value                     | \$ 108,002,191    | \$ 113,048,250    |

|  | December 31, 2012 | December 31, 2011 |
|--|-------------------|-------------------|
| U.S. government obligations, at cost       | \$ 13,996,136     | \$ 0              |
| Net unrealized appreciation <sup>(1)</sup> | 2,744             | 0                 |
| U.S. government obligations, at value      | \$ 13,998,880     | \$ 0              |

<sup>(1)</sup>At December 31, 2012, and December 31, 2011, the net accumulated unrealized (depreciation) appreciation on investments was \$3,738,387 and \$9,851,603, respectively.

## **Cash Flow**

### ***Year Ended December 31, 2012***

Net cash used in operating activities for the year ended December 31, 2012, was \$(23,741,522), primarily reflecting the net purchase of U.S. government securities of \$13,993,650, the purchase of venture capital investments of \$16,511,941 and the payment of operating expenses, partially offset by proceeds from the sale of investments of \$8,132,435 and net proceeds from call options of \$1,640,557.

Net cash used in investing activities for the year ended December 31, 2012, was \$15,922, primarily reflecting the purchase of fixed assets.

Cash used in financing activities for the year ended December 31, 2012, was \$1,704,839, resulting from the repayment of our credit facility and the net settlement of restricted stock awards.

### ***Year Ended December 31, 2011***

Net cash provided by operating activities for the year ended December 31, 2011, was \$28,111,456, primarily reflecting net proceeds from the sale of U.S. government securities of \$38,248,334 and the sale of venture capital investments of \$14,547,826, offset by the purchase of venture capital investments of \$19,037,403 and the payment of operating expenses.

Net cash used in investing activities for the year ended December 31, 2011, was \$18,039, primarily reflecting the purchase of fixed assets.

Cash provided by financing activities for the year ended December 31, 2011, was \$1,991,058, resulting from the exercise of stock options, and proceeds from the drawdown of our credit facility.

### ***Year Ended December 31, 2010***

Net cash provided by operating activities for the year ended December 31, 2010, was \$2,214,531, primarily reflecting proceeds from the sale of U.S. government securities of \$17,700,144 and venture capital investments of \$408,899, offset by the purchase of venture capital investments of \$10,050,721 and the payment of operating expenses.

Net cash used in investing activities for the year ended December 31, 2010, was \$89,790, primarily reflecting the purchase of fixed assets.

Cash provided by financing activities for the year ended December 31, 2010, was \$20,713, resulting from the exercise of stock options, offset by the payment of certain offering costs relating to the public follow-on offering that closed on October 9, 2009.

### **Liquidity and Capital Resources**

Our liquidity and capital resources are generated and are generally available through our cash holdings, interest earned on our investments on U.S. government securities, cash flows from the sales of U.S. government securities and payments received on our venture debt investments, proceeds from periodic follow-on equity offerings and realized capital gains retained for reinvestment.

We fund our day-to-day operations using interest earned and proceeds from our cash holdings, the sales of our investments in U.S. government securities, when applicable, and interest earned from our venture debt securities. We believe the increase or decrease in the value of our venture capital investments does not materially affect the day-to-day operations of the Company or our daily liquidity. As of December 31, 2012, and December 31, 2011, we had no investments in money market mutual funds.

We have a \$10 million three-year revolving credit facility with TD Bank, N.A. This credit facility is used to fund our venture debt investments and not for the payment of day-to-day operating expenses. As of December 31, 2012, we had no debt outstanding. We have not issued any debt securities, and, therefore, are not subject to credit agency downgrades.

As a venture capital company, it is critical that we have capital available to support our best companies until we have an opportunity for liquidity in our investments. As such, we will continue to maintain a substantial amount of liquid capital on our balance sheet. However, to complement our equity-focused portfolio investing, we seek to invest some of this capital in venture debt where we will have more defined investment return timelines than we currently have in our existing portfolio. In addition, we may, from time to time, opt to borrow money to make investments in debt securities that generate cash flow and have a known timeframe for return on investment.

Except for a rights offering, we are also generally not able to issue and sell our common stock at a price below our net asset value per share, exclusive of any distributing commission or discount, without shareholder approval. As of December 31, 2012, our net asset value was \$4.13 per share and our closing market price was \$3.30 per share. We do not currently have shareholder approval to issue or sell shares below our net asset value per share.

### ***December 31, 2012***

At December 31, 2012, and December 31, 2011, our total net primary and secondary liquidity was \$38,231,691 and \$65,368,303, respectively.

At December 31, 2012, and December 31, 2011, our total net primary liquidity was \$22,461,202 and \$33,910,442, respectively. Our primary liquidity is principally comprised of our cash, U.S. government securities, when applicable, and certain receivables. The decrease in our primary liquidity from December 31, 2011, to December 31, 2012, is primarily owing to the use of funds for investments and payment of net operating expenses, offset by the receipt of \$953,480 from the portion of our upfront payment held in escrow from the sale of BioVex Group, Inc., to Amgen, Inc., which was released on March 16, 2012, the receipt of \$11,140 from the portion of our upfront payment held in escrow from the sale of Crystal IS, Inc., to Asahi Kasei Group, which was released on April 30, 2012, and \$7,167,816 received from the net sales of portions of our shares of Solazyme, Inc., and NeoPhotonics Corporation. During the year ended December 31, 2012, we also purchased and sold call option contracts on our publicly traded positions generating net premiums of \$1,640,253.

At December 31, 2012, and December 31, 2011, our secondary liquidity was \$15,770,488 and \$31,457,861, respectively. Our secondary liquidity consists of our publicly traded securities. Although these companies are publicly traded, their stock may not trade at high volumes and prices can be volatile, which may restrict our ability to sell our positions at any given time. We may also be restricted for a period of time in selling our positions in these companies due to our shares being unregistered. As of December 31, 2012, none of our publicly traded securities were restricted from sale.

We do not include funds held in escrow from the sale of investments in primary or secondary liquidity. These funds will become primary liquidity if and when they are received at the expiration of the escrow period. On January 24, 2013, we received proceeds of \$949,468 from the release of the Innovalight escrow.

We believe that the current and future venture capital environment may adversely affect the valuation of investment portfolios, lead to tighter lending standards and result in reduced access to capital. These conditions may lead to a decline in net asset value and/or decline in valuations of our portfolio companies in future quarters. Although we cannot predict future market conditions, we continue to believe that our current cash and U.S. government security holdings and our ability to adjust our investment pace will provide us with adequate liquidity to execute our current business strategy.

On January 21, 2010, we moved our corporate headquarters from 111 West 57<sup>th</sup> Street in New York City to 1450 Broadway in New York City. The lease and sublease for our offices at 111 West 57<sup>th</sup> Street expired on April 17, 2010 and on April 29, 2010, respectively. Total rent expense for the office space at 111 West 57<sup>th</sup> Street was \$57,951 in 2010. Our rent expense in 2010 of \$57,951 included \$47,094 of real estate tax escalation charges from 2003 to 2010 paid on the office space at 111 West 57<sup>th</sup> Street.

On September 24, 2009, we signed a ten-year lease for approximately 6,900 square feet of office space located at 1450 Broadway, New York, New York. The lease commenced on January 21, 2010, with these offices replacing our corporate headquarters previously located at 111 West 57<sup>th</sup> Street in New York City. The base rent is \$36 per square foot with a 2.5 percent increase per year over the 10 years of the lease, subject to a full abatement of rent for four months and a rent credit for six months throughout the lease term. The lease expires on December 31, 2019. Total rent expense for this office space in New York City was \$238,202 in 2012, \$230,302 in 2011 and \$215,319 in 2010. Future minimum lease payments in each of the following years are: 2013 - \$244,857; 2014 - \$250,979; 2015 - \$280,673; 2016 - \$287,690; 2017 - \$294,882; and thereafter for the remaining term – an aggregate of \$612,065.

On July 1, 2008, we signed a five-year lease for office space at 420 Florence Street, Suite 200, Palo Alto, California, commencing on August 1, 2008, and expiring on August 31, 2013. Total rent expense for this office space in Palo Alto was \$136,816 in 2012, \$132,831 in 2011, and \$128,962 in 2010. Future minimum lease payments in 2013 are \$93,135.



On April 26, 2011, we signed a one-year lease for office space at 530 Lytton Avenue, 2<sup>nd</sup> Floor, Palo Alto, California, commencing on July 1, 2011, and expiring on June 30, 2012. The lease was renewed commencing on July 1, 2012, and expiring on June 30, 2013. Total rent expense for this office space in Palo Alto was \$28,916 in 2012 and \$13,354 in 2011. Future minimum lease payments in 2013 are \$14,380.

On March 22, 2012, we signed a one-year lease for office space at 140 Preston Executive Drive, Space "L," Cary, North Carolina, commencing on April 1, 2012, and expiring on March 31, 2013. The lease was renewed commencing on April 1, 2013, and expiring on March 31, 2014. Total rent expense for this office space in Cary was \$4,725 in 2012. Future minimum lease payments in 2013 and 2014 are \$6,442 and 1,622, respectively.

### ***December 31, 2011***

At December 31, 2011, and December 31, 2010, our total net primary and secondary liquidity was \$65,368,303 and \$42,079,934, respectively.

At December 31, 2011, and December 31, 2010, our total net primary liquidity was \$33,910,442 and \$42,079,934, respectively. Our primary liquidity is principally comprised of our cash, U.S. government securities, when applicable, and certain receivables. The decrease in our primary liquidity from December 31, 2010, to December 31, 2011, is primarily owing to the use of funds for investments and payment of net operating expenses, offset by the proceeds received from the sale of investments.

At December 31, 2011, and December 31, 2010, our secondary liquidity was \$31,457,861 and \$0, respectively. Our secondary liquidity consists of our publicly traded securities. Although these companies are publicly traded, their stock may not trade at high volumes and prices can be volatile, which may restrict our ability to sell our positions at any given time. We may also be restricted for a period of time in selling our positions in these companies due to our shares being unregistered. As of December 31, 2011, none of our publicly traded securities were restricted from sale.

We do not include funds held in escrow from the sale of investments in primary or secondary liquidity. These funds will become primary liquidity if and when they are received at the expiration of the escrow period.

### **Borrowings**

On February 24, 2011, we established a \$10 million three-year revolving credit facility with TD Bank, N.A., to be used in conjunction with our venture debt investments.



The credit facility, among other things, matures on February 24, 2014, and generally bears interest, at the Company's option, based on (i) LIBOR plus 1.25 percent or (2) the higher of the federal funds rate plus fifty basis points (0.50 percent) or the U.S. prime rate as published in the Wall Street Journal. The credit facility generally requires payment of interest on a monthly basis and requires the payment of a non-use fee of 0.15 percent annually. All outstanding principal is due upon maturity. The credit facility is secured by cash collateral to be held in a non-interest bearing account at TD Bank, N.A. The credit facility contains affirmative and restrictive covenants, including: (a) periodic financial reporting requirements, (b) maintaining our status as a BDC (c) maintaining unencumbered, liquid assets of not less than \$7,500,000, (d) limitations on the incurrence of additional indebtedness, (e) limitations on liens, and (f) limitations on mergers and dissolutions. The credit facility is used to supplement our capital to make additional venture debt investments.

The Company's outstanding debt balance at December 31, 2012, and December 31, 2011, was \$0 and \$1,500,000, respectively. The annual weighted average interest cost for the twelve months ended December 31, 2012, was 1.6 percent, exclusive of amortization of closing fees and other expenses related to establishing the credit facility. The remaining capacity under the credit facility was \$10,000,000 at December 31, 2012. At December 31, 2012, the Company was in compliance with all financial covenants required by the credit facility.

### Contractual Obligations

A summary of our significant contractual payment obligations is as follows:

#### Payments Due by Period

|  | Total       | Less than<br>1 Year | 1-3 Years | 3-5 Years | More Than<br>5 Years |
|--|-------------|---------------------|-----------|-----------|----------------------|
| Revolving credit facility <sup>(1)</sup> | \$0         | \$0                 | \$0       | \$0       | \$0                  |
| Operating leases                         | \$2,086,725 | \$358,814           | \$533,274 | \$582,572 | \$612,065            |

As of December 31, 2012, we had \$10,000,000 of unused borrowing capacity under our credit facility.

### Critical Accounting Policies

The Company's significant accounting policies are described in Note 2 to the Consolidated Financial Statements and in the Footnote to the Consolidated Schedule of Investments. Critical accounting policies are those that are both important to the presentation of our financial condition and results of operations and those that require management's most difficult, complex or subjective judgments. The Company considers the following accounting policies and related estimates to be critical:

#### Valuation of Portfolio Investments

The most significant estimate inherent in the preparation of our consolidated financial statements is the valuation of investments and the related amounts of unrealized appreciation and depreciation of investments recorded. As a BDC, we invest in primarily illiquid securities that generally have no established trading market.

Investments are stated at "value" as defined in the 1940 Act and in the applicable regulations of the SEC and U.S. GAAP. ASC 820 defines fair value, establishes a framework for measuring fair value and expands disclosures about assets and liabilities measured at fair value. ASC 820 provides a consistent definition of fair value that focuses on exit price in the principal, or most advantageous, market and prioritizes, within a measurement of fair value, the use of market-based inputs over entity-specific inputs. ASC 820 also establishes the following three-level hierarchy for fair value measurements based upon the transparency of inputs to the valuation of an asset or liability as of the measurement date.

Level 1 - inputs to the valuation methodology are quoted prices (unadjusted) for identical assets or liabilities in active markets;

Level 2 - inputs to the valuation methodology include quoted prices for similar assets and liabilities in active markets, and inputs that are observable for the asset or liability, either directly or indirectly, for substantially the full term of the financial instrument. Level 2 inputs are in those markets for which there are few transactions, the prices are not current, little public information exists or instances where prices vary substantially over time or among brokered market makers; and

Level 3 - inputs to the valuation methodology are unobservable and significant to the fair value measurement. Unobservable inputs are those inputs that reflect our own assumptions that market participants would use to price the asset or liability based upon the best available information.

See "Note 5. Fair Value of Investments" in the accompanying notes to our Consolidated Financial Statements for additional information regarding fair value measurements.

Value, as defined in Section 2(a)(41) of the 1940 Act, is (i) the market price for those securities for which a market quotation is readily available and (ii) the fair value as determined in good faith by, or under the direction of, the Board of Directors for all other assets. (See "Valuation Procedures" in the "Footnote to Consolidated Schedule of Investments.") As of December 31, 2012, our financial statements include venture capital investments valued at \$93,579,930, the fair values of which were determined in good faith by, or under the direction of, the Board of Directors. As of December 31, 2012, approximately 72.9 percent of our net assets represent investments in portfolio companies at fair value by the Board of Directors.

Determining fair value requires that judgment be applied to the specific facts and circumstances of each portfolio investment, although our valuation policy is intended to provide a consistent basis for determining fair value of the portfolio investments. Factors that may be considered include, but are not limited to, the cost of the Company's investment; transactions in the portfolio company's securities or unconditional firm offers by responsible parties; the financial condition and operating results of the company; the long-term potential of the business and technology of the company; the values of similar securities issued by companies in similar businesses; multiples to revenues, net income or EBITDA that similar securities issued by companies in similar businesses receive; the proportion of the company's

securities we own and the nature of any rights to require the company to register restricted securities under the applicable securities laws; management's assessment of non-performance risk; the achievement of milestones; discounts for restrictions on transfers of publicly traded securities; and the rights and preferences of the class of securities we own as compared with other classes of securities the portfolio has issued.

In addition, with respect to our debt investments for which no readily available market quotations are available, we will generally consider the financial condition and current and expected future cash flows of the portfolio company; the creditworthiness of the portfolio company and its ability to meet its current debt obligations; the relative seniority of our debt investment within the portfolio company's capital structure; the availability and value of any available collateral; and changes in market interest rates and credit spreads for similar debt investments.

Historically, difficult venture capital environments have resulted in companies not receiving financing and being subsequently closed down with a loss of investment to venture investors, and other companies receiving financing but at significantly lower valuations than the preceding rounds, leading to very deep dilution for those who do not participate in the new rounds of investment. Our best estimate of this non-performance risk has been quantified and included in the valuation of our portfolio companies as of December 31, 2012.

All investments recorded at fair value are categorized based upon the level of judgment associated with the inputs used to measure their fair value. Hierarchical levels related to the amount of subjectivity associated with the inputs to fair valuation of these assets, are as follows:

Level 1: Unadjusted quoted prices in active markets for identical assets or liabilities.

Level 2: Quoted prices in active markets for similar assets or liabilities, or quoted prices for identical or similar assets or liabilities in markets that are not active, or inputs other than quoted prices that are observable for the asset or liability.

Level 3: Unobservable inputs for the asset or liability.

As of December 31, 2012, approximately 87 percent of our portfolio company investments were classified as Level 3 in the hierarchy, indicating a high level of judgment required in their valuation.

The values assigned to our assets are based on available information and do not necessarily represent amounts that might ultimately be realized, as these amounts depend on future circumstances and cannot be reasonably determined until the individual investments are actually liquidated or become readily marketable. Upon sale of investments, the values that are ultimately realized may be materially different from what is presently estimated.

#### Stock-Based Compensation

Determining the appropriate fair-value model and calculating the fair value of share-based awards on the date of grant requires judgment. Historically, we have used the Black-Scholes-Merton option pricing model to estimate the fair value of employee stock options.

Management uses the Black-Scholes-Merton option pricing model in instances where we lack historical data necessary for more complex models and when the share award terms can be valued within the model. Other models may yield fair values that are significantly different from those calculated by the Black-Scholes-Merton option pricing model.

Management uses a binomial lattice option pricing model in instances where it is necessary to include a broader array of assumptions. We used the binomial lattice model for the 10-year NQSOs granted on March 18, 2009, and for performance-based restricted stock awards. These awards included accelerated vesting provisions or target stock prices that were based on market conditions.

Option pricing models require the use of subjective input assumptions, including expected volatility, expected life, expected dividend rate, and expected risk-free rate of return. Variations in the expected volatility or expected term assumptions have a significant impact on fair value. As the volatility or expected term assumptions increase, the fair value of the stock option increases. The expected dividend rate and expected risk-free rate of return are not as significant to the calculation of fair value. A higher assumed dividend rate yields a lower fair value, whereas higher assumed interest rates yield higher fair values for stock options.

In the Black-Scholes-Merton model, we use the simplified calculation of expected term as described in the SEC's Staff Accounting Bulletin 107 because of the lack of historical information about option exercise patterns. In the binomial lattice model, we use an expected term that assumes the options will be exercised at two-times the strike price because of the lack of option exercise patterns. Future exercise behavior could be materially different than that which is assumed by the model.

Expected volatility is based on the historical fluctuations in the Company's stock. The Company's stock has historically been volatile, which increases the fair value of the underlying share-based awards.

GAAP requires us to develop an estimate of the number of share-based awards that will be forfeited owing to employee turnover. Quarterly changes in the estimated forfeiture rate can have a significant effect on reported share-based compensation, as the effect of adjusting the rate for all expense amortization after the grant date is recognized in the period the forfeiture estimate is changed. If the actual forfeiture rate proves to be higher than the estimated forfeiture rate, then an adjustment will be made to increase the estimated forfeiture rate, which would result in a decrease to the expense recognized in the financial statements. If the actual forfeiture rate proves to be lower than the estimated forfeiture rate, then an adjustment will be made to decrease the estimated forfeiture rate, which would result in an increase to the expense recognized in the financial statements. Such adjustments would affect our operating expenses and additional paid-in capital, but would have no effect on our net asset value.





### Pension and Post-Retirement Benefit Plan Assumptions

The Company provides a Retiree Medical Benefit Plan for employees who meet certain eligibility requirements. Until it was terminated on May 5, 2011, the Company also provided an Executive Mandatory Retirement Benefit Plan for certain individuals employed by us in a bona fide executive or high policy-making position. Our former President accrued benefits under this plan prior to his retirement, and the termination of the plan has no impact on his accrued benefits. Several statistical and other factors that attempt to anticipate future events are used in calculating the expense and liability values related to our post-retirement benefit plans. These factors include assumptions we make about the discount rate, the rate of increase in healthcare costs, and mortality, among others.

The discount rate reflects the current rate at which the post-retirement medical benefit and pension liabilities could be effectively settled considering the timing of expected payments for plan participants. In estimating this rate, we consider the Citigroup Pension Liability Index in the determination of the appropriate discount rate assumptions. The weighted average rate we utilized to measure our post retirement medical benefit obligation as of December 31, 2012, and to calculate our 2013 expense was 4.25 percent. We used a discount rate of 2.75 percent to calculate our pension obligation for the Executive Mandatory Retirement Benefit Plan.

### **Recent Developments - Portfolio Companies**

In January 2013, we closed our written call option position in NeoPhotonics Corporation, expiring on February 16, 2013, for a payment of \$4,747. In January 2013, we also sold 508 written call option contracts on NeoPhotonics expiring in February 2013, with a strike price of \$5.00. We received premiums of approximately \$28,893 for these contracts. In January 2013 and February 2013, we sold 50,807 shares of NeoPhotonics for net proceeds of approximately \$252,042. We no longer hold any shares of NeoPhotonics.

In January and February 2013, we sold 1,513 written call option contracts on Solazyme, Inc., expiring in February 2013, with a strike price of \$7.50. We received premiums of approximately \$55,467 for these contracts. We also purchased put options on Solazyme expiring in February 2013 with a strike price of \$7.50. We paid premiums of approximately \$53,840.

In January 2013, we sold 1,000 written call option contracts on Solazyme, Inc., expiring in March 2013, with a strike price of \$7.50. We received premiums of approximately \$89,088 for these contracts.

In February 2013, we were assigned on a total of 182,800 shares of Solazyme, Inc., relating to the February and March 2013 written call option contracts. We received net proceeds of approximately \$1,365,053 related to these sales.

In January and February 2013, we sold 1,900 written call option contracts on Solazyme, Inc., expiring in June 2013, with a strike price of \$10.00. We received premiums of approximately \$68,798 for these contracts.

On January 17, 2013, the Company made a \$672,000 follow-on investment in a privately held portfolio company.

On January 23, 2013, the Company made a \$350,000 follow-on investment in Ancora Pharmaceuticals Inc., a privately held portfolio company.

On January 24, 2013, we received \$949,468 upon the release of funds held in escrow from the acquisition of Innovalight, Inc., by DuPont in 2011.

On January 28, 2013, the Company made a \$200,000 follow-on investment in Champions Oncology, Inc., a publicly traded portfolio company.

On March 11, 2013, the Company made a \$28,920 follow-on investment in a privately held portfolio company.

On March 12, 2013, the Company made a \$350,000 follow-on investment in Nano Terra, Inc., a privately held portfolio company.

#### **Item 7A. Quantitative and Qualitative Disclosures About Market Risk.**

Our business activities contain elements of risk. We consider the principal types of market risk to be valuation risk, interest rate risk and foreign currency risk. Although we are risk-seeking rather than risk-averse in our investments, we consider the management of risk to be essential to our business.

#### **Valuation Risk**

Value, as defined in Section 2(a)(41) of the 1940 Act, is (i) the market price for those securities for which market quotations are readily available and (ii) fair value as determined in good faith by, or under the direction of, the Board of Directors for all other assets. (See the "Valuation Procedures" in the "Footnote to Consolidated Schedule of Investments" contained in "Item 8. Consolidated Financial Statements and Supplementary Data.")



Because there is typically no public market for our interests in the privately held small businesses in which we invest, the valuation of the equity interests in that portion of our portfolio is determined in good faith by our Board of Directors with the assistance of our Valuation Committee, comprised of the independent members of our Board of Directors, in accordance with our Valuation Procedures. In the absence of a readily ascertainable market value, the determined value of our portfolio of equity interests may differ significantly from the values that would be placed on the portfolio if a ready market for the equity interests existed. Determining fair value requires that judgment be applied to the specific facts and circumstances of each portfolio investment, although our valuation policy is intended to provide a consistent basis for determining fair value of the portfolio investments. Factors that may be considered include, but are not limited to, readily available public market quotations; the cost of the Company's investment; transactions in the portfolio company's securities or unconditional firm offers by responsible parties; the financial condition and operating results of the company; the long-term potential of the business and technology of the company; the values of similar securities issued by companies in similar businesses; multiples to revenues, net income or EBITDA that similar securities issued by companies in similar businesses receive; the proportion of the company's securities we own and the nature of any rights to require the company to register restricted securities under the applicable securities laws; management's assessment of non-performance risk; the achievement of milestones; and the rights and preferences of the class of securities we own as compared with other classes of securities the portfolio has issued.

In addition, with respect to our debt investments for which no readily available market quotations are available, we will generally consider the financial condition and current and expected future cash flows of the portfolio company; the creditworthiness of the portfolio company and its ability to meet its current debt obligations; the relative seniority of our debt investment within the portfolio company's capital structure; the availability and value of any available collateral; and changes in market interest rates and credit spreads for similar debt investments. Any changes in valuation are recorded in our Consolidated Statements of Operations as "Net increase (decrease) in unrealized appreciation on investments." Changes in valuation of any of our investments in privately held companies from one period to another may be volatile.

Investments in privately held, immature companies are inherently more volatile than investments in more mature businesses. Such immature businesses are inherently fragile and easily affected by both internal and external forces. Our investee companies can lose much or all of their value suddenly in response to an internal or external adverse event. Conversely, these immature businesses can gain suddenly in value in response to an internal or external positive development.

The values assigned to our assets are based on available information and do not necessarily represent amounts that might ultimately be realized, as these amounts depend on future circumstances and cannot be reasonably determined until the individual investments are actually liquidated or become readily marketable. Upon sale of investments, the values that are ultimately realized may be materially different from what is presently estimated.

## **Interest Rate Risk**

Interest rate sensitivity refers to the change in earnings that may result from changes in the level of interest rates. Because we have historically funded a portion of our venture debt investments with borrowings, our net investment income will be affected by the difference between the rate at which we invest and the rate at which we borrow. Our borrowings under our credit facility bear interest, at our option, based on either (a) LIBOR plus 1.25 percent or (2) the higher of the federal funds rate plus 50 basis points or the U.S. prime rate. The interest rates are fixed for the interest period selected. However, these interest periods renew approximately every three months. Therefore, variations in interest rates affect the rates at which we can borrow and may increase our interest expense during any given period. Additionally, in the future, we may fund a portion of our equity investments with borrowings. As a result, there can be no assurance that a significant change in market interest rates will not have a material adverse effect on our net investment income in future quarters. At December 31, 2012, we had no debt outstanding.

We may also invest in both short- and long-term U.S. government and agency securities. To the extent that we invest in short- and long-term U.S. government and agency securities, changes in interest rates result in changes in the value of these obligations that result in an increase or decrease of our net asset value. The level of interest rate risk exposure at any given point in time depends on the market environment, the expectations of future price and market movements, and the quantity and duration of long-term U.S. government and agency securities held by the Company, and it will vary from period to period. If the average interest rate on U.S. government securities at December 31, 2012, were to increase by 25, 75 and 150 basis points, the average value of these securities held by us at December 31, 2012, would decrease by approximately \$35,000, \$105,000 and \$210,000, respectively, and the portion of our net asset value attributable to such securities would decrease correspondingly.

In addition, market interest rates for high-yield corporate debt are an input in determining value of our investments in debt securities of privately held and publicly traded companies. Significant changes in these market rates could affect the value of our debt securities as of the date of measurement of value. Our investment income could be adversely affected should such debt securities include floating interest rates. We do not currently have any investments in debt securities with floating interest rates.

### **Foreign Currency Risk**

Most of our investments are denominated in U.S. dollars. We currently have one investment denominated in Canadian dollars. We are exposed to foreign currency risk related to potential changes in foreign currency exchange rates. The potential loss in fair value on this investment resulting from a 10 percent adverse change in quoted foreign currency exchange rates is \$466,457 at December 31, 2012.

**Item 8. Consolidated Financial Statements and Supplementary Data.**

**HARRIS & HARRIS GROUP, INC.**

**INDEX TO CONSOLIDATED FINANCIAL STATEMENTS AND SCHEDULES**

The following reports and consolidated financial schedules of Harris & Harris Group, Inc. are filed herewith and included in response to Item 8.

|  | Page |
|--|------|
| <u>Documents</u>   |      |
| Management's Report on Internal Control Over Financial Reporting                                       | 94   |
| Report of Independent Registered Public Accounting Firm  | 95   |
| <u>Consolidated Financial Statements</u>   |      |
| Consolidated Statements of Assets and Liabilities as of December 31, 2012, and 2011                    | 97   |
| Consolidated Statement of Operations for the years ended December 31, 2012, 2011, and 2010             | 98   |
| Consolidated Statements of Cash Flows for the years ended December 31, 2012, 2011, and 2010            | 99   |
| Consolidated Statements of Changes in Net Assets for the years ended December 31, 2012, 2011, and 2010 | 100  |
| Consolidated Schedule of Investments as of December 31, 2012   | 101  |
| Consolidated Schedule of Investments as of December 31, 2011   | 115  |
| Footnote to Consolidated Schedule of Investments   | 128  |
| Notes to Consolidated Financial Statements   | 133  |
| Financial Highlights for the years ended December 31, 2012, 2011, and 2010                             | 161  |

Schedules have been omitted because they are not applicable or the required information is presented in the consolidated financial statements and/or related notes.



## **Management's Report on Internal Control Over Financial Reporting**

Management of the Company is responsible for establishing and maintaining adequate internal control over financial reporting. Internal control over financial reporting is defined in Rules 13a-15(f) and 15d-15(f) under the Exchange Act as a process designed by, or under the supervision of, the Company's principal executive and principal financial officers and effected by the Company's Board of Directors, management and other personnel to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles and includes those policies and procedures that:

pertain to the maintenance of records that in reasonable detail accurately and fairly reflect the transactions and dispositions of the assets of the Company;

provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the Company are being made only in accordance with authorizations of management and directors of the Company; and

provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use or disposition of the Company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness of internal control over financial reporting to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

Management has assessed the effectiveness of our internal control over financial reporting as of December 31, 2012. In making its assessment, management used the criteria set forth by the Committee of Sponsoring Organizations of the Treadway Commission (COSO) in Internal Control-Integrated Framework. Based on the results of this assessment, management (including our Chief Executive Officer and Chief Financial Officer) has concluded that, as of December 31, 2012, the Company's internal control over financial reporting was effective.

The effectiveness of the Company's internal control over financial reporting has been audited by PricewaterhouseCoopers LLP, an independent registered public accounting firm, as stated in its report which appears on page 95 of this Annual Report on Form 10-K.

## Report of Independent Registered Public Accounting Firm

To the Board of Directors and Shareholders of Harris & Harris Group, Inc.:

In our opinion, the accompanying consolidated statements of assets and liabilities, including the consolidated schedules of investments, and the related consolidated statements of operations, of changes in net assets, and of cash flows and the financial highlights present fairly, in all material respects, the financial position of Harris & Harris Group, Inc. and its subsidiaries (hereafter referred to as the “Company”) at December 31, 2012 and December 31, 2011, and the results of their operations, their cash flows, the changes in their net assets, and the financial highlights for each of the three years in the period ended December 31, 2012 in conformity with accounting principles generally accepted in the United States of America. Also in our opinion, the Company maintained, in all material respects, effective internal control over financial reporting as of December 31, 2012 based on criteria established in *Internal Control - Integrated Framework* issued by the Committee of Sponsoring Organizations of the Treadway Commission (COSO). The Company’s management is responsible for these financial statements, for maintaining effective internal control over financial reporting and for its assessment of the effectiveness of internal control over financial reporting, included in Management’s Report on Internal Control over Financial Reporting listed in the accompanying index. Our responsibility is to express opinions on these financial statements and on the Company’s internal control over financial reporting based on our integrated audits. We conducted our audits in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audits to obtain reasonable assurance about whether the financial statements are free of material misstatement and whether effective internal control over financial reporting was maintained in all material respects. Our audits of the financial statements included examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, and evaluating the overall financial statement presentation. Our audit of internal control over financial reporting included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, and testing and evaluating the design and operating effectiveness of internal control based on the assessed risk. Our audits also included performing such other procedures as we considered necessary in the circumstances. We believe that our audits provide a reasonable basis for our opinions.

As discussed in Note 2, the financial statements include fair value measurements which have been estimated by the Board of Directors using significant unobservable inputs in the absence of observable inputs. Those estimated fair values may differ significantly from fair values measured using observable inputs. As discussed in Note 2, at December 31, 2012, fair value measurements estimated using significant unobservable inputs are \$93,579,930 (72.87% of the net assets).

A company's internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles. A company's internal control over financial reporting includes those policies and procedures that (i) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (ii) provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the company are being made only in accordance with authorizations of management and directors of the company; and (iii) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use, or disposition of the company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

/s/ PricewaterhouseCoopers LLP

New York, New York

March 15, 2013

**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED STATEMENTS OF ASSETS AND LIABILITIES**

|  | December 31, 2012 | December 31, 2011 |
|--|-------------------|-------------------|
| <b>ASSETS</b>  |                   |                   |
| Investments, in portfolio securities at value:   |                   |                   |
| Unaffiliated privately held companies<br>(cost: \$29,365,558 and \$23,794,145, respectively)   | \$ 24,949,756     | \$ 23,748,247     |
| Unaffiliated rights to milestone payments<br>(adjusted cost basis: \$3,291,750 and \$3,291,750, respectively)  | 3,400,734         | 3,362,791         |
| Unaffiliated publicly traded securities<br>(cost: \$5,070,447 and \$12,743,787, respectively)  | 14,422,261        | 29,484,527        |
| Non-controlled affiliated privately held companies<br>(cost: \$57,789,263 and \$48,968,029, respectively)  | 60,792,397        | 47,601,785        |
| Non-controlled affiliated publicly traded companies<br>(cost: \$2,000,000 and \$2,000,000, respectively)   | 1,348,227         | 1,973,334         |
| Controlled affiliated privately held companies<br>(cost: \$14,233,804 and \$12,518,936, respectively)  | 3,088,816         | 6,877,566         |
| Total, investments in private portfolio companies, rights to<br>milestone payments and public securities at value<br>(cost: \$111,750,822 and \$103,316,647, respectively) | \$ 108,002,191    | \$ 113,048,250    |
| Investments, in U.S. Treasury obligations at value<br>(cost: \$13,996,136 and \$0, respectively)   | 13,998,880        | 0                 |
| Cash   | 8,379,111         | 33,841,394        |
| Restricted funds (Note 2)  | 10,015            | 1,512,031         |
| Funds held in escrow from sales of investments, at value (Note 2)  | 1,052,345         | 1,064,234         |
| Receivable from portfolio company  | 23,830            | 37,331            |
| Interest receivable  | 49,068            | 14,635            |
| Prepaid expenses   | 97,410            | 398,858           |
| Other assets   | 377,400           | 426,920           |
| Total assets   | \$ 131,990,250    | \$ 150,343,653    |
| <b>LIABILITIES &amp; NET ASSETS</b>  |                   |                   |
| Post retirement plan liabilities (Note 9)  | \$ 1,876,447      | \$ 1,660,958      |
| Revolving loan (Note 4)  | 0                 | 1,500,000         |
| Accounts payable and accrued liabilities   | 1,262,202         | 906,910           |
| Deferred rent  | 368,977           | 378,980           |
| Written call options payable (premiums received:<br>\$50,000 and \$315,000, respectively) (Note 6)   | 42,500            | 195,000           |
| Debt interest and other payable  | 3,350             | 3,398             |
| Total liabilities  | 3,553,476         | 4,645,246         |
| Net assets   | \$ 128,436,774    | \$ 145,698,407    |
| Net assets are comprised of:   | \$ 0              | \$ 0              |

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

|  |                |   |                |
|--|----------------|---|----------------|
| Preferred stock, \$0.10 par value,<br>2,000,000 shares authorized; none issued   |                |   |                |
| Common stock, \$0.01 par value, 45,000,000 shares authorized at<br>12/31/12 and 12/31/11; 32,945,621 issued at 12/31/12<br>and 32,829,341 issued at 12/31/11 | 329,456        |   | 328,294        |
| Additional paid in capital (Note 7)  | 213,194,474    |   | 210,470,369    |
| Accumulated net operating and realized loss  | (77,943,238    | ) | (71,546,328 )  |
| Accumulated unrealized (depreciation) appreciation of investments  | (3,738,387     | ) | 9,851,603      |
| Treasury stock, at cost (1,828,740 shares at 12/31/12 and 12/31/11)  | (3,405,531     | ) | (3,405,531 )   |
| Net assets   | \$ 128,436,774 |   | \$ 145,698,407 |
| Shares outstanding   | 31,116,881     |   | 31,000,601     |
| Net asset value per outstanding share  | \$ 4.13        |   | \$ 4.70        |

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

**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED STATEMENTS OF OPERATIONS**

|   | Year Ended<br>December 31,<br>2012 | Year Ended<br>December 31,<br>2011 | Year Ended<br>December 31,<br>2010 |
|---|------------------------------------|------------------------------------|------------------------------------|
| Investment income:  |                                    |                                    |                                    |
| Interest from:  |                                    |                                    |                                    |
| Unaffiliated companies  | \$ 252,138                         | \$ 252,326                         | \$ 37,708                          |
| Non-controlled affiliated companies                                   | 91,500                             | 134,358                            | 117,377                            |
| Controlled affiliated companies                                       | 169,554                            | 176,629                            | 211,220                            |
| Cash and U.S. Treasury obligations and other                          | 45,175                             | 38,167                             | 49,483                             |
| Miscellaneous income  | 163,860                            | 101,285                            | 30,250                             |
| Total investment income   | 722,227                            | 702,765                            | 446,038                            |
| Expenses:   |                                    |                                    |                                    |
| Salaries, benefits and stock-based compensation<br>(Note 7)           | 6,582,714                          | 5,972,187                          | 5,287,386                          |
| Administration and operations   | 1,079,653                          | 1,045,739                          | 1,010,762                          |
| Professional fees   | 1,001,772                          | 1,156,134                          | 752,526                            |
| Rent (Note 2)   | 408,659                            | 376,487                            | 402,232                            |
| Directors' fees and expenses  | 296,708                            | 340,148                            | 345,000                            |
| Custody fees  | 49,349                             | 62,338                             | 96,000                             |
| Depreciation  | 58,589                             | 51,153                             | 51,399                             |
| Interest and other debt expense                                       | 48,126                             | 36,944                             | 0                                  |
| Lease termination costs   | 0                                  | 0                                  | 56,540                             |
| Total expenses  | 9,525,570                          | 9,041,130                          | 8,001,845                          |
| Net operating loss  | (8,803,343                         | ) (8,338,365                       | ) (7,555,807                       |
| Net realized gain (loss):   |                                    |                                    |                                    |
| Realized gain (loss) from investments:                                |                                    |                                    |                                    |
| Unaffiliated companies  | 546,055                            | 4,967,511                          | 13,218                             |
| Non-controlled affiliated companies                                   | 475,844                            | (2,510,802                         | ) (3,584,461                       |
| Publicly traded companies   | (205,919                           | ) 0                                | (152,980                           |
| Written call options  | 1,605,907                          | 0                                  | 0                                  |
| U.S. Treasury obligations/other                                       | (218                               | ) (82                              | ) (11,834                          |
| Realized gain (loss) from investments                                 | 2,421,669                          | 2,456,627                          | (3,736,057                         |
| Income tax expense (Note 10)  | 15,236                             | 6,922                              | 4,461                              |
| Net realized gain (loss) from investments                             | 2,406,433                          | 2,449,705                          | (3,740,518                         |
| Net (decrease) increase in unrealized<br>appreciation on investments: |                                    |                                    |                                    |
| Change as a result of investment sales                                | (1,427,730                         | ) 74,649                           | 3,608,205                          |
| Change on investments held  | (12,049,760                        | ) 2,152,648                        | 18,274,970                         |
| Change on written call options  | (112,500                           | ) 120,000                          | 0                                  |

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

|   |                |   |               |                 |
|---|----------------|---|---------------|-----------------|
| Net (decrease) increase in unrealized appreciation on investments | (13,589,990    | ) | 2,347,297     | 21,883,175      |
| Net realized and unrealized (loss) gain on investments            | \$ (11,183,557 | ) | \$ 4,797,002  | \$ 18,142,657   |
| Net (decrease) increase in net assets resulting from operations   | \$ (19,986,900 | ) | \$ (3,541,363 | ) \$ 10,586,850 |
| Per average basic and diluted outstanding share                   | \$ (0.65       | ) | \$ (0.12      | ) \$ 0.34       |
| Weighted average outstanding shares                               | 31,000,919     |   | 30,980,221    | 30,866,239      |

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

**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED STATEMENTS OF CASH FLOWS**

|  | Year Ended<br>December 31,<br>2012 | Year Ended<br>December 31,<br>2011 | Year Ended<br>December 31,<br>2010 |
|--|------------------------------------|------------------------------------|------------------------------------|
| Cash flows (used in) provided by operating activities:   |                                    |                                    |                                    |
| Net (decrease) increase in net assets resulting from operations  | \$ (19,986,900                     | ) \$ (3,541,363                    | ) \$ 10,586,850                    |
| Adjustments to reconcile net increase (decrease) in net assets resulting from operations to net cash used in operating activities: |                                    |                                    |                                    |
| Net realized and unrealized loss (gain) on investments   | 11,168,321                         | (4,803,924                         | ) (18,147,118 )                    |
| Depreciation of fixed assets, amortization of premium or discount on U.S. government securities, and bridge note interest          | (161,781                           | ) (327,378                         | ) (341,861 )                       |
| Stock-based compensation expense   | 2,928,943                          | 1,894,800                          | 2,088,091                          |
| Purchase of U.S. government securities   | (36,492,162                        | ) (100,032,726                     | ) (62,244,735 )                    |
| Sale of U.S. government securities   | 22,498,512                         | 138,281,060                        | 79,944,879                         |
| Purchase of affiliated portfolio companies   | (14,102,326                        | ) (14,766,443                      | ) (6,382,357 )                     |
| Purchase of unaffiliated portfolio companies   | (2,409,615                         | ) (4,270,960                       | ) (3,668,364 )                     |
| Principal payments received on debt investments  | 623,428                            | 1,591,554                          | 0                                  |
| Proceeds from sale of investments and conversion of bridge notes   | 8,201,603                          | 14,547,826                         | 408,899                            |
| Proceeds from call option premiums   | 3,082,636                          | 315,000                            | 0                                  |
| Payments for call option purchases   | (1,442,079                         | ) 0                                | 0                                  |
| Changes in assets and liabilities:   |                                    |                                    |                                    |
| Restricted funds   | 1,502,016                          | (1,509,280                         | ) (751 )                           |
| Receivable from portfolio company  | 13,501                             | (27,331                            | ) 18,247                           |
| Interest receivable  | (34,433                            | ) 16,303                           | (2,883 )                           |
| Prepaid expenses   | 301,448                            | (19,153                            | ) (285,576 )                       |
| Other receivables  | 0                                  | 4,446                              | 7,187                              |
| Return of security deposits on leased properties   | 0                                  | 0                                  | 44,376                             |
| Other assets   | 6,636                              | 244,035                            | (294,766 )                         |
| Post retirement plan liabilities   | 215,489                            | 154,052                            | 137,063                            |
| Accounts payable and accrued liabilities   | 355,244                            | 320,716                            | 10,430                             |
| Deferred rent  | (10,003                            | ) 40,222                           | 336,920                            |
| Net cash (used in) provided by operating activities  | (23,741,522                        | ) 28,111,456                       | 2,214,531                          |
| Cash flows from investing activities:  |                                    |                                    |                                    |
| Purchase of fixed assets   | (15,922                            | ) (18,039                          | ) (89,790 )                        |
| Net cash used in investing activities  | (15,922                            | ) (18,039                          | ) (89,790 )                        |



Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

Cash flows from financing activities:

|  |                |            |               |              |
|--|----------------|------------|---------------|--------------|
| Payment of offering costs                                  | 0              | 0          | (48,928       | )            |
| Proceeds from stock option exercises (Note 7)              | 0              | 491,058    | 69,641        |              |
| Proceeds from drawdown of credit facility (Note 4)         | 0              | 1,500,000  | 0             |              |
| Payment of credit facility (Note 4)                        | (1,500,000     | )          | 0             |              |
| Withholdings related to net settlement of restricted stock | (204,839       | )          | 0             |              |
| Net cash provided by financing activities                  | (1,704,839     | )          | 1,991,058     | 20,713       |
| Net increase in cash:                                      |                |            |               |              |
| Cash at beginning of the year                              | 33,841,394     | 3,756,919  | 1,611,465     |              |
| Cash at end of the year                                    | 8,379,111      | 33,841,394 | 3,756,919     |              |
| Net (decrease) increase in cash                            | \$ (25,462,283 | )          | \$ 30,084,475 | \$ 2,145,454 |
| Supplemental disclosures of cash flow information:         |                |            |               |              |
| Income taxes paid  | \$ 8,075       | \$ 2,476   | \$ 4,461      |              |
| Interest paid  | \$ 27,112      | \$ 26,608  | \$ 0          |              |

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

**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED STATEMENTS OF CHANGES IN NET ASSETS**

|  | Year Ended<br>December 31,<br>2012 | Year Ended<br>December 31,<br>2011 | Year Ended<br>December 31,<br>2010 |
|--|------------------------------------|------------------------------------|------------------------------------|
| Changes in net assets from operations:   |                                    |                                    |                                    |
| Net operating loss   | \$ (8,803,343                      | ) \$ (8,338,365                    | ) \$ (7,555,807                    |
| Net realized gain (loss) on investments  | 2,406,433                          | 2,449,705                          | (3,740,518                         |
| Net (decrease) increase in unrealized appreciation on investments as a result of sales | (1,427,730                         | ) 74,649                           | 3,608,205                          |
| Net (decrease) increase in unrealized appreciation on investments held                 | (12,049,760                        | ) 2,152,648                        | 18,274,970                         |
| Net (decrease) increase in unrealized appreciation on written call options             | (112,500                           | ) 120,000                          | 0                                  |
| Net (decrease) increase in net assets resulting from operations                        | (19,986,900                        | ) (3,541,363                       | ) 10,586,850                       |
| Changes in net assets from capital stock transactions:                                 |                                    |                                    |                                    |
| Issuance of common stock upon the exercise of stock options                            | 0                                  | 1,224                              | 186                                |
| Payment of employee withholding on net settlement of vested restricted stock awards    | (203,676                           | ) 0                                | 0                                  |
| Additional paid in capital on common stock issued net of offering expenses             | 0                                  | 489,834                            | 20,527                             |
| Stock-based compensation expense   | 2,928,943                          | 1,894,800                          | 2,088,091                          |
| <b>Net increase in net assets resulting from capital stock transactions</b>            | <b>2,725,267</b>                   | <b>2,385,858</b>                   | <b>2,108,804</b>                   |
| Net (decrease) increase in net assets  | (17,261,633                        | ) (1,155,505                       | ) 12,695,654                       |
| Net Assets:  |                                    |                                    |                                    |
| Beginning of the year  | 145,698,407                        | 146,853,912                        | 134,158,258                        |
| End of the year  | \$ 128,436,774                     | \$ 145,698,407                     | \$ 146,853,912                     |

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



**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012**

|  | Method of<br>Valuation<br>(1) | Primary<br>Industry (2) | Cost        | Shares/<br>Principal | Value     |
|--|-------------------------------|-------------------------|-------------|----------------------|-----------|
| Investments in Unaffiliated Companies (3) –<br>33.3% of net assets at value  |                               |                         |             |                      |           |
| Private Placement Portfolio (Illiquid) (4) –<br>19.4% of net assets at value |                               |                         |             |                      |           |
| Bridgelux, Inc. (7)(8)   |                               |                         |             |                      |           |
| Manufacturing high-power light emitting diodes<br>(LEDs) and arrays          |                               |                         |             |                      |           |
| Series B Convertible Preferred Stock   | (M)                           | Energy                  | \$1,000,000 | 1,861,504            | \$426,744 |
| Series C Convertible Preferred Stock   | (M)                           |                         | 1,352,196   | 2,130,699            | 488,456   |
| Series D Convertible Preferred Stock   | (M)                           |                         | 1,371,622   | 999,999              | 356,865   |
| Series E Convertible Preferred Stock   | (M)                           |                         | 672,599     | 440,334              | 520,495   |
| Series E-1 Convertible Preferred Stock                                       | (M)                           |                         | 534,482     | 399,579              | 368,251   |
| Warrants for Series C Convertible Preferred<br>Stock expiring 12/31/14       | (I)                           |                         | 168,270     | 163,900              | 11,210    |
| Warrants for Series D Convertible Preferred<br>Stock expiring 8/26/14        | (I)                           |                         | 88,531      | 124,999              | 8,295     |
| Warrants for Series D Convertible Preferred<br>Stock expiring 3/10/15        | (I)                           |                         | 40,012      | 41,666               | 3,976     |
| Warrants for Series E Convertible Preferred<br>Stock expiring 12/31/17       | (I)                           |                         | 93,969      | 170,823              | 144,181   |
| Warrants for Common Stock expiring 6/1/16                                    | (I)                           |                         | 72,668      | 132,100              | 3,308     |
| Warrants for Common Stock expiring 10/21/18                                  | (I)                           |                         | 18,816      | 84,846               | 3,800     |
|  |                               |                         | 5,413,165   |                      | 2,335,581 |
| Cambrios Technologies Corporation (7)(9)(10)                                 |                               |                         |             |                      |           |
| Developing nanowire-enabled electronic<br>materials for the display industry |                               |                         |             |                      |           |
| Series B Convertible Preferred Stock   | (M)                           | Electronics             | 1,294,025   | 1,294,025            | 700,454   |
| Series C Convertible Preferred Stock   | (M)                           |                         | 1,300,000   | 1,300,000            | 703,688   |
| Series D Convertible Preferred Stock   | (M)                           |                         | 515,756     | 515,756              | 870,338   |
| Series D-2 Convertible Preferred Stock                                       | (M)                           |                         | 92,400      | 92,400               | 86,625    |
| Series D-4 Convertible Preferred Stock                                       | (M)                           |                         | 216,168     | 216,168              | 202,658   |
|  |                               |                         | 3,418,349   |                      | 2,563,763 |
| Cobalt Technologies, Inc. (7)(9)(11)   |                               |                         |             |                      |           |
| Energy   |                               |                         |             |                      |           |

|  |     |         |          |           |
|--|-----|---------|----------|-----------|
| Developing processes for making bio-butanol through biomass fermentation |     |         |          |           |
| Series C-1 Convertible Preferred Stock                                   | (M) | 749,998 | 352,112  | 933,802   |
| Series D-1 Convertible Preferred Stock                                   | (M) | 122,070 | 48,828   | 140,664   |
| Series E-1 Convertible Preferred Stock                                   | (M) | 42,328  | 16,890   | 41,143    |
| Secured Convertible Bridge Note, 10%, acquired 5/25/12                   | (M) | 47,828  | \$45,097 | 47,828    |
| Warrants for Series E-1 Pref. Stock expiring on 10/9/22                  | (I) | 2,781   | 1,407    | 3,116     |
|  |     | 965,005 |          | 1,166,553 |

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

## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|  | Method of<br>Valuation<br>(1) | Primary<br>Industry (2) | Cost        | Shares/<br>Principal | Value     |
|--|-------------------------------|-------------------------|-------------|----------------------|-----------|
| Investments in Unaffiliated Companies (3) –<br>33.3% of net assets at value (Cont.)  |                               |                         |             |                      |           |
| Private Placement Portfolio (Illiquid) (4) –<br>19.4% of net assets at value (Cont.)   |                               |                         |             |                      |           |
| Ensemble Therapeutics Corporation (7)(9)(12)<br>Developing DNA-Programmed Chemistry™<br>for the discovery of new classes of therapeutics   |                               |                         |             |                      |           |
| Life Sciences  |                               |                         |             |                      |           |
| Series B Convertible Preferred Stock   | (M)                           |                         | \$2,000,000 | 1,449,275            | \$0       |
| Secured Convertible Bridge Note, 8%, acquired<br>9/11/08   | (M)                           |                         | 336,550     | \$250,211            | 1,563,344 |
| Secured Convertible Bridge Note, 8%, acquired<br>12/10/09  | (M)                           |                         | 60,858      | \$48,868             | 300,461   |
| Secured Convertible Bridge Note, 8%, acquired<br>1/25/12   | (M)                           |                         | 117,634     | \$109,400            | 654,027   |
|  |                               |                         | 2,515,042   |                      | 2,517,832 |
| GEO Semiconductor Inc. (13)<br>Developing programmable, high-performance<br>video and geometry processing solutions<br>Participation Agreement with Montage<br>Capital relating to the following assets: |                               |                         |             |                      |           |
| Electronics  |                               |                         |             |                      |           |
| Senior secured debt, 13.75%, maturing on<br>1/15/13  | (I)                           |                         | 285,125     | \$375,801            | 347,830   |
| Warrants for Series A Pref. Stock expiring on<br>9/17/17   | (I)                           |                         | 66,684      | 100,000              | 79,796    |
| Warrants for Series A-1 Pref. Stock expiring on<br>6/30/18   | (I)                           |                         | 23,566      | 34,500               | 28,013    |
| Loan and Security Agreement with GEO<br>Semiconductor<br>relating to the following assets:   |                               |                         |             |                      |           |
| Subordinated secured debt, 15.75%, maturing<br>on 1/15/13  | (I)                           |                         | 109,574     | \$125,000            | 120,410   |
| Warrants for Series A Pref. Stock expiring on<br>3/1/18  | (I)                           |                         | 7,512       | 10,000               | 7,511     |
| Warrants for Series A-1 Pref. Stock expiring on<br>6/29/18   | (I)                           |                         | 7,546       | 10,000               | 7,535     |
|  |                               |                         | 500,007     |                      | 591,095   |
| Mersana Therapeutics, Inc. (7)(9)(14)  |                               |                         |             |                      |           |
| Life Sciences  |                               |                         |             |                      |           |

Developing treatments for cancer based on  
novel drug delivery polymers

|  |     |           |         |         |
|--|-----|-----------|---------|---------|
| Series A-1 Convertible Preferred Stock | (M) | 316,453   | 294,019 | 316,453 |
| Common Stock                           | (M) | 3,875,395 | 350,539 | 108,667 |
|  |     | 4,191,848 |         | 425,120 |

Molecular Imprints, Inc. (7)(10)(15)

Electronics

Manufacturing nanoimprint

lithography capital equipment

|                                      |     |           |           |           |
|--------------------------------------|-----|-----------|-----------|-----------|
| Series B Convertible Preferred Stock | (M) | 2,000,000 | 1,333,333 | 1,789,108 |
| Series C Convertible Preferred Stock | (M) | 2,406,595 | 1,285,071 | 2,138,498 |
| Non-Convertible Bridge Note          | (I) | 0         | \$0       | 3,033,338 |
|                                      |     | 4,406,595 |           | 6,960,944 |

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

## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|  | Method of<br>Valuation<br>(1) | Primary<br>Industry (2) | Cost         | Shares/<br>Principal | Value      |
|--|-------------------------------|-------------------------|--------------|----------------------|------------|
| Investments in Unaffiliated Companies (3) –<br>33.3% of net assets at value (Cont.)                  |                               |                         |              |                      |            |
| Private Placement Portfolio (Illiquid) (4) –<br>19.4% of net assets at value (Cont.)                 |                               |                         |              |                      |            |
| Nanosys, Inc. (7)  |                               | Energy                  |              |                      |            |
| Developing inorganic nanowires and<br>quantum dots for use in LED-backlit devices                    |                               |                         |              |                      |            |
| Series C Convertible Preferred Stock   | (M)                           |                         | \$ 1,500,000 | 803,428              | \$ 186,032 |
| Series D Convertible Preferred Stock   | (M)                           |                         | 3,000,003    | 1,016,950            | 2,814,423  |
| Series E Convertible Preferred Stock   | (M)                           |                         | 496,573      | 433,688              | 698,783    |
| Unsecured Convertible Bridge Note, 4%,<br>acquired 7/16/12   | (M)                           |                         | 44,633       | \$43,821             | 249,067    |
|  |                               |                         | 5,041,209    |                      | 3,948,305  |
| Nano Terra, Inc. (9)   |                               | Energy                  |              |                      |            |
| Developing surface chemistry and nano-<br>manufacturing solutions                                    |                               |                         |              |                      |            |
| Senior secured debt, 12.0%, maturing on<br>12/1/15   | (I)                           |                         | 614,597      | \$ 650,000           | 622,600    |
| Warrants for Series A-2 Pref. Stock expiring<br>on 2/22/21   | (I)                           |                         | 69,168       | 446,248              | 66,003     |
| Warrants for Series C Pref. Stock expiring on<br>11/15/22  | (I)                           |                         | 35,403       | 241,662              | 35,271     |
|  |                               |                         | 719,168      |                      | 723,874    |
| Nantero, Inc. (7)(9)(10)   |                               | Electronics             |              |                      |            |
| Developing a high-density, nonvolatile,<br>random access memory chip, enabled<br>by carbon nanotubes |                               |                         |              |                      |            |
| Series A Convertible Preferred Stock   | (M)                           |                         | 489,999      | 345,070              | 1,349,224  |
| Series B Convertible Preferred Stock   | (M)                           |                         | 323,000      | 207,051              | 809,569    |
| Series C Convertible Preferred Stock   | (M)                           |                         | 571,329      | 188,315              | 736,312    |
| Series D Convertible Preferred Stock   | (M)                           |                         | 139,075      | 35,569               | 139,075    |
|  |                               |                         | 1,523,403    |                      | 3,034,180  |
| OHSO Clean, Inc. (16)(17)  |                               | Life Sciences           |              |                      |            |
| Developing natural, hypoallergenic household<br>cleaning products enabled by nanotechnology-         |                               |                         |              |                      |            |



enabled formulations of thyme oil

Participation Agreement with Montage

Capital relating to the following assets:

|  |       |         |           |              |
|--|-------|---------|-----------|--------------|
| Senior secured debt, 13.00%, maturing on<br>3/31/15                    | ( I ) | 580,025 | \$683,200 | 615,750      |
| Warrants for Series C Pref. Stock expiring on<br>3/30/22               | ( I ) | 91,742  | 1,109,333 | 66,759       |
|  |       | 671,767 |           | 682,509      |
| Total Unaffiliated Private Placement Portfolio (cost:<br>\$29,365,558) |       |         |           | \$24,949,756 |

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

## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|   | Method of<br>Valuation (1) | Primary<br>Industry (2) | Cost        | Shares/<br>Principal | Value        |
|---|----------------------------|-------------------------|-------------|----------------------|--------------|
| Rights to Milestone Payments (Illiquid) (5) –<br>2.7% of net assets at value  |                            |                         |             |                      |              |
| Amgen, Inc. (7)(10)<br>Rights to Milestone Payments from<br>Acquisition of BioVex Group, Inc.   | (I)                        | Life Sciences           | \$3,291,750 | \$3,291,750          | \$3,400,734  |
| Total Unaffiliated Rights to Milestone Payments (cost:<br>\$3,291,750)  |                            |                         |             |                      | \$3,400,734  |
| Publicly Traded Portfolio (6) –<br>11.2% of net assets at value   |                            |                         |             |                      |              |
| NeoPhotonics Corporation (10)(18)<br>Developing and manufacturing<br>optical devices and components<br>Common Stock                                 | (M)                        | Electronics             | \$821,971   | 50,807               | \$291,632    |
| Solazyme, Inc. (10)(19)<br>Developing algal biodiesel, industrial<br>chemicals and specialty ingredients using<br>synthetic biology<br>Common Stock | (M)                        | Energy                  | 4,248,476   | 1,797,790            | 14,130,629   |
| Total Unaffiliated Publicly Traded Portfolio (cost:<br>\$5,070,447)   |                            |                         |             |                      | \$14,422,261 |
| Total Investments in Unaffiliated Companies (cost:<br>\$37,727,755)   |                            |                         |             |                      | \$42,772,751 |

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

## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|  | Method of<br>Valuation<br>(1) | Primary<br>Industry (2) | Cost      | Shares/<br>Principal | Value      |
|--|-------------------------------|-------------------------|-----------|----------------------|------------|
| Investments in Non-Controlled Affiliated<br>Companies (3) –<br>48.4% of net assets at value  |                               |                         |           |                      |            |
| Private Placement Portfolio (Illiquid) (20) –<br>47.3% of net assets at value  |                               |                         |           |                      |            |
| ABSMaterials, Inc. (7)(9)<br>Developing nano-structured absorbent<br>materials for environmental remediation   |                               | Energy                  |           |                      |            |
| Series A Convertible Preferred Stock   | (M)                           |                         | \$435,000 | 390,000              | \$97,871   |
| Secured Convertible Bridge Note, 8%,<br>acquired 10/1/12   | (M)                           |                         | 204,033   | \$200,000            | 232,080    |
|  |                               |                         | 639,033   |                      | 329,951    |
| Adesto Technologies Corporation (7)(9)(10)<br>Developing low-power, high-performance<br>memory devices   |                               | Electronics             |           |                      |            |
| Series A Convertible Preferred Stock   | (M)                           |                         | 2,200,000 | 6,547,619            | 4,474,625  |
| Series B Convertible Preferred Stock   | (M)                           |                         | 2,200,000 | 5,952,381            | 4,117,841  |
| Series C Convertible Preferred Stock   | (M)                           |                         | 1,485,531 | 2,122,187            | 1,643,416  |
| Series D Convertible Preferred Stock   | (M)                           |                         | 1,393,147 | 1,466,470            | 1,227,285  |
|  |                               |                         | 7,278,678 |                      | 11,463,167 |
| AgBiome, LLC (formerly AgInnovation, LLC)<br>(7)(9)(10)(16)(21)<br>Providing early stage research and discovery<br>for<br>agriculture and utilizing the crop microbiome<br>to<br>identify products that reduce risk and improve<br>yield |                               | Life Sciences           |           |                      |            |
| Series A-1 Convertible Preferred Stock   | (M)                           |                         | 2,000,000 | 2,000,000            | 2,000,000  |
| Contour Energy Systems, Inc. (7)(9)(10)<br>Developing batteries using<br>nanostructured materials  |                               | Energy                  |           |                      |            |
| Series A Convertible Preferred Stock   | (M)                           |                         | 2,009,995 | 2,565,798            | 1,703,814  |
| Series B Convertible Preferred Stock   | (M)                           |                         | 1,300,000 | 812,500              | 1,008,380  |
| Series C Convertible Preferred Stock   | (M)                           |                         | 1,200,000 | 1,148,325            | 1,125,002  |

4,509,995

3,837,196

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

HARRIS & HARRIS GROUP, INC.  
CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012  
(Unaudited)

|  | Method of<br>Valuation<br>(1) | Primary<br>Industry (2) | Cost        | Shares/<br>Principal | Value       |
|--|-------------------------------|-------------------------|-------------|----------------------|-------------|
| Investments in Non-Controlled<br>Affiliated Companies (3) –<br>48.4% of net assets at value (Cont.)                            |                               |                         |             |                      |             |
| Private Placement Portfolio (Illiquid) (20) –<br>47.3% of net assets at value (Cont.)  |                               |                         |             |                      |             |
| D-Wave Systems, Inc. (7)(9)(22)<br>Developing high-performance quantum<br>computing systems                                    |                               | Electronics             |             |                      |             |
| Series 1 Class B Convertible Preferred Stock   | (M)                           |                         | \$1,002,074 | 1,144,869            | \$1,493,024 |
| Series 1 Class C Convertible Preferred Stock   | (M)                           |                         | 487,804     | 450,450              | 587,432     |
| Series 1 Class D Convertible Preferred Stock   | (M)                           |                         | 748,473     | 855,131              | 1,115,176   |
| Series 1 Class E Convertible Preferred Stock   | (M)                           |                         | 248,049     | 269,280              | 351,168     |
| Series 1 Class F Convertible Preferred Stock   | (M)                           |                         | 238,323     | 258,721              | 337,398     |
| Series 2 Class D Convertible Preferred Stock   | (M)                           |                         | 736,019     | 678,264              | 884,524     |
| Series 2 Class E Convertible Preferred Stock   | (M)                           |                         | 409,032     | 317,746              | 414,372     |
| Series 2 Class F Convertible Preferred Stock   | (M)                           |                         | 392,993     | 305,286              | 398,124     |
| Warrants for Common Stock expiring 6/30/15   | (I)                           |                         | 98,644      | 153,890              | 40,103      |
|  |                               |                         | 4,361,411   |                      | 5,621,321   |
| Enumeral Biomedical Corp. (7)(9)(10)<br>Developing therapeutics and diagnostics through<br>functional assaying of single cells |                               | Life Sciences           |             |                      |             |
| Series A Convertible Preferred Stock   | (M)                           |                         | 1,026,832   | 957,038              | 1,325,507   |
| Series A-1 Convertible Preferred Stock   | (M)                           |                         | 750,000     | 576,923              | 750,000     |
|  |                               |                         | 1,776,832   |                      | 2,075,507   |
| HzO, Inc. (7)(9)(10)<br>Developing novel industrial coatings that<br>protect electronics against damage from liquids           |                               | Electronics             |             |                      |             |
| Series A Convertible Preferred Stock   | (M)                           |                         | 666,667     | 4,057,294            | 760,227     |
| Series B Convertible Preferred Stock   | (M)                           |                         | 2,000,000   | 7,895,776            | 1,737,366   |
|  |                               |                         | 2,666,667   |                      | 2,497,593   |
| Kovio, Inc. (7)(9)(10)   |                               | Electronics             |             |                      |             |

Developing semiconductor products using  
printed electronics and thin-film technologies

|                                       |     |           |           |           |
|---------------------------------------|-----|-----------|-----------|-----------|
| Series A' Convertible Preferred Stock | (M) | 5,242,993 | 2,160,000 | 359,321   |
| Series B' Convertible Preferred Stock | (M) | 2,006,540 | 3,015,493 | 1,362,591 |
|                                       |     | 7,249,533 |           | 1,721,912 |

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

## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|  | Method of<br>Valuation<br>(1) | Primary<br>Industry (2) | Cost        | Shares/<br>Principal | Value       |
|--|-------------------------------|-------------------------|-------------|----------------------|-------------|
| Investments in Non-Controlled<br>Affiliated Companies (3) –<br>48.4% of net assets at value (Cont.)                                    |                               |                         |             |                      |             |
| Private Placement Portfolio (Illiquid) (20) –<br>47.3% of net assets at value (Cont.)  |                               |                         |             |                      |             |
| Metabolon, Inc. (7)(10)  |                               | Life Sciences           |             |                      |             |
| Developing service and diagnostic products<br>through the use of a metabolomics, or<br>biochemical, profiling platform                 |                               |                         |             |                      |             |
| Series B Convertible Preferred Stock   | (M)                           |                         | \$2,500,000 | 371,739              | \$1,951,723 |
| Series B-1 Convertible Preferred Stock   | (M)                           |                         | 706,214     | 148,696              | 780,689     |
| Series C Convertible Preferred Stock   | (M)                           |                         | 1,000,000   | 1,000,000            | 1,794,510   |
| Series D Convertible Preferred Stock   | (M)                           |                         | 1,499,999   | 835,882              | 1,499,999   |
| Warrants for Series B-1 Convertible Preferred<br>Stock expiring 3/25/15  | (I)                           |                         | 293,786     | 74,348               | 71,164      |
|  |                               |                         | 5,999,999   |                      | 6,098,085   |
| Nextreme Thermal Solutions, Inc.<br>(7)(9)(10)(23)   |                               | Energy                  |             |                      |             |
| Developed thin-film thermoelectric devices for<br>cooling and energy conversion  |                               |                         |             |                      |             |
| Common Stock   | (M)                           |                         | 4,384,762   | 8,080,153            | 0           |
| OpGen, Inc. (7)(10)(15)  |                               | Life Sciences           |             |                      |             |
| Developing tools for genomic sequence<br>assembly and analysis   |                               |                         |             |                      |             |
| Series C Convertible Preferred Stock   | (M)                           |                         | 3,260,000   | 23,623,188           | 3,260,000   |
| Produced Water Absorbents, Inc. (7)(9)(10)   |                               | Energy                  |             |                      |             |
| Developing nano-structured absorbent materials<br>for environmental remediation of contaminated<br>water in the oil and gas industries |                               |                         |             |                      |             |
| Series A Convertible Preferred Stock   | (M)                           |                         | 1,000,000   | 1,000,000            | 278,170     |
| Senova Systems, Inc. (7)(9)(10)  |                               | Life Sciences           |             |                      |             |
| Developing next-generation sensors to measure<br>pH  |                               |                         |             |                      |             |
| Series B Convertible Preferred Stock   | (M)                           |                         | 1,218,462   | 1,350,000            | 810,000     |

|  |       |           |         |         |
|--|-------|-----------|---------|---------|
| Warrants for Series B Preferred Stock expiring<br>10/15/17 | ( I ) | 131,538   | 164,423 | 98,637  |
|  |       | 1,350,000 |         | 908,637 |

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



## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|   | Method of<br>Valuation (1) | Primary<br>Industry (2) | Cost      | Shares/<br>Principal | Value        |
|---|----------------------------|-------------------------|-----------|----------------------|--------------|
| Investments in Non-Controlled<br>Affiliated Companies (3) –<br>48.4% of net assets at value (Cont.)                     |                            |                         |           |                      |              |
| Private Placement Portfolio (Illiquid) (20) –<br>47.3% of net assets at value (Cont.)                                   |                            |                         |           |                      |              |
| SiOnyx, Inc. (7)(9)(10)   |                            | Electronics             |           |                      |              |
| Developing silicon-based optoelectronic<br>products enabled by its proprietary Black Silicon                            |                            |                         |           |                      |              |
| Series A Convertible Preferred Stock  | (M)                        |                         | \$750,000 | 233,499              | \$160,367    |
| Series A-1 Convertible Preferred Stock  | (M)                        |                         | 890,000   | 2,966,667            | 2,037,507    |
| Series A-2 Convertible Preferred Stock  | (M)                        |                         | 2,445,000 | 4,207,537            | 2,889,736    |
| Series B-1 Convertible Preferred Stock  | (M)                        |                         | 1,169,561 | 1,892,836            | 1,300,000    |
| Series C Convertible Preferred Stock  | (M)                        |                         | 1,171,316 | 1,674,030            | 1,255,523    |
| Warrants for Series B-1 Convertible Preferred<br>Stock expiring 2/23/17   | (I)                        |                         | 130,439   | 247,350              | 50,113       |
| Warrants for Common Stock expiring 3/28/17  | (I)                        |                         | 84,207    | 418,507              | 32,098       |
|   |                            |                         | 6,640,523 |                      | 7,725,344    |
| Ultora, Inc. (7)(9)   |                            | Energy                  |           |                      |              |
| Developing energy-storage devices<br>enabled by carbon nanotubes  |                            |                         |           |                      |              |
| Series A Convertible Preferred Stock  | (M)                        |                         | 671,830   | 671,830              | 671,830      |
| Xradia, Inc. (7)(10)  |                            | Electronics             |           |                      |              |
| Designing, manufacturing and selling ultra-<br>high resolution 3D x-ray microscopes and<br>fluorescence imaging systems |                            |                         |           |                      |              |
| Series D Convertible Preferred Stock  | (M)                        |                         | 4,000,000 | 3,121,099            | 12,303,684   |
| Total Non-Controlled Private Placement Portfolio (cost:<br>\$57,789,263)  |                            |                         |           |                      | \$60,792,397 |

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

HARRIS & HARRIS GROUP, INC.  
CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|  | Method of<br>Valuation<br>(1) | Primary<br>Industry (2) | Cost        | Shares/<br>Principal | Value        |
|--|-------------------------------|-------------------------|-------------|----------------------|--------------|
| Investments in Non-Controlled<br>Affiliated Companies (3) –<br>48.4% of net assets at value (Cont.)                                    |                               |                         |             |                      |              |
| Publicly Traded Portfolio (Illiquid) (24) –<br>1.1% of net assets at value   |                               |                         |             |                      |              |
| Champions Oncology, Inc. (10)<br>Developing its TumorGraft™ platform for<br>personalized medicine and drug development<br>Common Stock | (M)                           | Life Sciences           | \$2,000,000 | 2,666,667            | \$1,348,227  |
| Total Non-Controlled Affiliated Publicly Traded Portfolio (cost:<br>\$2,000,000)   |                               |                         |             |                      | \$1,348,227  |
| Total Investments in Non-Controlled Affiliated Companies (cost:<br>\$59,789,263)   |                               |                         |             |                      | \$62,140,624 |
| Investments in Controlled Affiliated<br>Companies (3)(25) – 2.4% of net assets at value  |                               |                         |             |                      |              |
| Private Placement Portfolio (Illiquid) – 2.4% of net assets at<br>value  |                               |                         |             |                      |              |
| Ancora Pharmaceuticals Inc. (7)(9)<br>Developing synthetic carbohydrates for<br>pharmaceutical applications<br>Common Stock            | (I)                           | Life Sciences           | \$2,729,817 | 57,463               | \$0          |
| Series A' Convertible Preferred Stock  | (I)                           |                         | 4,855,627   | 4,855,627            | 521,494      |
| Senior Secured Debt, 12.00%, maturing on<br>12/11/13   | (I)                           |                         | 446,731     | \$500,000            | 453,270      |
|  |                               |                         | 8,032,175   |                      | 974,764      |

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

## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|  | Method of<br>Valuation<br>(1) | Primary<br>Industry<br>(2) | Cost        | Shares/<br>Principal | Value         |
|--|-------------------------------|----------------------------|-------------|----------------------|---------------|
| Investments in Controlled<br>Affiliated Companies (3)(25) –<br>2.4% of net assets at value (Cont.)   |                               |                            |             |                      |               |
| Private Placement Portfolio (Illiquid) –<br>2.4% of net assets at value (Cont.)                      |                               |                            |             |                      |               |
| Laser Light Engines, Inc. (7)(9)   |                               | Energy                     |             |                      |               |
| Manufacturing solid-state light sources for<br>digital cinema and large-venue projection<br>displays |                               |                            |             |                      |               |
| Series A Convertible Preferred Stock   | (M)                           |                            | \$2,000,000 | 7,499,062            | \$0           |
| Series B Convertible Preferred Stock   | (M)                           |                            | 3,095,802   | 13,571,848           | 1,008,225     |
| Secured Convertible Bridge Note, 12%, acquired<br>10/7/11  | (M)                           |                            | 229,721     | \$200,000            | 229,721       |
| Secured Convertible Bridge Note, 12%, acquired<br>11/17/11   | (M)                           |                            | 108,577     | \$95,652             | 108,577       |
| Secured Convertible Bridge Note, 12%, acquired<br>12/21/11   | (M)                           |                            | 92,848      | \$82,609             | 92,848        |
| Secured Convertible Bridge Note, 12%, acquired<br>3/5/12   | (M)                           |                            | 477,953     | \$434,784            | 477,953       |
| Secured Convertible Bridge Note, 12%, acquired<br>7/26/12  | (M)                           |                            | 196,728     | \$186,955            | 196,728       |
|  |                               |                            | 6,201,629   |                      | 2,114,052     |
| Total Controlled Private Placement Portfolio (cost:<br>\$14,233,804)                                 |                               |                            |             |                      | \$3,088,816   |
| Total Investments in Controlled Affiliated Companies (cost:<br>\$14,233,804)                         |                               |                            |             |                      | \$3,088,816   |
| Total Private Placement and Publicly Traded Portfolio (cost:<br>\$111,750,822)                       |                               |                            |             |                      | \$108,002,191 |

| Method of | Cost | Shares/<br>Principal | Value |
|-----------|------|----------------------|-------|
|-----------|------|----------------------|-------|

Valuation  
(1)

U.S. Government Securities (26) –  
10.9% of net assets at value

|   |     |               |               |                |
|---|-----|---------------|---------------|----------------|
| U.S. Treasury Bill — due date 03/28/13                                  | (M) | \$ 13,996,136 | \$ 14,000,000 | \$ 13,998,880  |
| Total Investments in U.S. Government Securities (cost:<br>\$13,996,136) |     |               |               | \$ 13,998,880  |
| Total Investments (cost: \$125,746,958)                                 |     |               |               | \$ 122,001,071 |

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

HARRIS & HARRIS GROUP, INC.

CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

|   | Method of<br>Valuation (1) | Number of<br>Contracts | Value      |
|---|----------------------------|------------------------|------------|
| Written Call Options (16) –<br>(0.03)% of net assets at value     |                            |                        |            |
| Solazyme, Inc. — Strike Price \$10.00, March 16, 2013             | (M)                        | 1,500                  | (37,500)   |
| NeoPhotonics Corporation — Strike Price \$7.50, February 16, 2013 | (M)                        | 500                    | (5,000 )   |
| Total Written Call Options (Premiums Received \$50,000)           |                            |                        | \$(42,500) |

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

HARRIS & HARRIS GROUP, INC.

CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012

Notes to Consolidated Schedule of Investments

- (1) See "Footnote to Consolidated Schedule of Investments" on page 128 for a description of the "Valuation Procedures."

We classify "Energy" companies as those that seek to improve performance, productivity or efficiency, and to reduce environmental impact, waste, cost, energy consumption or raw materials using nanotechnology-enabled solutions. We classify "Electronics" companies as those that use nanotechnology to address problems in (2)electronics-related industries, including semiconductors. In the fourth quarter of 2012, we renamed the industry classification "Healthcare" to "Life Sciences." We classify "Life Sciences" companies as those that address problems in life sciences-related industries, including biotechnology, agriculture, advanced materials and chemicals, healthcare, bioprocessing, water, industrial biotechnology, food, nutrition and energy.

Investments in unaffiliated companies consist of investments in which we own less than five percent of the voting shares of the portfolio company. Investments in non-controlled affiliated companies consist of investments in (3) which we own five percent or more, but less than 25 percent, of the voting shares of the portfolio company, or where we hold one or more seats on the portfolio company's Board of Directors but do not control the company. Investments in controlled affiliated companies consist of investments in which we own 25 percent or more of the voting shares of the portfolio company or otherwise control the company.

The aggregate cost for federal income tax purposes of investments in unaffiliated privately held companies is (4) \$29,365,558. The gross unrealized appreciation based on the tax cost for these securities is \$4,376,000. The gross unrealized depreciation based on the tax cost for these securities is \$8,791,802.

The aggregate cost for federal income tax purposes of investments in unaffiliated rights to milestone payments is (5) \$3,291,750. The gross unrealized appreciation based on the tax cost for these securities is \$108,984. The gross unrealized depreciation based on the tax cost for these securities is \$0.

The aggregate cost for federal income tax purposes of investments in unaffiliated publicly traded companies is (6) \$5,070,447. The gross unrealized appreciation based on the tax cost for these securities is \$9,882,153. The gross unrealized depreciation based on the tax cost for these securities is \$530,339.

(7) We are subject to legal restrictions on the sale of our investment(s) in this company.

(8) With the conversion of our bridge note into shares of Series E-1 Preferred Stock, we received a warrant to purchase shares of common stock at \$0.25 per share. The number of shares is determined by certain financial targets for

2012 set upon receipt of the audited financial statements for 2012. These financial statements have not yet been issued, and, therefore, the warrant remains contingent as of December 31, 2012.

(9) These investments are development-stage companies. A development-stage company is defined as a company that is devoting substantially all of its efforts to establishing a new business, and either it has not yet commenced its planned principal operations, or it has commenced such operations but has not realized significant revenue from them.

The accompanying notes are an integral part of this consolidated schedule.

**HARRIS & HARRIS GROUP, INC.**

**CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012**

(10) Represents a non-income producing security. Investments that have not paid dividends or interest within the last 12 months are considered to be non-income producing.

(11) Cobalt Technologies, Inc., also does business as Cobalt Biofuels.

(12) With our investment in a convertible bridge note issued by Ensemble Therapeutics Corporation, we received a warrant to purchase a number of shares of the class of stock sold in the next financing of Ensemble Therapeutics Corporation equal to \$149,540 divided by the price per share of the class of stock sold in the next financing of Ensemble Therapeutics Corporation. The ability to exercise this warrant is, therefore, contingent on Ensemble Therapeutics Corporation completing successfully a subsequent round of financing. This warrant shall expire and no longer be exercisable on September 10, 2015. The cost basis of this warrant is \$89.86.

(13) The outstanding loans with maturity dates of 1/15/13 were not repaid as of that date. The maturity dates of these loans are expected to be extended to at least 6/30/13. GEO Semiconductor continues to pay principal and interest, as applicable, on each loan based on the terms negotiated as of December 31, 2012.

(14) With our investment in the Mersana Therapeutics, Inc., Series A-1 financing, we received a warrant to purchase 277,760 shares of Series A-2 Convertible Preferred Stock. The ability to exercise the warrant is contingent upon Mersana's achievement of certain milestones. Mersana has not achieved those milestones as of December 31, 2012, and, therefore, this warrant is a contingent asset as of that date. The warrant will expire on July 27, 2022.

(15) As part of a loan the Company made to Molecular Imprints in the second quarter of 2011, we received a liquidation preference payable upon a sale of the company equal to three times the principal of the loan, or \$4,044,450. This preference is senior to the preferences of the outstanding preferred stock. While the loan has since been repaid, this liquidation preference remains outstanding as of December 31, 2012.

(16) Initial investment was made during 2012.

(17) OHSO Clean, Inc. also does business as CleanWell Company.

(18) A portion of this security is held in connection with written call option contracts: 50,000 shares, having a fair value of \$287,000, have been pledged to brokers.



(19) A portion of this security is held in connection with written call option contracts: 150,000 shares, having a fair value of \$1,175,000, have been pledged to brokers.

The aggregate cost for federal income tax purposes of investments in non-controlled affiliated companies is (20) \$57,789,263. The gross unrealized appreciation based on the tax cost for these securities is \$15,229,665. The gross unrealized depreciation based on the tax cost for these securities is \$12,226,531.

(21) On January 29, 2013, AgInnovation, LLC, changed its name to AgBiome, LLC.

The accompanying notes are an integral part of this consolidated schedule.

**HARRIS & HARRIS GROUP, INC.**

**CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2012**

D-Wave Systems, Inc., is located and is doing business primarily in Canada. We invested in D-Wave Systems, (22) Inc., through Parallel Universes, Inc., a Delaware company. Our investment is denominated in Canadian dollars and is subject to foreign currency translation. See "Note 2. Summary of Significant Accounting Policies."

(23) On February 13, 2013, Nextreme Thermal Solutions, Inc., was acquired by Laird Technologies, Inc., for \$1 and the potential for future milestone payments.

The aggregate cost for federal income tax purposes of investments in non-controlled affiliated publicly traded (24) companies is \$2,000,000. The gross unrealized appreciation based on the tax cost for these securities is \$0. The gross unrealized depreciation based on the tax cost for these securities is \$651,773.

The aggregate cost for federal income tax purposes of investments in controlled affiliated companies is (25) \$14,233,804. The gross unrealized appreciation based on the tax cost for these securities is \$0. The gross unrealized depreciation based on the tax cost for these securities is \$11,144,988.

The aggregate cost for federal income tax purposes of our U.S. government securities is \$13,996,136. The gross (26) unrealized appreciation on the tax cost for these securities is \$2,744. The gross unrealized depreciation on the tax cost of these securities is \$0.

The accompanying notes are an integral part of this consolidated schedule.

**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011**

|  | Method of<br>Valuation (1) | Industry (2) | Cost        | Shares/<br>Principal | Value       |
|--|----------------------------|--------------|-------------|----------------------|-------------|
| Investments in Unaffiliated Companies<br>(3)(4)(5)(6) –<br>38.8% of net assets at value                                  |                            |              |             |                      |             |
| Private Placement Portfolio (Illiquid) –<br>16.3% of net assets at value   |                            |              |             |                      |             |
| Bridgelux, Inc. (7)(8)<br>Manufacturing high-power light emitting diodes<br>(LEDs) and arrays                            |                            | Energy       |             |                      |             |
| Series B Convertible Preferred Stock   | (M)                        |              | \$1,000,000 | 1,861,504            | \$2,245,039 |
| Series C Convertible Preferred Stock   | (M)                        |              | 1,352,196   | 2,130,699            | 2,757,625   |
| Series D Convertible Preferred Stock   | (M)                        |              | 1,371,622   | 999,999              | 1,687,433   |
| Series E Convertible Preferred Stock   | (M)                        |              | 730,369     | 440,334              | 832,335     |
| Warrants for Series C Convertible Preferred<br>Stock expiring 12/31/14   | (I)                        |              | 168,270     | 163,900              | 123,541     |
| Warrants for Series D Convertible Preferred<br>Stock expiring 8/26/14  | (I)                        |              | 88,531      | 124,999              | 93,385      |
| Warrants for Series D Convertible Preferred<br>Stock expiring 3/10/15  | (I)                        |              | 40,012      | 41,666               | 31,128      |
| Warrants for Series E Convertible Preferred<br>Stock expiring 12/31/17   | (I)                        |              | 108,867     | 170,823              | 130,872     |
| Secured Convertible Bridge Note (including<br>interest)  | (M)                        |              | 529,697     | \$538,945            | 548,513     |
| Warrant for Common Stock expiring 10/21/18   | (I)                        |              | 18,816      | 56,564               | 2,581       |
|  |                            |              | 5,408,380   |                      | 8,452,452   |
| Cambrios Technologies Corporation (7)(9)<br>Developing nanowire-enabled electronic<br>materials for the display industry |                            | Electronics  |             |                      |             |
| Series B Convertible Preferred Stock   | (M)                        |              | 1,294,025   | 1,294,025            | 720,672     |
| Series C Convertible Preferred Stock   | (M)                        |              | 1,300,000   | 1,300,000            | 724,000     |
| Series D Convertible Preferred Stock   | (M)                        |              | 515,756     | 515,756              | 870,338     |
| Series D-2 Convertible Preferred Stock   | (M)                        |              | 92,400      | 92,400               | 86,625      |
|  |                            |              | 3,202,181   |                      | 2,401,635   |
| Cobalt Technologies, Inc. (7)(9)(10)<br>Developing processes for making bio-<br>butanol through biomass fermentation     |                            | Energy       |             |                      |             |
| Series C-1 Convertible Preferred Stock   | (M)                        |              | 749,998     | 352,112              | 216,651     |
| Series D-1 Convertible Preferred Stock   | (M)                        |              | 122,070     | 48,828               | 33,937      |
|  |                            |              | 872,068     |                      | 250,588     |

|   |     |            |           |           |           |
|---|-----|------------|-----------|-----------|-----------|
| Ensemble Therapeutics Corporation (7)(9)(11)<br>Developing DNA- Programmed Chemistry™<br>for the discovery of new classes of therapeutics |     | Healthcare |           |           |           |
| Series B Convertible Preferred Stock  | (M) |            | 2,000,000 | 1,449,275 | 0         |
| Secured Convertible Bridge Notes (including<br>interest)  | (M) |            | 373,439   | \$299,169 | 1,298,436 |
|   |     |            | 2,373,439 |           | 1,298,436 |

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

**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011**

|   | Method of<br>Valuation (1) | Industry (2) | Cost      | Shares/<br>Principal | Value     |
|---|----------------------------|--------------|-----------|----------------------|-----------|
| Investments in Unaffiliated Companies<br>(3)(4)(5)(6) –<br>38.8% of net assets at value (Cont.)   |                            |              |           |                      |           |
| Private Placement Portfolio (Illiquid) –<br>16.3% of net assets at value (Cont.)  |                            |              |           |                      |           |
| GEO Semiconductor Inc.<br>Developing programmable, high-performance<br>video and geometry processing solutions<br>Participation Agreement with Montage<br>Capital relating to the following assets: |                            | Electronics  |           |                      |           |
| Senior secured debt, 13.75%, maturing on<br>06/30/12  | (I)                        |              | \$403,732 | \$500,000            | \$476,700 |
| Warrants for Series A Pref. Stock expiring on<br>09/17/17   | (I)                        |              | 66,684    | 100,000              | 61,814    |
| Warrants for Series A-1 Pref. Stock expiring on<br>06/30/18   | (I)                        |              | 23,566    | 34,500               | 21,686    |
| Loan and Security Agreement with GEO<br>Semiconductor<br>relating to the following assets:  |                            |              |           |                      |           |
| Subordinated secured debt, 15.75%, maturing on<br>01/01/12  | (I)                        |              | 109,942   | \$125,000            | 121,880   |
| Warrants for Series A Pref. Stock expiring on<br>03/01/18   | (I)                        |              | 7,512     | 10,000               | 5,819     |
| Warrants for Series A-1 Pref. Stock expiring on<br>06/29/18   | (I)                        |              | 7,546     | 10,000               | 5,836     |
|   |                            |              | 618,982   |                      | 693,735   |
| Molecular Imprints, Inc. (7)(12)<br>Manufacturing nanoimprint<br>lithography capital equipment  |                            | Electronics  |           |                      |           |
| Series B Convertible Preferred Stock  | (M)                        |              | 2,000,000 | 1,333,333            | 1,789,108 |
| Series C Convertible Preferred Stock  | (M)                        |              | 2,406,595 | 1,285,071            | 2,138,498 |
| Non-Convertible Bridge Note   | (I)                        |              | 0         | 0                    | 3,033,338 |
|   |                            |              | 4,406,595 |                      | 6,960,944 |
| Nanosys, Inc. (7)(13)<br>Developing inorganic nanowires and<br>quantum dots for use in batteries and<br>LED-backlit devices   |                            | Energy       |           |                      |           |
| Series C Convertible Preferred Stock  | (M)                        |              | 1,500,000 | 803,428              | 255,503   |

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

|   |     |           |            |           |
|---|-----|-----------|------------|-----------|
| Series D Convertible Preferred Stock                          | (M) | 3,000,003 | 1,016,950  | 698,410   |
| Series E Convertible Preferred Stock                          | (M) | 496,573   | 433,688    | 496,573   |
|   |     | 4,996,576 |            | 1,450,486 |
| NanoTerra, Inc. (9)(14)                                       |     |           |            |           |
| Developing surface chemistry and nano-manufacturing solutions |     |           |            |           |
| Senior secured debt, 12.0%, maturing on 02/22/14 (I)          |     | 329,307   | \$ 378,564 | 342,650   |
| Senior secured debt, 12.0%, maturing on 02/22/13 (I)          |     | 133,121   | \$ 153,032 | 144,855   |
| Warrants for Series A-2 Pref. Stock expiring on 02/22/21      | (I) | 69,168    | 446,248    | 67,659    |
|   |     | 531,596   |            | 555,164   |

Energy

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

**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011**

|  | Method of<br>Valuation (1) | Industry (2) | Cost        | Shares/<br>Principal | Value        |
|--|----------------------------|--------------|-------------|----------------------|--------------|
| Investments in Unaffiliated Companies<br>(3)(4)(5)(6) –<br>38.8% of net assets at value (Cont.)                                  |                            |              |             |                      |              |
| Private Placement Portfolio (Illiquid) –<br>16.3% of net assets at value (Cont.)   |                            |              |             |                      |              |
| Nantero, Inc. (7)(9)(13)<br>Developing a high-density, nonvolatile,<br>random access memory chip, enabled<br>by carbon nanotubes |                            | Electronics  |             |                      |              |
| Series A Convertible Preferred Stock   | (M)                        |              | \$489,999   | 345,070              | \$746,548    |
| Series B Convertible Preferred Stock   | (M)                        |              | 323,000     | 207,051              | 451,499      |
| Series C Convertible Preferred Stock   | (M)                        |              | 571,329     | 188,315              | 486,760      |
|  |                            |              | 1,384,328   |                      | 1,684,807    |
| Total Unaffiliated Private Placement Portfolio<br>(cost: \$23,794,145)   |                            |              |             |                      | \$23,748,247 |
| Rights to Milestone Payments (Illiquid) –<br>2.3% of net assets at value   |                            |              |             |                      |              |
| Amgen, Inc. (7)(13)<br>Rights to Milestone Payments from<br>Acquisition of BioVex Group, Inc.                                    |                            | Healthcare   |             |                      |              |
|  | (I)                        |              | \$3,291,750 | \$3,291,750          | \$3,362,791  |
| Total Unaffiliated Rights to Milestone Payments<br>(cost: \$3,291,750)   |                            |              |             |                      | \$3,362,791  |
| Publicly Traded Portfolio –<br>20.2% of net assets at value  |                            |              |             |                      |              |
| NeoPhotonics Corporation (13)<br>Developing and manufacturing<br>optical devices and components                                  |                            | Electronics  |             |                      |              |
| Common Stock   | (M)                        |              | \$7,299,590 | 450,907              | \$2,065,154  |

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





**HARRIS & HARRIS GROUP, INC.****CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011**

|   | Method of<br>Valuation (1) | Industry (2) | Cost        | Shares/<br>Principal | Value        |
|---|----------------------------|--------------|-------------|----------------------|--------------|
| Solazyme, Inc. (13)(15)(16)<br>Developing algal biodiesel, industrial<br>chemicals and specialty ingredients using<br>synthetic biology<br>Common Stock | (M)                        | Energy       | \$5,444,197 | 2,304,149            | \$27,419,373 |
| Total Unaffiliated Publicly Traded Portfolio<br>(cost: \$12,743,787)  |                            |              |             |                      | \$29,484,527 |
| Total Investments in Unaffiliated Companies<br>(cost: \$39,829,682)   |                            |              |             |                      | \$56,595,565 |

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

**HARRIS & HARRIS GROUP, INC.**  
**CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011**

|  | Method of<br>Valuation (1) | Industry (2) | Cost      | Shares/<br>Principal | Value       |
|--|----------------------------|--------------|-----------|----------------------|-------------|
| Investments in Non-Controlled<br>Affiliated Companies (3)(17)(18) –<br>34.1% of net assets at value              |                            |              |           |                      |             |
| Private Placement Portfolio (Illiquid) –<br>32.7% of net assets at value   |                            |              |           |                      |             |
| ABSMaterials, Inc. (7)(9)(13)<br>Developing nano-structured absorbent<br>materials for environmental remediation |                            | Energy       |           |                      |             |
| Series A Convertible Preferred Stock   | (M)                        |              | \$435,000 | 390,000              | \$1,560,000 |
| Adesto Technologies Corporation (7)(9)<br>Developing low-power, high- performance<br>memory devices              |                            | Electronics  |           |                      |             |
| Series A Convertible Preferred Stock   | (M)                        |              | 2,200,000 | 6,547,619            | 3,328,635   |
| Series B Convertible Preferred Stock   | (M)                        |              | 2,200,000 | 5,952,381            | 3,076,031   |
| Series C Convertible Preferred Stock   | (M)                        |              | 1,485,531 | 2,122,187            | 1,271,982   |
|  |                            |              | 5,885,531 |                      | 7,676,648   |
| Contour Energy Systems, Inc. (7)(9)(13)<br>Developing batteries using<br>nanostructured materials                |                            | Energy       |           |                      |             |
| Series A Convertible Preferred Stock   | (M)                        |              | 2,009,995 | 2,565,798            | 2,520,935   |
| Series B Convertible Preferred Stock   | (M)                        |              | 1,300,000 | 812,500              | 1,348,249   |
| Series C Convertible Preferred Stock   | (M)                        |              | 720,000   | 688,995              | 767,076     |
|  |                            |              | 4,029,995 |                      | 4,636,260   |
| D-Wave Systems, Inc. (7)(9)(19)<br>Developing high- performance<br>quantum computing systems                     |                            | Electronics  |           |                      |             |
| Series B Convertible Preferred Stock   | (M)                        |              | 1,002,074 | 1,144,869            | 1,311,562   |
| Series C Convertible Preferred Stock   | (M)                        |              | 487,804   | 450,450              | 516,036     |
| Series D Convertible Preferred Stock   | (M)                        |              | 1,484,492 | 1,533,395            | 1,756,657   |
| Series E Convertible Preferred Stock   | (M)                        |              | 248,049   | 269,280              | 308,487     |
| Series F Convertible Preferred Stock   | (M)                        |              | 238,323   | 258,721              | 296,391     |
| Warrants for Common Stock expiring 06/30/15  | (I)                        |              | 98,644    | 153,890              | 64,272      |
| Secured Convertible Bridge Note (including<br>interest)  | (M)                        |              | 341,047   | \$337,579            | 332,058     |
|  |                            |              | 3,900,433 |                      | 4,585,463   |

|   |     |            |           |         |           |
|---|-----|------------|-----------|---------|-----------|
| Enumeral Biomedical Corp. (7)(9)  |     | Healthcare |           |         |           |
| Developing therapeutics and diagnostics through functional assaying of single cells |     |            |           |         |           |
| Series A Convertible Preferred Stock  | (M) |            | 1,026,832 | 957,038 | 1,110,164 |

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

## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011

|  | Method of<br>Valuation (1) | Industry (2) | Cost       | Shares/<br>Principal | Value        |
|--|----------------------------|--------------|------------|----------------------|--------------|
| Investments in Non-Controlled<br>Affiliated Companies (3)(17)(18) –<br>34.1% of net assets at value (Cont.)            |                            |              |            |                      |              |
| Private Placement Portfolio (Illiquid) –<br>32.7% of net assets at value (Cont.)                                       |                            |              |            |                      |              |
| HzO, Inc. (7)(9)(13)(14)   |                            | Electronics  |            |                      |              |
| Developing novel industrial coatings that<br>protect electronics against damage from liquids                           |                            |              |            |                      |              |
| Series A Convertible Preferred Stock   | (M)                        |              | \$ 666,667 | 4,057,294            | \$ 1,130,362 |
| Series B Convertible Preferred Stock   | (M)                        |              | 1,000,000  | 3,947,888            | 1,099,882    |
|  |                            |              | 1,666,667  |                      | 2,230,244    |
| Kovio, Inc. (7)(9)(13)   |                            | Electronics  |            |                      |              |
| Developing semiconductor products using<br>printed electronics and thin-film technologies                              |                            |              |            |                      |              |
| Series A' Convertible Preferred Stock  | (M)                        |              | 5,242,993  | 2,160,000            | 1,437,286    |
| Series B' Convertible Preferred Stock  | (M)                        |              | 1,418,540  | 2,131,827            | 1,418,539    |
|  |                            |              | 6,661,533  |                      | 2,855,825    |
| Mersana Therapeutics, Inc. (7)(9)  |                            | Healthcare   |            |                      |              |
| Developing treatments for cancer based<br>on novel drug delivery polymers  |                            |              |            |                      |              |
| Series A Convertible Preferred Stock   | (M)                        |              | 700,000    | 68,451               | 0            |
| Series B Convertible Preferred Stock   | (M)                        |              | 1,542,098  | 866,500              | 0            |
| Unsecured Convertible Bridge Notes (including<br>interest)   | (M)                        |              | 1,442,871  | \$ 1,195,875         | 1,442,871    |
|  |                            |              | 3,684,969  |                      | 1,442,871    |
| Metabolon, Inc. (7)(13)  |                            | Healthcare   |            |                      |              |
| Developing service and diagnostic products<br>through the use of a metabolomics, or<br>biochemical, profiling platform |                            |              |            |                      |              |
| Series B Convertible Preferred Stock   | (M)                        |              | 2,500,000  | 371,739              | 1,951,723    |
| Series B-1 Convertible Preferred Stock   | (M)                        |              | 706,214    | 148,696              | 780,689      |

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

|   |       |           |           |           |
|---|-------|-----------|-----------|-----------|
| Series C Convertible Preferred Stock                                    | (M)   | 1,000,000 | 1,000,000 | 1,794,510 |
| Series D Convertible Preferred Stock                                    | (M)   | 1,499,999 | 835,882   | 1,499,999 |
| Warrants for Series B-1 Convertible Preferred<br>Stock expiring 3/25/15 | ( I ) | 293,786   | 74,348    | 71,142    |
|   |       | 5,999,999 |           | 6,098,063 |

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

## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011

|  | Method of<br>Valuation (1) | Industry (2) | Cost        | Shares/<br>Principal | Value     |
|--|----------------------------|--------------|-------------|----------------------|-----------|
| Investments in Non-Controlled<br>Affiliated Companies (3)(17)(18) –<br>34.1% of net assets at value (Cont.)  |                            |              |             |                      |           |
| Private Placement Portfolio (Illiquid) –<br>32.7% of net assets at value (Cont.)   |                            |              |             |                      |           |
| Nextreme Thermal Solutions, Inc. (7)(9)(13)<br>Developing thin-film thermoelectric devices<br>for cooling and energy conversion<br>Series A Convertible Preferred Stock  | (M)                        | Energy       | \$4,384,762 | 44,053               | \$0       |
| Produced Water Absorbents, Inc. (7)(9)(13)(14)<br>Developing nano-structured absorbent materials<br>for environmental remediation of contaminated<br>water in the oil and gas industries<br>Series A Convertible Preferred Stock | (M)                        | Energy       | 1,000,000   | 1,000,000            | 1,000,000 |
| Senova Systems, Inc. (7)(9)(13)(14)<br>Developing next-generation sensors<br>to measure pH<br>Series B Convertible Preferred Stock   | (M)                        | Healthcare   | 692,308     | 692,308              | 692,308   |
| SiOnyx, Inc. (7)(9)(13)<br>Developing silicon-based optoelectronic<br>products enabled by its proprietary Black Silicon<br>Series A Convertible Preferred Stock  | (M)                        | Electronics  | 750,000     | 233,499              | 160,367   |
| Series A-1 Convertible Preferred Stock   | (M)                        |              | 890,000     | 2,966,667            | 2,037,507 |
| Series A-2 Convertible Preferred Stock   | (M)                        |              | 2,445,000   | 4,207,537            | 2,889,736 |
| Series B-1 Convertible Preferred Stock   | (M)                        |              | 1,169,561   | 1,892,836            | 1,300,000 |
| Warrants for Series B-1 Convertible Preferred<br>Stock expiring 2/23/17  | (I)                        |              | 130,439     | 247,350              | 132,552   |
|  |                            |              | 5,385,000   |                      | 6,520,162 |
| Ultora, Inc. (7)(9)(13)<br>Developing energy-storage devices<br>enabled by carbon nanotubes<br>Series A Convertible Preferred Stock  | (M)                        | Energy       | 215,000     | 215,000              | 215,000   |

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



HARRIS &amp; HARRIS GROUP, INC.

**CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011**

|   | Method of<br>Valuation (1) | Industry (2) | Cost        | Shares/<br>Principal | Value        |
|---|----------------------------|--------------|-------------|----------------------|--------------|
| Investments in Non-Controlled<br>Affiliated Companies (3)(17)(18) –<br>34.1% of net assets at value (Cont.)             |                            |              |             |                      |              |
| Private Placement Portfolio (Illiquid) –<br>32.7% of net assets at value (Cont.)  |                            |              |             |                      |              |
| Xradia, Inc. (7)(13)  |                            | Electronics  |             |                      |              |
| Designing, manufacturing and selling ultra-<br>high resolution 3D x-ray microscopes and<br>fluorescence imaging systems |                            |              |             |                      |              |
| Series D Convertible Preferred Stock  | (M)                        |              | \$4,000,000 | 3,121,099            | \$6,978,777  |
| Total Non-Controlled Private Placement Portfolio<br>(cost: \$48,968,029)  |                            |              |             |                      | \$47,601,785 |
| <b>Publicly Traded Portfolio (Illiquid) –<br/>1.4% of net assets at value</b>   |                            |              |             |                      |              |
| Champions Oncology, Inc. (13)(14)(20)   |                            | Healthcare   |             |                      |              |
| Developing its TumorGraft™ platform for<br>personalized medicine and drug development                                   |                            |              |             |                      |              |
| Common Stock  | (M)                        |              | \$2,000,000 | 2,666,667            | \$1,973,334  |
| Total Non-Controlled Affiliated Publicly Traded<br>Portfolio (cost: \$2,000,000)  |                            |              |             |                      | \$1,973,334  |
| Total Investments in Non-Controlled Affiliated<br>Companies (cost: \$50,968,029)  |                            |              |             |                      | \$49,575,119 |

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



## HARRIS &amp; HARRIS GROUP, INC.

## CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011

|  | Method of<br>Valuation (1) | Industry (2) | Cost        | Shares/<br>Principal | Value         |
|--|----------------------------|--------------|-------------|----------------------|---------------|
| Investments in Controlled<br>Affiliated Companies (3)(21) –<br>4.7% of net assets at value   |                            |              |             |                      |               |
| Private Placement Portfolio (Illiquid) –<br>4.7% of net assets at value  |                            |              |             |                      |               |
| Ancora Pharmaceuticals Inc. (7)(9)<br>Developing synthetic carbohydrates for<br>pharmaceutical applications                              |                            | Healthcare   |             |                      |               |
| Common Stock   | (M)                        |              | \$2,729,817 | 57,463               | \$0           |
| Series A Convertible Preferred Stock   | (M)                        |              | 3,855,627   | 3,855,627            | 3,855,627     |
| Senior Secured Debt, 12.00%, maturing on<br>12/11/12   | (I)                        |              | 452,060     | \$500,000            | 455,190       |
|  |                            |              | 7,037,504   |                      | 4,310,817     |
| Laser Light Engines, Inc. (7)(9)<br>Manufacturing solid-state light sources for<br>digital cinema and large-venue projection<br>displays |                            | Energy       |             |                      |               |
| Series A Convertible Preferred Stock   | (M)                        |              | 2,000,000   | 7,499,062            | 0             |
| Series B Convertible Preferred Stock   | (M)                        |              | 3,095,802   | 13,571,848           | 2,181,119     |
| Secured Convertible Bridge Note (including<br>interest)  | (M)                        |              | 385,630     | \$378,261            | 385,630       |
|  |                            |              | 5,481,432   |                      | 2,566,749     |
| Total Controlled Private Placement Portfolio<br>(cost: \$12,518,936)   |                            |              |             |                      | \$6,877,566   |
| Total Investments in Controlled Affiliated<br>Companies (cost: \$12,518,936)   |                            |              |             |                      | \$6,877,566   |
| Total Private Placement and Publicly Traded<br>Portfolio (cost: \$103,316,647)   |                            |              |             |                      | \$113,048,250 |
| Total Investments (cost: \$103,316,647)  |                            |              |             |                      | \$113,048,250 |

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



HARRIS & HARRIS GROUP, INC.

CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011

|  | Method of<br>Valuation (1) | Number of<br>Contracts | Value       |
|--|----------------------------|------------------------|-------------|
| Written Call Options (15) –<br>(0.1)% of net assets at value |                            |                        |             |
| Solazyme, Inc. — Strike Price \$15.00, 3/17/12               | (M)                        | 3,000                  | \$(195,000) |
| Total Written Call Options (Premiums Received \$315,000)     |                            |                        | \$(195,000) |

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

HARRIS & HARRIS GROUP, INC.

CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011

Notes to Consolidated Schedule of Investments

- (1) See "Footnote to Consolidated Schedule of Investments" on page 128 for a description of the "Valuation Procedures."

We classify "Energy" companies as those that seek to improve performance, productivity or efficiency, and to reduce environmental impact, waste, cost, energy consumption or raw materials using nanotechnology-enabled solutions. We classify "Electronics" companies as those that use nanotechnology to address problems in electronics-related industries, including semiconductors. We classify "Healthcare" companies as those that use nanotechnology to address problems in healthcare-related industries, including biotechnology, pharmaceuticals and medical devices. We use the term "Other" for companies that operate primarily in industries other than those within

(2) "Energy," "Electronics" and "Healthcare." We do not have any portfolio companies classified as "Other" as of December 31, 2011. In the first quarter of 2011, we renamed the sector classification "Electronics/Semiconductors" to "Electronics" and reclassified three companies, NeoPhotonics Corporation, Polatis, Inc., and Xradia, Inc., from a sector classification of "Other" to "Electronics" to reflect a broader definition of electronics to include photonics, metrology, and test and measurement. We also renamed the sector classification "Healthcare/Biotech" to "Healthcare." In the fourth quarter of 2011, we renamed the sector classification, "Cleantech" to "Energy."

Investments in unaffiliated companies consist of investments in which we own less than five percent of the voting shares of the portfolio company. Investments in non-controlled affiliated companies consist of investments in

(3) which we own five percent or more, but less than 25 percent, of the voting shares of the portfolio company, or where we hold one or more seats on the portfolio company's Board of Directors but do not control the company. Investments in controlled affiliated companies consist of investments in which we own 25 percent or more of the voting shares of the portfolio company or otherwise control the company.

The aggregate cost for federal income tax purposes of investments in unaffiliated privately held companies is

(4) \$23,794,145. The gross unrealized appreciation based on the tax cost for these securities is \$5,997,220. The gross unrealized depreciation based on the tax cost for these securities is \$6,043,118.

The aggregate cost for federal income tax purposes of investments in unaffiliated rights to milestone payments is

(5) \$3,291,750. The gross unrealized appreciation based on the tax cost for these securities is \$71,041. The gross unrealized depreciation based on the tax cost for these securities is \$0.

(6) The aggregate cost for federal income tax purposes of investments in unaffiliated publicly traded companies is \$12,743,787. The gross unrealized appreciation based on the tax cost for these securities is \$21,975,176. The gross

unrealized depreciation based on the tax cost for these securities is \$5,234,436.

(7) We are subject to legal restrictions on the sale of our investment(s) in this company.

The accompanying notes are an integral part of this consolidated schedule.

125

HARRIS & HARRIS GROUP, INC.

CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011

With our investment in the Series E round of financing, we received a warrant to purchase shares of common stock of up to 30 percent of the amount invested in the Series E round of financing of Bridgelux, Inc., depending on certain financial performance metrics of the company as of December 31, 2011, at a price per share of \$1.9056. The number of shares able to be purchased and beginning of the period for when this warrant is exercisable will be set upon receipt of the audited financial statements of the company for the 2011 fiscal year or upon the completion of an IPO or sale of the company, whichever comes first. Bridgelux did not complete an IPO or sale of the (8) company as of December 31, 2011. Also as of that date, the audited financials for the company's 2011 fiscal year were not available. This warrant is, therefore, a contingent asset as of December 31, 2011. With our investment in the bridge note financing in the fourth quarter of 2011, we received a warrant for the purchase of common stock that is exercisable at the date of issuance, but the number of shares for which it can be exercised increases monthly from the date of issuance through the close of the next round of equity financing of the company up to 50 percent of the principal amount invested in the note divided by \$1.9056. The warrant for common stock is exercisable for 56,564 shares of common stock of Bridgelux as of December 31, 2011.

These investments are development-stage companies. A development-stage company is defined as a company that is devoting substantially all of its efforts to establishing a new business, and either it has not yet commenced its (9) planned principal operations, or it has commenced such operations but has not realized significant revenue from them.

(10) Cobalt Technologies, Inc., also does business as Cobalt Biofuels.

With our investment in a convertible bridge note issued by Ensemble Therapeutics Corporation, we received a warrant to purchase a number of shares of the class of stock sold in the next financing of Ensemble Therapeutics Corporation equal to \$149,539.57 divided by the price per share of the class of stock sold in the next financing of (11) Ensemble Therapeutics Corporation. The ability to exercise this warrant is, therefore, contingent on Ensemble Therapeutics Corporation completing successfully a subsequent round of financing. This warrant shall expire and no longer be exercisable on September 10, 2015. The cost basis of this warrant is \$89.86.

As part of a loan the Company made to Molecular Imprints in the second quarter of 2011, we received a liquidation preference payable upon a sale of the company equal to three times the principal of the loan, or (12) \$4,044,450. This preference is senior to the preferences of the outstanding preferred stock. While the loan has since been repaid, this liquidation preference remains outstanding as of December 31, 2011.

(13) Represents a non-income producing security. Investments that have not paid dividends or interest within the last 12 months are considered to be non-income producing.

(14) Initial investment was made during 2011.

(15) A portion of this security is held in connection with written call option contracts: 300,000 shares have been pledged to brokers.

(16) The lock-up period on our 2,304,149 shares of Solazyme, Inc., expired on November 25, 2011.

The accompanying notes are an integral part of this consolidated schedule.

126

HARRIS & HARRIS GROUP, INC.

CONSOLIDATED SCHEDULE OF INVESTMENTS AS OF DECEMBER 31, 2011

The aggregate cost for federal income tax purposes of investments in non-controlled affiliated companies is (17) \$48,968,029. The gross unrealized appreciation based on the tax cost for these securities is \$9,066,325. The gross unrealized depreciation based on the tax cost for these securities is \$10,432,569.

The aggregate cost for federal income tax purposes of investments in non-controlled affiliated publicly traded (18) companies is \$2,000,000. The gross unrealized appreciation based on the tax cost for these securities is \$0. The gross unrealized depreciation based on the tax cost for these securities is \$26,666.

D-Wave Systems, Inc., is located and is doing business primarily in Canada. We invested in D-Wave Systems, (19) Inc., through Parallel Universes, Inc., a Delaware company. Our investment is denominated in Canadian dollars and is subject to foreign currency translation. See "Note 2. Summary of Significant Accounting Policies."

(20) Our 2,666,667 shares of Champions Oncology, Inc., became freely tradable on October 1, 2011, pursuant to Rule 144.

The aggregate cost for federal income tax purposes of investments in controlled affiliated companies is (21) \$12,518,936. The gross unrealized appreciation based on the tax cost for these securities is \$0. The gross unrealized depreciation based on the tax cost for these securities is \$5,641,370.

The accompanying notes are an integral part of this consolidated schedule.



**HARRIS & HARRIS GROUP, INC.**

**FOOTNOTE TO CONSOLIDATED SCHEDULE OF INVESTMENTS**

**VALUATION PROCEDURES**

**I. Determination of Net Asset Value**

The 1940 Act requires periodic valuation of each investment in the portfolio of the Company to determine its net asset value. Under the 1940 Act, unrestricted securities with readily available market quotations are to be valued at the current market value; all other assets must be valued at "fair value" as determined in good faith by or under the direction of the Board of Directors.

The Board of Directors is responsible for (1) determining overall valuation guidelines and (2) ensuring that the investments of the Company are valued within the prescribed guidelines.

The Valuation Committee, comprised of all of the independent Board members, is responsible for determining the valuation of the Company's assets within the guidelines established by the Board of Directors. The Valuation Committee receives information and recommendations from management. An independent valuation firm also reviews select portfolio company valuations. The independent valuation firm does not provide proposed valuations.

The values assigned to these investments are based on available information and do not necessarily represent amounts that might ultimately be realized when that investment is sold, as such amounts depend on future circumstances and cannot reasonably be determined until the individual investments are actually liquidated or become readily marketable.

**II. Approaches to Determining Fair Value**

Accounting principles generally accepted in the United States of America ("GAAP") define fair value as the price that would be received to sell an asset or paid to transfer a liability in an orderly transaction between market participants at the measurement date (exit price). In effect, GAAP applies fair value terminology to all valuations whereas the 1940 Act applies market value terminology to readily marketable assets and fair value terminology to other assets.

The main approaches to measuring fair value utilized are the market approach and the income approach.

Market Approach (M): The market approach uses prices and other relevant information generated by market transactions involving identical or comparable assets or liabilities. For example, the market approach often uses market multiples derived from a set of comparables. Multiples might lie in ranges with a different multiple for each comparable. The selection of where within the range each appropriate multiple falls requires judgment considering factors specific to the measurement (qualitative and quantitative).

Income Approach (I): The income approach uses valuation techniques to convert future amounts (for example, cash flows or earnings) to a single present value amount (discounted). The measurement is based on the value indicated by current market expectations about those future amounts. Those valuation techniques include present value techniques; option-pricing models, such as the Black-Scholes-Merton formula (a closed-form model) and a binomial model (a lattice model), which incorporate present value techniques; and the multi-period excess earnings method, which is used to measure the fair value of certain assets.

GAAP classifies the inputs used to measure fair value by these approaches into the following hierarchy:

Level 1: Unadjusted quoted prices in active markets for identical assets or liabilities.

Level 2: Quoted prices in active markets for similar assets or liabilities, or quoted prices for identical or similar assets or liabilities in markets that are not active, or inputs other than quoted prices that are observable for the asset or liability, either directly or indirectly, for substantially the full term of the financial instrument. Level 2 inputs are in those markets for which there are few transactions, the prices are not current, little public information exists or instances where prices vary substantially over time or among brokered market makers; and

Level 3: Inputs to the valuation methodology are unobservable and significant to the fair value measurement. Unobservable inputs are those inputs that reflect our own assumptions that market participants would use to price the asset or liability based upon the best available information.

Financial assets and liabilities are classified in their entirety based on the lowest level of input that is significant to the fair value measurement and are not necessarily an indication of risks associated with the investment.

### **III. Investment Categories**

The Company's investments can be classified into five broad categories for valuation purposes:

Equity-related securities;

Long-term fixed-income securities;

Short-term fixed-income securities;

· Investments in intellectual property, patents, research and development in technology or product development; and

· All other securities.

The Company applies the methods for determining fair value discussed above to the valuation of investments in each of these five broad categories as follows:

**A. EQUITY-RELATED SECURITIES**

Equity-related securities, including options or warrants, are fair valued using the market or income approaches. The following factors may be considered when the market approach is used to fair value these types of securities:

§ Readily available public market quotations;

§ The cost of the Company's investment;

§ Transactions in a company's securities or unconditional firm offers by responsible parties as a factor in determining valuation;

§ The financial condition and operating results of the company;

§ The company's progress towards milestones.

§ The long-term potential of the business and technology of the company;

§ The values of similar securities issued by companies in similar businesses;

§ Multiples to revenue, net income or EBITDA that similar securities issued by companies in similar businesses receive;

§ The proportion of the company's securities we own and the nature of any rights to require the company to register restricted securities under applicable securities laws; and

§ The rights and preferences of the class of securities we own as compared with other classes of securities the portfolio company has issued.

When the income approach is used to value warrants, the Company uses the Black-Scholes-Merton formula.

**B. LONG-TERM FIXED-INCOME SECURITIES**

1. **Readily Marketable: Long-term fixed-income securities** for which market quotations are readily available are valued using the most recent bid quotations when available.

130

**Not Readily Marketable: Long-term fixed-income securities** for which market quotations are not readily available are fair valued using the income approach. The factors that may be considered when valuing these types of securities by the income approach include:

- Credit quality;
- Interest rate analysis;
- Quotations from broker-dealers;
- Prices from independent pricing services that the Board believes are reasonably reliable; and
- Reasonable price discovery procedures and data from other sources.

**C. SHORT-TERM FIXED-INCOME SECURITIES**

Short-term fixed-income securities are valued in the same manner as long-term fixed-income securities until the remaining maturity is 60 days or less, after which time such securities may be valued at amortized cost if there is no concern over payment at maturity.

**D. INVESTMENTS IN INTELLECTUAL PROPERTY, PATENTS, RESEARCH AND DEVELOPMENT IN TECHNOLOGY OR PRODUCT DEVELOPMENT**

Such investments are fair valued using the market approach. The Company may consider factors specific to these types of investments when using the market approach including:

- The cost of the Company's investment;
- Investments in the same or substantially similar intellectual property or patents or research and development in technology or product development or offers by responsible third parties;
- The results of research and development;
- Product development and milestone progress;
- Commercial prospects;
- Term of patent;
- Projected markets; and
- Other subjective factors.

**E. ALL OTHER SECURITIES**

All other securities are reported at fair value as determined in good faith by the Valuation Committee using the approaches for determining valuation as described above.

For all other securities, the reported values shall reflect the Valuation Committee's judgment of fair values as of the valuation date using the outlined basic approaches of valuation discussed in Section III. They do not necessarily represent an amount of money that would be realized if we had to sell such assets in an immediate liquidation. Thus, valuations as of any particular date are not necessarily indicative of amounts that we may ultimately realize as a result of future sales or other dispositions of investments we hold.



## NOTES TO CONSOLIDATED FINANCIAL STATEMENTS

### NOTE 1. THE COMPANY

Harris & Harris Group, Inc. (the "Company," "us," "our" and "we"), is a venture capital company operating as a business development company ("BDC") under the Investment Company Act of 1940 (the "1940 Act") that specializes in making investments in companies commercializing and integrating products enabled by nanotechnology and microsystems. We operate as an internally managed investment company whereby our officers and employees, under the general supervision of our Board of Directors, conduct our operations.

H&H Ventures Management, Inc.<sup>SM</sup> ("Ventures"), formerly Harris & Harris Enterprises, Inc.<sup>SM</sup>, is a 100 percent wholly owned subsidiary of the Company. Ventures is taxed under Subchapter C of the Code (a "C Corporation"). Harris Partners I, L.P. is a limited partnership and, from time to time, may be used to hold certain interests in portfolio companies. The partners of Harris Partners I, L.P., are Ventures (sole general partner) and the Company (sole limited partner). Ventures pays taxes on income generated by its operations as well as on any non-passive investment income generated by Harris Partners I, L.P. For the years ended December 31, 2012, 2011 and 2010, there was no non-passive investment income generated by Harris Partners I, L.P. Ventures, as the sole general partner, consolidates Harris Partners I, L.P. The Company consolidates its wholly owned subsidiary, Ventures, for financial reporting purposes.

### NOTE 2. SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

The following is a summary of significant accounting policies followed in the preparation of the consolidated financial statements:

Principles of Consolidation. The consolidated financial statements have been prepared in accordance with accounting principles generally accepted in the United States of America ("GAAP") and include the accounts of the Company and its wholly owned subsidiary. In accordance with GAAP and Regulation S-X, the Company may only consolidate its interests in investment company subsidiaries and controlled operating companies whose business consists of providing services to the Company. Our wholly owned subsidiary, Ventures, is a controlled operating company that provides services to us and is, therefore, consolidated. All significant inter-company accounts and transactions have been eliminated in consolidation. Certain prior period amounts have been reclassified to conform to the current period presentation.

Revision of Previously Reported Consolidated Financial Statements During the First Quarter of 2012. During the period ended March 31, 2012, the Company concluded the Consolidated Statements of Cash Flows erroneously

classified cash flow items within operating and investing activities. Specifically, the Company's purchases and sales of various debt, equity and other securities were previously classified within investing activities when such purchases and sales activities should have been classified within operating activities. Following is a list of purchases and sales activities that have now been included in operating activities, rather than investing activities, in the Consolidated Statements of Cash Flows:

Purchase of U.S. government securities  
Sale of U.S. government securities  
Investment in affiliated portfolio companies  
Investment in unaffiliated portfolio companies  
Proceeds from sale of investments  
Proceeds from call option premiums  
Payments for call option purchases  
Principal payments received on debt investments

The net impact of these revisions was to increase the total cash used in operating activities and decrease the total cash used in investing activities by \$4,475,222, \$3,765,559 and \$23,780,399 for the three months ended March 31, 2011, the six months ended June 30, 2011, and the nine months ended September 30, 2011, respectively. For the years ended December 31, 2011, and 2010, the net impact was to increase cash provided by total operating activities and decrease cash provided by total investing activities by \$35,665,311 and \$8,058,322, respectively. The Company assessed the impact of the error on its prior period financial statements and concluded that the error was not material to any of those financial statements.

Use of Estimates. The preparation of the consolidated financial statements in conformity with GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and contingent assets and liabilities and the reported amounts of revenues and expenses. Actual results could differ from these estimates, and the differences could be material. The most significant estimates relate to the fair valuations of our investments.

Portfolio Investment Valuations. Investments are stated at "value" as defined in the 1940 Act and in the applicable regulations of the Securities and Exchange Commission ("SEC") and in accordance with GAAP. Value, as defined in Section 2(a)(41) of the 1940 Act, is (i) the market price for those securities for which a market quotation is readily available and (ii) the fair value as determined in good faith by, or under the direction of, the Board of Directors for all other assets. (See "Valuation Procedures" in the "Footnote to Consolidated Schedule of Investments.") As of December 31, 2012, our financial statements include privately held investments and one illiquid publicly traded venture capital investment, Champions Oncology, Inc., collectively fair valued at \$93,579,930. The fair values of our privately held and illiquid publicly traded venture capital investments were determined in good faith by, or under the direction of, the Board of Directors. Upon sale of investments, the values that are ultimately realized may be different from what is presently estimated. The difference could be material.

Cash. Cash includes demand deposits. Cash is carried at cost, which approximates fair value.

Restricted Funds. At December 31, 2012, and December 31, 2011, we held \$10,015 and \$1,512,031, respectively, in "Restricted funds." At December 31, 2012, the amount was comprised of \$10,015 held in security deposits for

sublessors. At December 31, 2011, the amount was comprised of \$1,500,000 held as collateral for our credit facility and \$12,031 held in security deposits for sublessors.

Unaffiliated Rights to Milestone Payments. At December 31, 2012, and December 31, 2011, the outstanding milestone payments from Amgen, Inc.'s acquisition of Biovex Group, Inc., were valued at \$3,400,734 and \$3,362,791, respectively. The milestone payments are derivatives and valued using the probability-adjusted, present value of proceeds from future payments that would be due upon successful completion of certain regulatory and sales milestones. If all remaining milestones are met, we would receive \$9,526,393. There can be no assurances as to how much of this amount we will ultimately realize or when it will be realized, if at all.

Funds Held in Escrow from Sales of Investments. At December 31, 2012, there were funds held in escrow totaling \$1,052,345 relating to the sales of Innovalight, Inc., and Crystal IS, Inc. Funds held in escrow are valued using certain discounts applied to the amounts withheld. Funds held in escrow totaling \$949,468 from the Innovalight transaction were released in January 2013 upon settlement of indemnity claims and expenses related to the transaction. This amount included interest earned on the principal of \$21,755. Funds from the Crystal IS transaction will be released in late March 2013.

Prepaid Expenses. We include prepaid insurance premiums and deferred financing charges in "Prepaid expenses." Prepaid insurance premiums are recognized over the term of the insurance contract. Deferred financing charges consist of fees and expenses paid in connection with the closing of credit facilities and are capitalized at the time of payment. Deferred financing charges are amortized over the term of the credit facility discussed in "Note 4. Debt." Amortization of the financing charges is included in "Interest and other debt expense" in the "Consolidated Statements of Operations."

Property and Equipment. Property and equipment are included in "Other assets" and are carried at \$288,122 and \$331,006 at December 31, 2012, and December 31, 2011, respectively, representing cost, less accumulated depreciation. Depreciation is provided using the straight-line method over the estimated useful lives of the premises and equipment. We estimate the useful lives to be five to ten years for furniture and fixtures, three years for computer equipment, and ten years for leasehold improvements.

Post Retirement Plan Liabilities. The Company provides a Retiree Medical Benefit Plan for employees who meet certain eligibility requirements. Until it was terminated on May 5, 2011, the Company also provided an Executive Mandatory Retirement Benefit Plan for certain individuals employed by us in a bona fide executive or high policy-making position. The net periodic postretirement benefit cost for the year is determined as the sum of service cost for the year, interest on the accumulated postretirement benefit obligation and amortization of the transition obligation (asset) less previously accrued expenses over the average remaining service period of employees expected to receive plan benefits. Unrecognized actuarial gains and losses are recognized as net periodic benefit cost pursuant to the Company's historical accounting policy for amortizing such amounts. Actuarial gains and losses that arise that are not recognized as net periodic benefit cost in the same periods are recognized as a component of net assets.

**Interest Income Recognition.** Interest income, adjusted for amortization of premium and accretion of discount, is recorded on an accrual basis. When securities are determined to be non-income producing, the Company ceases accruing interest and writes off any previously accrued interest. Securities are deemed to be non-income producing if, on their last interest or dividend date, no cash was paid or no cash or in-kind dividends were declared. These write-offs are recorded as a debit to interest income. During the twelve months ended December 31, 2012, and December 31, 2011, the Company earned \$322,561 and \$233,001, respectively, in interest on U.S. government securities, senior secured debt, participation agreements, subordinated secured debt, non-convertible promissory notes and interest-bearing accounts. During the twelve months December 31, 2012, and December 31, 2011, the Company recorded, on a net basis, \$235,806 and \$368,479, respectively, of bridge note interest. The total for the twelve months ended December 31, 2012, includes a partial write-off of previously accrued bridge note interest of \$200,583, which was recognized in the second quarter of 2012, offset by \$236,238 of interest recognized in the third quarter upon conversion of this investment. During the twelve months ended December 31, 2012, and December 31, 2011, the Company earned \$107,586 and \$81,113, respectively, on rental income from the sublet of our office space at 420 Florence Street, Palo Alto, CA.

**Loan Fees.** Loan fees received in connection with our venture debt investments are deferred. The unearned fee income is accreted into income based on the effective interest method over the life of the investment.

**Call Options.** The Company writes covered call options on publicly traded securities with the intention of earning option premiums. Option premiums may increase the Company's realized gains and, therefore, may help increase distributable income, but may limit the realized gains on the security. When a Company writes (sells) an option, an amount equal to the premium received by the Company is recorded in the Consolidated Statements of Assets and Liabilities as a liability. The amount of the liability is subsequently marked-to-market to reflect the current market value of the option written. When an option expires, the Company realizes a gain on the option to the extent of the premiums received. Premiums received from writing options that are exercised or closed are added to or offset against the proceeds or amount paid on the transaction to determine the realized gain or loss. At December 31, 2012, the Company had 50,000 shares of NeoPhotonics Corporation and 150,000 shares of Solazyme, Inc., covered by call option contracts. In the event these contracts are exercised, the Company would be required to deliver those shares to the counterparty. See "Note 13. Subsequent Events."

**Stock-Based Compensation.** The Company has a stock-based employee compensation plan. The Company accounts for the Amended and Restated Harris & Harris Group, Inc. 2012 Equity Incentive Plan (the "Stock Plan") by determining the fair value of all share-based payments to employees, including the fair value of grants of employee stock options and restricted stock awards, and records these amounts as an expense in the Consolidated Statements of Operations over the vesting period with a corresponding increase to our additional paid-in capital. At December 31, 2012, and December 31, 2011, the increase to our operating expenses was offset by the increase to our additional paid-in capital, resulting in no net impact to our net asset value. Additionally, the Company does not record the potential tax benefits associated with the expensing of stock options because the Company currently intends to qualify as a regulated investment company ("RIC") under Subchapter M of the Internal Revenue Code of 1986 (the "Code"), and the deduction attributable to such expensing, therefore, is unlikely to provide any additional tax savings. The amount of non-cash, stock-based compensation expense recognized in the Consolidated Statements of Operations is based on the fair value of the awards the Company expects to vest, recognized over the vesting period on a

straight-line basis for each award, and adjusted for actual awards vested and pre-vesting forfeitures. The forfeiture rate is estimated at the time of grant and revised, if necessary, in subsequent periods if the actual forfeiture rate differs from the estimated rate and is accounted for in the current period and prospectively. See "Note 7. Stock-Based Compensation" for further discussion.

Rent expense. Our lease at 1450 Broadway, New York, New York, commenced on January 21, 2010. The lease expires on December 31, 2019. The base rent is \$36 per square foot with a 2.5 percent increase per year over the 10 years of the lease, subject to a full abatement of rent for four months and a rent credit for six months throughout the lease term. Certain leasehold improvements were also paid for on our behalf by the landlord, the cost of which is accounted for as property and equipment and "Deferred rent" in the accompanying Consolidated Statements of Assets and Liabilities. These leasehold improvements are depreciated over the lease term. We also lease office space in California and North Carolina. We apply these rent abatements, credits, escalations and landlord payments on a straight-line basis in the determination of rent expense over the lease term.

Realized Gain or Loss and Unrealized Appreciation or Depreciation of Portfolio Investments. Realized gain or loss is recognized when an investment is disposed of and is computed as the difference between the Company's cost basis in the investment at the disposition date and the net proceeds received from such disposition. Realized gains and losses on investment transactions are determined by specific identification. Unrealized appreciation or depreciation is computed as the difference between the fair value of the investment and the cost basis of such investment.

Income Taxes. As we intend to qualify as a RIC under Subchapter M of the Code, the Company does not provide for income taxes. The Company has capital loss carryforwards that can be used to offset net realized capital gains. The Company recognizes interest and penalties in income tax expense.

We pay federal, state and local income taxes on behalf of our wholly owned subsidiary, Ventures, which is a C corporation. See "Note 10. Income Taxes."

Foreign Currency Translation. The accounting records of the Company are maintained in U.S. dollars. All assets and liabilities denominated in foreign currencies are translated into U.S. dollars based on the rate of exchange of such currencies against U.S. dollars on the date of valuation. For the twelve months ended December 31, 2012, included in the net decrease in unrealized appreciation on investments was an unrealized gain of \$123,904 resulting from foreign currency translation.

Securities Transactions. Securities transactions are accounted for on the date the transaction for the purchase or sale of the securities is entered into by the Company (i.e., trade date).

Concentration of Credit Risk. The Company places its cash and cash equivalents with financial institutions and, at times, cash held in depository accounts may exceed the Federal Deposit Insurance Corporation insured limit.





Recent Accounting Pronouncement. In May 2011, the FASB issued Accounting Standards Update No. 2011-04, *Fair Value Measurement: Amendments to Achieve Common Fair Value Measurement and Disclosure Requirements in U.S. GAAP and IFRS*, or ASU 2011-04. ASU 2011-04 clarifies the application of existing fair value measurement and disclosure requirements, changes the application of some requirements for measuring fair value and requires additional disclosure for fair value measurements. ASU 2011-04 was effective for interim and annual periods beginning after December 15, 2011, for public entities. The Company has implemented ASU 2011-04, which implementation did not have an impact on the Company's consolidated financial position or results of operations, but did result in the inclusion of the additional disclosures in "Note 5. Fair Value of Investments."

In October 2011, the FASB issued a proposed ASU 2011-20, *Financial Services-Investment Companies: Amendments to the Scope, Measurement, and Disclosure Requirements*, which would amend the criteria in Topic 946 for determining whether an entity qualifies as an investment company for reporting purposes. As proposed, this ASU would affect the measurement, presentation and disclosure requirements for investment companies and would amend the investment company definition in ASC 946. The Company is monitoring developments related to this proposal and is evaluating the effects it would have on the Company's consolidated financial statements.

Other accounting standards that have been issued or proposed by the FASB or other standards-setting bodies are not expected to have a material impact on the Company's financial position, results of operations or cash flows.

### **NOTE 3. BUSINESS RISKS AND UNCERTAINTIES**

We invest primarily in privately held companies, the securities of which are inherently illiquid. We also have investments in small publicly traded companies. Although these companies are publicly traded, their stock may not trade at high volumes and prices can be volatile, which may restrict our ability to sell our positions. These privately held and publicly traded businesses tend to not have attained profitability, and many of these businesses also lack management depth and have limited or no history of operations. Because of the speculative nature of our investments and the lack of a liquid market for and restrictions on transfers of privately held investments and some of our publicly traded investments, there is greater risk of loss than is the case with traditional investment securities.

We do not choose investments based on a strategy of diversification. We also do not rebalance the portfolio should one of our portfolio companies increase in value substantially relative to the rest of the portfolio. Therefore, the value of our portfolio may be more vulnerable to microeconomic events affecting a single sector, industry or portfolio company and to general macroeconomic events that may be unrelated to our portfolio companies. These factors may subject the value of our portfolio to greater volatility than a company that follows a diversification strategy. As of December 31, 2012, our largest 10 investments by value accounted for approximately 73 percent of the value of our equity-focused venture capital portfolio. Our largest two investments, by value, Solazyme, Inc., a publicly traded company, and Xradia, Inc., a privately held company, accounted for approximately 14 percent and 12 percent, respectively, of our equity-focused venture capital portfolio at December 31, 2012.



Approximately 85 percent of our equity-focused venture capital portfolio by value was comprised of securities of 26 privately held companies. Because there is typically no public or readily ascertainable market for our interests in the small privately held companies in which we invest, the valuation of the securities in that portion of our portfolio is determined in good faith by our Valuation Committee, which is comprised of all of the independent members of our Board of Directors. The values are determined in accordance with our Valuation Procedures and are subject to significant estimates and judgments. The fair value of the securities in our portfolio may differ significantly from the values that would be placed on these securities if a ready market for the securities existed. Any changes in valuation are recorded in our Consolidated Statements of Operations as "Net (decrease) increase in unrealized appreciation on investments." Changes in valuation of any of our investments in privately held companies from one period to another may be significant.

**NOTE 4. DEBT**

On February 24, 2011, the Company established a \$10 million three-year revolving credit facility (the "credit facility") with TD Bank, N.A. to be used in conjunction with its investments in venture debt.

The credit facility matures on February 24, 2014, and generally bears interest, at the Company's option, based on (i) LIBOR plus 1.25 percent or (2) the higher of the federal funds rate plus fifty basis points (0.50 percent) or the U.S. prime rate as published in the Wall Street Journal. The credit facility generally requires payment of interest on a monthly basis and requires the payment of a non-use fee of 0.15 percent annually. All outstanding principal is due upon maturity. The credit facility is secured by cash collateral held in a non-interest bearing account at TD Bank, N.A. The credit facility contains affirmative and restrictive covenants, including: (a) periodic financial reporting requirements, (b) maintaining our status as a BDC (c) maintaining unencumbered, liquid assets of not less than \$7,500,000, (d) limitations on the incurrence of additional indebtedness, (e) limitations on liens, and (f) limitations on mergers and dissolutions. The credit facility is used to supplement our capital to make additional venture debt investments.

At December 31, 2012, and December 31, 2011, the Company had outstanding debt of \$0 and \$1,500,000, respectively. At December 31, 2012, and December 31, 2011, \$0 and \$1,500,000, respectively, was held in a collateral account at TD Bank, N.A. as security for the loan. The weighted average annual interest rate for the twelve months ended December 31, 2012, was 1.6 percent, exclusive of amortization of closing fees and other expenses related to establishing the credit facility. The remaining capacity under the credit facility was \$10,000,000 at December 31, 2012. At December 31, 2012, the Company was in compliance with all financial covenants required by the credit facility.

| <b>Total Debt Outstanding (Unit)</b>         | <b>Total Assets per</b>     |
|--|-----------------------------|
| <b>Year Exclusive of Treasury Securities</b> | <b>Unit of Indebtedness</b> |

2012 \$ 0 \$ 0

**NOTE 5. FAIR VALUE OF INVESTMENTS**

At December 31, 2012, our financial assets were categorized as follows in the fair value hierarchy:

| Description                             | Fair Value Measurement at Reporting Date Using: |   |   |   |
|---|---|---|---|---|
|   | December 31,<br>2012                            | Unadjusted Quoted<br>Prices in Active<br>Markets<br>for Identical Assets<br>(Level 1) | Significant<br>Other<br>Observable<br>Inputs<br>(Level 2) | Significant<br>Unobservable<br>Inputs (Level 3) |
| U.S. Government Securities              | \$ 13,998,880                                   | \$ 13,998,880   | \$ 0  | \$ 0  |
| Privately Held Portfolio<br>Companies:  |   |   |   |   |
| Preferred Stock                         | \$ 78,615,582                                   | \$ 0  | \$ 0  | \$ 78,615,582                                   |
| Bridge Notes                            | \$ 4,152,634                                    | \$ 0  | \$ 0  | \$ 4,152,634                                    |
| Warrants                                | \$ 586,320                                      | \$ 0  | \$ 0  | \$ 586,320                                      |
| Rights to Milestone Payments            | \$ 3,400,734                                    | \$ 0  | \$ 0  | \$ 3,400,734                                    |
| Common Stock                            | \$ 108,667                                      | \$ 0  | \$ 0  | \$ 108,667                                      |
| Senior Secured Debt                     | \$ 1,075,870                                    | \$ 0  | \$ 0  | \$ 1,075,870                                    |
| Participation Agreement                 | \$ 1,138,148                                    | \$ 0  | \$ 0  | \$ 1,138,148                                    |
| Subordinated Secured Debt               | \$ 120,410                                      | \$ 0  | \$ 0  | \$ 120,410                                      |
| Non-Convertible Promissory Note         | \$ 3,033,338                                    | \$ 0  | \$ 0  | \$ 3,033,338                                    |
| Publicly Traded Portfolio<br>Companies: |   |   |   |   |
| Common Stock                            | \$ 15,770,488                                   | \$ 14,422,261   | \$ 0  | \$ 1,348,227                                    |
| Total Investments                       | \$ 122,001,071                                  | \$ 28,421,141   | \$ 0  | \$ 93,579,930                                   |
| Liabilities:                            |   |   |   |   |
| Written Call Options                    | \$ 42,500                                       | \$ 37,500   | \$ 5,000  | \$ 0  |
| Total                                   | \$ 42,500                                       | \$ 37,500   | \$ 5,000  | \$ 0  |

At December 31, 2012, certain written call option contracts were classified as Level 2 investments because there was no active market for the options as of that date. These options were valued using a midpoint pricing convention.

*Significant Unobservable Inputs*

The table below presents the valuation technique and quantitative information about the significant unobservable inputs utilized by the Company in the fair value measurements of Level 3 assets. Unobservable inputs are those inputs for which little or no market data exists and, therefore, require an entity to develop its own assumptions.

140

|                 | Fair Value<br>at<br>Dec. 31,<br>2012 | Valuation Techniques(s)            | Unobservable Input  | Range<br>(Weighted<br>Average <sup>(1)</sup> ) |
|-----------------|--------------------------------------|------------------------------------|---|--|
|                 |                                      |                                    |   | 50% -<br>100%<br>(N/A)                         |
|                 |                                      |                                    |   | \$0.14 -<br>\$4.00<br>(\$1.28)                 |
| Preferred Stock | \$78,615,582                         | Income Approach<br>Market Approach | Probability of Achieving Milestones<br>Private Offering Price<br>Non-Performance Risk<br>Revenue Multiple<br>Discount for Illiquidity<br>Probability of Exit Outcomes | 0% -<br>100%<br>(11%)<br>0.53 - 3.3<br>(1.4)   |
|                 |                                      |                                    |   | 20% -<br>30%<br>(21%)                          |
|                 |                                      |                                    |   | 0% -<br>100%<br>(50%)                          |
| Bridge Notes    | 4,152,634                            | Market Approach                    | Private Offering Price<br>Non-Performance Risk  | \$1.00<br>(\$1.00)                             |
|                 |                                      |                                    |   | 0% (0%)  |
| Common Stock    | 108,667                              | Market Approach                    | Private Offering Price<br>Non-Performance Risk  | \$0.54 -<br>\$47.51<br>(\$11.06)               |
|                 |                                      |                                    |   | 0% -<br>100%<br>(0%)                           |
| Warrants        | 586,320                              | Black-Sholes-Merton<br>Model       | Stock Price<br>Volatility<br>Expected Term  | \$0.12 -<br>\$2.44<br>(\$0.82)                 |
|                 |                                      |                                    |   | 107%<br>(107%)                                 |



|                                 |           |   |  |                                   |
|---------------------------------|-----------|---|--|-----------------------------------|
|                                 |           |   |  | 0.50 -<br>9.88<br>Years<br>(4.22) |
| Rights to Milestone Payments    | 3,400,734 | Probability Weighted Discounted Cash Flow | Probability of Achieving Independent Milestones<br>Probability of Achieving Dependent Milestones   | 0% -<br>75%<br>(N/A)              |
|                                 |           |   |  | 0.07% -<br>28.125%<br>(N/A)       |
|                                 |           |   |  | 21.5% -<br>27.9%<br>(23%)         |
| Participation Agreements        | 1,138,148 | Income Approach                           | Warrant Adjusted Effective Yield<br>Effective Yield<br>Non-Performance Risk<br>Participation Payment Risk<br>Discount for Comparable Prices of High-Yield Debt | 21.5% -<br>37.9%<br>(27%)         |
|                                 |           |   |  | 0% -<br>25%<br>(11%)              |
|                                 |           |   |  | 0% (0%)                           |
|                                 |           |   |  | 0% (0%)                           |
|                                 |           |   |  | 31.3%<br>(31.3%)                  |
| Subordinated Secured Debt       | 120,410   | Income Approach                           | Warrant Adjusted Effective Yield<br>Effective Yield<br>Non-Performance Risk  | 39.1%<br>(39.1%)                  |
|                                 |           |   |  | 25%<br>(25%)                      |
|                                 |           |   |  | 15.8% -<br>32%<br>(23%)           |
| Senior Secured Debt             | 1,075,870 | Income Approach                           | Effective Yield<br>Non-Performance Risk  | 0% -<br>25%<br>(11%)              |
| Non-Convertible Promissory Note | 3,033,338 | Income Approach                           | Probability of Exit Outcomes<br>Private Offering Price<br>Non-Performance Risk   | 25% -<br>75%<br>(50%)             |

|                            |              |                 |  |                    |
|----------------------------|--------------|-----------------|--|--------------------|
|                            |              |                 |  | \$3.00             |
|                            |              |                 |  | (\$3.00)           |
|                            |              |                 |  | 50%                |
|                            |              |                 |  | (50%)              |
|                            |              |                 |  | 0% (0%)            |
| OTC Traded<br>Common Stock | \$ 1,348,227 | Market Approach | Non-Performance Risk<br>Warrant Adjusted Price per Share | \$0.47<br>(\$0.47) |
| Total                      | \$93,579,930 |                 |  |                    |

(1) Weighted average based on fair value at December 31, 2012.

Valuation Methodologies and Inputs for Level 3 Assets

The following sections describe the valuation techniques and significant unobservable inputs used to measure Level 3 assets.

*Preferred Stock, Bridge Notes and Common Stock*

Preferred stock, bridge notes and common stock are valued by either a market or income approach using internal models with inputs, most of which are not market observable. Common inputs for valuing Level 3 preferred stock, bridge note and private common stock investments include: prices from recently executed private transactions in a company's securities or unconditional firm offers, revenue multiples of comparable publicly traded companies, discounts for lack of marketability, rights and preferences of the class of securities we own as compared with other classes of securities the portfolio company has issued, particularly related to potential liquidity scenarios of an IPO or an acquisition transaction, and management's best estimate of risk attributable to non-performance risk. Certain securities are valued using the present value of future cash flows. We define non-performance as the risk that the price per share (or implied valuation of a portfolio company) or the effective yield of a debt security of a portfolio company, as applicable, does not appropriately represent the risk that a portfolio company with negative cash flow will be: (a) unable to raise capital, will need to be shut down and will not return our invested capital; or (b) able to raise capital, but at a valuation significantly lower than the implied post-money valuation of the last round of financing. The assessment of non-performance risk typically includes an evaluation of the financial condition and operating results of the company, the company's progress towards milestones, and the long-term potential of the business and technology of the company and how this potential may or may not affect the value of the shares owned by us. An increase to the non-performance risk or a decrease in the private offering price of a future round of financing from that of the most recent round would result in a lower fair value measurement and/or a change in the distribution of value among the classes of securities we own.

Bridge notes commonly contain terms that provide for the conversion of the full amount of principal, and sometimes interest, into shares of preferred stock at a defined price per share and/or the price per share of the next round of financing. The use of a discount for non-performance risk in the valuation of bridge notes would indicate the potential for conversion of only a portion of the principal, plus interest when applicable, into shares of preferred stock or the potential that a conversion event will not occur and that the likely outcome of a liquidation of assets would result in payment of less than the remaining principal outstanding of the note. An increase in non-performance risk would result in a lower fair value measurement.

*Warrants*

We use the Black-Scholes-Merton option-pricing model to determine the fair value of warrants held in our portfolio. Option pricing models, including the Black-Scholes-Merton model, require the use of subjective input assumptions, including expected volatility, expected life, expected dividend rate, and expected risk-free rate of return. In the Black-Scholes-Merton model, variations in the expected volatility or expected term assumptions have a significant impact on fair value. Because the securities underlying the warrants in our portfolio are not publicly traded, many of the required input assumptions are more difficult to estimate than they would be if a public market for the underlying securities existed.

An input to the Black-Scholes-Merton option-pricing model is the value per share of the type of stock for which the warrant is exercisable as of the date of valuation. This input is derived according to the methodologies discussed in "Preferred Stock, Bridge Notes and Common Stock."

*Rights to Milestone Payments*

Rights to Milestone Payments are valued using a probability-weighted discounted cash flow model. As part of Amgen Inc.'s acquisition of our former portfolio company, BioVex Group, Inc., we are entitled to potential future milestone payments based upon the achievement of certain regulatory and sales milestones. We assign probabilities to the achievements of the various milestones. Milestones identified as independent milestones can be achieved irrespective of the achievement of other contractual milestones. Dependent milestones are those that can only be achieved after another, or series of other, milestones are achieved. The interest rates used in these models are observable inputs from sources such as the Federal Reserve published interest rates.

*Participation Agreements, Subordinated Secured Debt and Senior Secured Debt*

We invest in venture debt investments through participation agreements, subordinated secured debt and senior secured debt. We value these securities using an income approach. The income approach uses valuation techniques to convert future amounts (for example, cash flows or earnings) to a single present value amount (discounted). The measurement is based on the value indicated by current market expectations about those future amounts. Common inputs for valuing Level 3 debt investments include: the effective yield of the debt investment or, in the case where we have received warrant coverage, the warrant-adjusted effective yield of the security, adjustments for changes in the yields of comparable publicly traded high-yield debt funds and risk-free interest rates and an assessment of non-performance risk. For those debt investments made through participation agreements, we include discounts for the risk of breach of the participation agreements. For venture debt investments, an increase in yields would result in a lower fair value measurement. Furthermore, yields would decrease, and value would increase, if the company is exceeding targets and risk has been substantially reduced from the level of risk that existed at the time of investment. Yields would increase, and values would decrease, if the company is failing to meet its targets and risk has been increased from the level of risk that existed at the time of investment.

*Non-Convertible Promissory Note*

We have one non-convertible promissory note, which we value using an income approach that uses a valuation technique to convert future amounts to a single present value. This security has a liquidation preference payable upon a sale of the company equal to three times the principal of the loan. While the loan has since been repaid, this liquidation preference remains outstanding as of December 31, 2012. Inputs include the preferred stock price of the portfolio company, an assessment of non-performance risk, the probability of exit outcomes between an IPO and an acquisition and the resulting impact on rights and preferences of the class of securities we own as compared with other classes of securities the portfolio company has issued.



*OTC Traded Common Stock*

Common stock that is thinly traded in OTC markets is valued using internal models with inputs that are not market observable. Common inputs for stock include the price per share of recent privately negotiated financing transactions and the volume-weighted price per share of the stock over a period of time and an assessment of non-performance risk.

The following chart shows the components of change in the financial assets categorized as Level 3 for the twelve months ended December 31, 2012.

|                                 | <b>Beginning<br/>Balance<br/>1/1/2012</b> | <b>Total<br/>Realized<br/>Gains<br/>(Losses)<br/>Included in<br/>Changes in<br/>Net Assets</b> | <b>Transfers</b> | <b>Total<br/>Unrealized<br/>Appreciation<br/>Included in<br/>Changes in<br/>Net Assets</b> | <b>Investments in<br/>Portfolio<br/>Companies,<br/>Interest on<br/>Bridge Notes,<br/>and<br/>Amortization<br/>of Loan<br/>Fees, Net</b> | <b>Disposals</b> | <b>Ending<br/>Balance<br/>12/31/2012</b> | <b>Amount of Total<br/>(Depreciation<br/>Appreciation<br/>Period Included<br/>Changes in Net<br/>Assets<br/>Attributable to<br/>Change in Un-<br/>realized Gains or Losses<br/>Relating to Assets<br/>Still Held at the<br/>Reporting Date</b> |
|---------------------------------|---|--|------------------|--|---|------------------|--|--|
| Preferred Stock                 | \$68,833,189                              | \$0  | \$1,091,677      | \$(4,903,413)  | \$13,594,129  | \$0              | \$78,615,582                             | \$(4,903,413)  |
| Bridge Notes                    | 4,007,509                                 | 0  | (2,727,754)      | 1,310,272  | 1,562,607   | 0                | 4,152,634                                | 1,310,272  |
| Common Stock                    | 0   | 0  | 1,633,296        | (1,524,629)  | 0   | 0                | 108,667                                  | (1,524,629)  |
| Warrants                        | 728,787                                   | 0  | 2,781            | (396,396)  | 251,148   | 0                | 586,320                                  | (396,396)  |
| Rights to Milestone<br>Payments | 3,362,791                                 | 0  | 0                | 37,943   | 0   | 0                | 3,400,734                                | 37,943   |
| Participation<br>Agreements     | 560,200                                   | 0  | 0                | 24,790   | 714,157   | (160,999)        | 1,138,148                                | 24,790   |
| Subordinated Secured<br>Debt    | 121,880                                   | 0  | 0                | (1,103)  | (367)   | 0                | 120,410                                  | (1,103)  |
| Senior Secured Debt             | 942,695                                   | 0  | 0                | (13,663)   | 609,267   | (462,429)        | 1,075,870                                | (13,663)   |
|                                 | 3,033,338                                 | 0  | 0                | 0  | 0   | 0                | 3,033,338                                | 0  |

Non-Convertible  
Promissory Note

Publicly Traded  
Common Stock

Total

|              |     |     |               |              |             |              |               |
|--------------|-----|-----|---------------|--------------|-------------|--------------|---------------|
| 1,973,334    | 0   | 0   | (625,107 )    | 0            | 0           | 1,348,227    | (625,107 )    |
| \$83,563,723 | \$0 | \$0 | \$(6,091,306) | \$16,730,941 | \$(623,428) | \$93,579,930 | \$(6,091,306) |

We elected to use the beginning of period values to recognize transfers in and out of Level 3 investments. For the year ended December 31, 2012, there were no transfers out of Level 3.

At December 31, 2011, our financial assets were categorized as follows in the fair value hierarchy:



| Description                          | Fair Value Measurement at Reporting Date Using: |   |   |   |
|--------------------------------------|---|---|---|---|
|                                      | December 31, 2011                               | Unadjusted Quoted Prices in Active Markets for Identical Assets (Level 1) | Significant Observable Inputs (Level 2) | Other Significant Unobservable Inputs (Level 3) |
| U.S. Government Securities           | \$0   | \$ 0  | \$ 0                                    | \$ 0  |
| Privately Held Portfolio Companies:  |   |   |   |   |
| Preferred Stock                      | \$68,833,189                                    | \$ 0  | \$ 0                                    | \$ 68,833,189                                   |
| Bridge Notes                         | \$4,007,509                                     | \$ 0  | \$ 0                                    | \$ 4,007,509                                    |
| Warrants                             | \$728,787                                       | \$ 0  | \$ 0                                    | \$ 728,787                                      |
| Rights to Milestone Payments         | \$3,362,791                                     | \$ 0  | \$ 0                                    | \$ 3,362,791                                    |
| Senior Secured Debt                  | \$942,695                                       | \$ 0  | \$ 0                                    | \$ 942,695                                      |
| Participation Agreement              | \$560,200                                       | \$ 0  | \$ 0                                    | \$ 560,200                                      |
| Subordinated Secured Debt            | \$121,880                                       | \$ 0  | \$ 0                                    | \$ 121,880                                      |
| Non-Convertible Promissory Note      | \$3,033,338                                     | \$ 0  | \$ 0                                    | \$ 3,033,338                                    |
| Publicly Traded Portfolio Companies: |   |   |   |   |
| Common Stock                         | \$31,457,861                                    | \$ 29,484,527   | \$ 0                                    | \$ 1,973,334                                    |
| Total Investments                    | \$113,048,250                                   | \$ 29,484,527   | \$ 0                                    | \$ 83,563,723                                   |
| Liabilities:                         |   |   |   |   |
| Written Call Options                 | \$195,000                                       | \$ 195,000  | \$ 0                                    | \$ 0  |
| Total                                | \$195,000                                       | \$ 195,000  | \$ 0                                    | \$ 0  |

The following chart shows the components of change in the financial assets categorized as Level 3 for the twelve months ended December 31, 2011.

| Beginning Balance 1/1/2011 | Total Realized Gains (Losses) Included in Changes in Net Assets | Transfers | Total Unrealized Appreciation (Depreciation) Included in Changes in Net Assets | Investments in Portfolio Companies, Interest on Bridge Notes, and Amortization of Loan Fees, Net | Disposals | Ending Balance 12/31/2011 |
|----------------------------|---|-----------|--|--|-----------|---------------------------|
|----------------------------|---|-----------|--|--|-----------|---------------------------|

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

|                                 |               |             |                |               |              |                |              |
|---------------------------------|---------------|-------------|----------------|---------------|--------------|----------------|--------------|
| Preferred Stock                 | \$100,451,746 | \$4,613,504 | \$(26,413,830) | \$(6,223,819) | \$9,327,095  | \$(12,921,507) | \$68,833,189 |
| Bridge Notes                    | 3,565,062     | 34,927      | (4,840,892 )   | 934,824       | 4,772,157    | (458,569 )     | 4,007,509    |
| Common Stock                    | 977,414       | (2,218,388) | 476,165        | 2,796,179     | 0            | (2,031,370 )   | 0            |
| Warrants                        | 684,780       | (14,509 )   | 11,370         | 66,382        | 140,238      | (159,474 )     | 728,787      |
| Rights to Milestone Payments    | 0             | 0           | 3,291,750      | 71,041        | 0            | 0              | 3,362,791    |
| Participation Agreement         | 471,420       | 0           | 0              | 78,047        | 10,733       | 0              | 560,200      |
| Subordinated Secured Debt       | 0             | 0           | 0              | 11,939        | 109,941      | 0              | 121,880      |
| Senior Secured Debt             | 0             | 0           | 0              | 28,207        | 914,488      | 0              | 942,695      |
| Non-Convertible Promissory Note | 0             | 0           | 0              | 3,033,338     | 1,348,150    | (1,348,150 )   | 3,033,338    |
| Publicly Traded Common Stock    | 0             | 0           | (550,000 )     | (26,666 )     | 2,550,000    | 0              | 1,973,334    |
| Total                           | \$106,150,422 | \$2,415,534 | \$(28,025,437) | \$769,472     | \$19,172,802 | \$(16,919,070) | \$83,563,723 |

We elected to use the beginning of period values to recognize transfers in and out of Level 3 investments. For the year ended December 31, 2011, there were transfers out of Level 3 of \$27,475,437. Our investments in NeoPhotonics and Solazyme transferred from Level 3 investments to Level 1 investments as a result of the expiration of the lock-up restrictions on the stock during 2011.

#### **NOTE 6. DERIVATIVES**

The Company has written covered call options on a portion of its holdings of two of its publicly traded portfolio companies in exchange for the receipt of a premium. The option provides the holder the right, but not the obligation, to purchase the shares on which the option is held at a specified price over a specified future period. The call options were sold at a strike price above the market price on the date of the sale allowing the Company to receive potential appreciation in addition to the premium.

Transactions in options written during the year ended December 31, 2012, were as follows:

|  | Number of<br>Contracts | Premium     |
|--|------------------------|-------------|
| Options outstanding at December 31, 2011   | 3,000                  | \$315,000   |
| Options written                            | 37,970                 | 3,170,443   |
| Options expired                            | (11,142 )              | (1,056,804) |
| Options terminated in closing transactions | (27,828 )              | (2,378,639) |
| Options outstanding at December 31, 2012   | 2,000                  | \$50,000    |

At December 31, 2012, and December 31, 2011, we had rights to milestone payments from Amgen's acquisition of our former portfolio company, BioVex. These milestone payments were fair valued at \$3,400,734 and \$3,362,791, respectively, and are contingent upon certain milestones being achieved in the future.

The following tables present the value of derivatives held at December 31, 2012, and the effect of derivatives held during the year ended December 31, 2012, along with the respective location in the financial statements.

| Derivatives      | Assets<br>Location | Fair Value | Liabilities<br>Location      | Fair Value |
|------------------|--------------------|------------|------------------------------|------------|
| Equity Contracts | —                  | —          | Written call options payable | \$ 42,500  |

Amgen, Inc. Rights to Milestone Payments from  
Acquisition of BioVex Group, Inc.

Investments \$3,400,734 — —

146

**Statement of Operations**

| Derivatives  | Location                                   | Realized<br>Gain/(Loss) | <b>Change in unrealized<br/>(Depreciation)/<br/><u>Appreciation</u></b> |
|--|--|-------------------------|---|
| Equity Contracts   | Net Realized and<br>Unrealized Gain (Loss) | \$ 1,605,907            | \$ (112,500 )   |
| Amgen, Inc. Rights to Milestone Payments from<br>Acquisition of BioVex Group, Inc. | Net Realized and<br>Unrealized Gain (Loss) | \$0                     | \$ 37,943   |

**NOTE 7. STOCK-BASED COMPENSATION**

The Company maintains the Stock Plan, which provides for the grant of equity-based awards of stock options to our officers and employees and restricted stock to our officers, employees and non-employee directors subject to compliance with the 1940 Act and an exemptive order granted by the SEC permitting us to award shares of restricted stock on April 3, 2012 (the "Exemptive Order").

Under the Stock Plan, a maximum of 20 percent (6,200,120 shares) of our total shares of common stock issued and outstanding as of the 2012 Annual Meeting date, calculated on a fully diluted basis (31,000,601 shares), were available for awards under the Stock Plan. Under the Stock Plan, no more than 50 percent of the shares of stock reserved for the grant of the awards under the Stock Plan (up to an aggregate of 3,100,060 shares) may be restricted stock awards at any time during the term of the Stock Plan. If any shares of restricted stock are awarded, such awards will reduce on a percentage basis the total number of shares of stock for which options may be awarded. No more than 1,000,000 shares of our common stock may be made subject to awards under the Stock Plan to any individual in any year. Although the Stock Plan permits us to continue to grant stock options, our Board of Directors currently plans to discontinue further grants of stock options.

The Stock Plan will expire on June 7, 2022. The expiration of the Stock Plan will not by itself adversely affect the rights of plan participants under awards that are outstanding at the time the Stock Plan expires. Our Board of Directors may terminate, modify or suspend the plan at any time, provided that no modification of the plan will be effective unless and until any required shareholder approval has been obtained. The Board of Directors may terminate, modify or amend any outstanding award under the Stock Plan at any time, provided that in such event, the award holder may exercise any vested options prior to such termination of the Stock Plan or award.

*Stock Option Awards*

During the years ended December 31, 2012, and 2011, the Compensation Committee of the Board of Directors of the Company did not grant any stock options. During the year ended December 31, 2010, the Compensation Committee approved individual non-qualified stock option ("NQSO") awards for certain officers and employees of the Company. The terms and conditions of the stock options granted were determined by the Compensation Committee and set forth in award agreements between the Company and each award recipient.

The option grants during the year ended December 31, 2010, were as follows:

| Grant Date     | <b>No. of Options<br/>Granted</b> | Option Type | Vesting Period | <b>Exercise Price<sup>1</sup></b> |
|----------------|-----------------------------------|-------------|----------------|-----------------------------------|
| May 12, 2010   | 150,000                           | NQSO        | 05/11 to 05/13 | \$ 4.84                           |
| March 18, 2010 | 150,000                           | NQSO        | 03/11 to 03/13 | \$ 4.75                           |

<sup>1</sup> The exercise price for the grants was the closing price of our shares of common stock as quoted on the Nasdaq Global Market on the date of grant.

The 2010 option awards may become fully vested and exercisable prior to the date or dates in the vesting schedule if the Board of Directors accepts an offer for the sale of all or substantially all of the Company's assets. Upon exercise, the shares would be issued from our previously authorized but unissued shares.

The fair value of the options was determined on the date of grant using the Black-Scholes-Merton model based on the following factors.

An option's expected term is the estimated period between the grant date and the exercise date of the option. As the expected term period increases, the fair value of the option and the non-cash compensation cost will also increase. The expected term assumption is generally calculated using historical stock option exercise data. Management performed an analysis and determined that historical exercise data did not provide a sufficient basis to calculate the expected term of the option. In cases where companies do not have historical data and where the options meet certain criteria, SEC Staff Accounting Bulletin 107 ("SAB 107") provides the use of a simplified expected term calculation. Accordingly, the Company calculated the expected term used in the Black-Scholes-Merton model using the SAB 107 simplified method.

Expected volatility is the measure of how the stock's price is expected to fluctuate over a period of time. An increase in the expected volatility assumption yields a higher fair value of the stock option. The expected volatility factor for the Black-Scholes-Merton model was based on the historical fluctuations in the Company's stock price over a period commensurate with the expected term and contractual term, respectively, of the options, adjusted for stock splits and dividends.

The expected dividend yield assumption is traditionally calculated based on a company's historical dividend yield. An increase to the expected dividend yield results in a decrease in the fair value of options and resulting compensation

cost. Although the Company has declared deemed dividends in previous years, most recently in 2005, the amounts and timing of any future dividends cannot be reasonably estimated. Therefore, for purposes of calculating fair value, the Company has assumed an expected dividend yield of zero percent.



The risk-free interest rate assumption used in the Black-Scholes-Merton model is based on the annual yield on the measurement date of a zero-coupon U.S. Treasury bond the maturity of which equals the option's expected term. The lattice model uses interest rates commensurate with the contractual term of the options. Higher assumed interest rates yield higher fair values.

The assumptions used in the calculation of fair value of the NQSOs granted on March 18, 2010, and May 12, 2010, using the Black-Scholes-Merton model for the expected term was as follows:

| Type of Award                              | Term       | Number of<br><u>Options Granted</u> | Term in<br><u>Yrs</u> | Volatility<br><u>Factor</u> | Dividend<br><u>Yield</u> | Interest<br><u>Rates</u> | Expected | Expected | Expected | Risk-Free | Weighted<br>Average<br>Fair<br>Value Per<br>Share |
|--|------------|-------------------------------------|-----------------------|-----------------------------|--------------------------|--------------------------|----------|----------|----------|-----------|---|
| March 18, 2010 Non-qualified stock options | 5<br>Years | 150,000                             | 3.50                  | 63.1 %                      | 0 %                      | 1.77 %                   |          |          |          |           | \$ 2.20   |
| May 12, 2010 Non-qualified stock options   | 5<br>Years | 150,000                             | 3.50                  | 62.3 %                      | 0 %                      | 1.64 %                   |          |          |          |           | \$ 2.21   |
| Total                                      |            | 300,000                             |                       |                             |                          |                          |          |          |          |           | \$ 2.21   |

For the years ended December 31, 2012, December 31, 2011, and December 31, 2010, the Company recognized \$1,973,569, \$1,894,800 and \$2,088,091, respectively, of compensation expense in the Consolidated Statement of Operations. The amount for the year ended December 31, 2012, includes \$1,365,242 related to the voluntary cancellation of stock options. As of December 31, 2012, there was approximately \$224,182 of unrecognized compensation cost related to unvested stock option awards. This cost is expected to be recognized over a weighted-average period of approximately one year.

No options were exercised during the year ended December 31, 2012. For the year ended December 31, 2011, a total of 122,437 options were exercised for total proceeds to the Company of \$491,058. For the year ended December 31, 2010, a total of 18,571 options were exercised for total proceeds to the Company of \$69,641.

The grant date fair value of options vested during the year ended December 31, 2012, was \$580,542, which included options vested for certain executive officers prior to the voluntary cancellation of 1,963,745 outstanding stock options on May 11, 2012. The grant date fair value of options vested during the years ended December 31, 2011, and December 31, 2010, was \$1,863,330 and \$2,144,123, respectively.

A summary of the changes in outstanding stock options for the year ended December 31, 2012, is as follows:



|  | Shares      | Weighted<br>Average<br>Exercise Price | Weighted<br>Average<br>Grant Date<br>Fair Value | Weighted Average<br>Remaining<br>Contractual<br>Term (Years) | Aggregate<br>Intrinsic<br>Value |
|--|-------------|---------------------------------------|---|--|---------------------------------|
| Options Outstanding at<br>January 1, 2012                                  | 3,389,117   | \$ 8.13                               | \$ 5.04   | 4.96   | \$ 0                            |
| Granted  | 0           | \$ 0                                  | \$ 0  | 0  |                                 |
| Exercised  | 0           | \$ 0                                  | \$ 0  | 0  |                                 |
| Forfeited or Expired   | (1,963,745) | \$ 6.94                               | \$ 4.14   | 4.16   |                                 |
| Options Outstanding at<br>December 31, 2012                                | 1,425,372   | \$ 9.77                               | \$ 6.27   | 3.68   | \$ 0                            |
| Options Exercisable at<br>December 31, 2012                                | 1,368,867   | \$ 9.78                               | \$ 6.25   | 3.69   | \$ 0                            |
| Options Exercisable and Expected to<br>be Exercisable at December 31, 2012 | 1,422,870   | \$ 9.77                               | \$ 6.27   | 3.68   | \$ 0                            |

The aggregate intrinsic value in the table above with respect to options outstanding, exercisable and expected to be exercisable, is calculated as the difference between the Company's closing stock price of \$3.30 on December 31, 2012, and the exercise price, multiplied by the number of in-the-money options. This amount represents the total pre-tax intrinsic value that would have been received by the option holders had all options been fully vested and all option holders exercised their awards on December 31, 2012.

At December 31, 2012, there were 56,505 unvested options with a weighted average grant date fair value of \$6.94. At December 31, 2011, there were 732,835 unvested options with a weighted average grant date fair value of \$4.36. At December 31, 2010, there were 1,222,743 unvested options with a weighted average grant date fair value of \$4.14.

During the year ended December 31, 2012, a total of 162,972 options vested having a weighted average grant date fair value of \$3.56. During the year ended December 31, 2011, a total of 489,914 options vested having a weighted average grant date fair value of \$3.80. During the year ended December 31, 2010, a total of 552,751 options vested having a weighted average grant date fair value of \$3.88.

For the year ended December 31, 2012, no options were exercised. For the year ended December 31, 2011, the aggregate intrinsic value of the 122,437 options exercised was \$142,842. For the year ended December 31, 2010, the aggregate intrinsic value of the 18,571 options exercised was \$13,836.



*Restricted Stock*

The Exemptive Order provided for the grant of 14,000 shares of restricted stock to non-employee directors on June 7, 2012. On June 11, 2012, the Committee granted the employees a total of 1,780,000 shares of restricted stock. A total of 1,068,000 awards (60 percent) vest when the volume-weighted stock price is at or above pre-determined stock price targets over a 30-day period. These pre-determined stock price targets range from \$5.00 per share to \$9.00 per share. The remaining 712,000 of these shares (40 percent) have vesting dates ranging from December 31, 2012, through June 30, 2017, based on the named executive officer's continued service to the Company. After this initial employee grant, the Compensation Committee does not plan to grant additional restricted stock to existing employees until at least June 11, 2015. Pursuant to the Exemptive Order, non-employee directors will receive up to 2,000 shares of restricted stock annually.

The compensation expense for the service-based awards is determined by the market price of our stock at the date of grant applied to the total number of shares we anticipate to fully vest. The market prices on the dates of the director and employee service-based awards were \$3.55 and \$3.38, respectively.

The compensation expense for the market-based awards is determined by the fair value of the awards applied to the number of shares granted, net of estimated forfeitures. The fair values of the market-based awards were determined using a lattice model. The fair values of these awards range from \$2.25 per share to \$2.92 per share and will be expensed over derived service periods ranging from approximately 37 to 75 months.

For the year ended December 31, 2012, we recognized \$955,374 of compensation expense related to restricted stock awards. As of December 31, 2012, there was unrecognized compensation cost of \$4,207,197 related to restricted stock awards. This cost is expected to be recognized over a weighted average period of approximately 2.3 years.

Non-vested restricted stock awards as of December 31, 2012, and changes during the year ended December 31, 2012, were as follows:

|  | Shares     | Weighted-Average Grant<br><u>Date Fair Value Per Share</u> |
|--|------------|--|
| Outstanding at January 1, 2012   | 0          | \$ 0   |
| Granted  | 1,794,000  | 2.88   |
| Vested based on service  | (116,280 ) | 3.38   |
| Shares withheld related to net share<br>settlement of restricted stock | (61,720 )  | 3.38   |
| Forfeited  | 0          | 0  |

Outstanding at December 31, 2012    1,616,000    \$    2.82

151

Under net settlement procedures currently applicable to our outstanding restricted stock awards for current employees, upon each settlement date, restricted stock awards are withheld to cover the required withholding tax, which is based on the value of the restricted stock award on the settlement date as determined by the closing price of our common stock on the trading day on the vesting date. The remaining amounts are delivered to the recipient as shares of our common stock. During 2012, 178,000 restricted stock awards were net settled by withholding 61,720 shares, which represented the employees' minimum statutory obligation for each such employee's applicable income and other employment taxes and remitted cash totaling of \$203,676 to the appropriate tax authorities. The amount remitted to the tax authorities for the employees' tax obligation was reflected as a financing activity within our Consolidated Statements of Cash Flows. The shares withheld by us as a result of the net settlement of restricted stock awards are not considered issued and outstanding, thereby reducing our shares outstanding used to calculate net asset value per share.

#### **NOTE 8. DISTRIBUTABLE EARNINGS**

As of December 31, 2012, December 31, 2011, and December 31, 2010, there were no distributable earnings. The difference between the book basis and tax basis components of distributable earnings is primarily nondeductible deferred compensation and net operating losses.

The Company did not declare dividends for the years ended December 31, 2012, 2011 or 2010.

#### **NOTE 9. EMPLOYEE BENEFITS**

##### **401(k) Plan**

We adopted a 401(k) Plan covering substantially all of our employees. Matching contributions to the plan are at the discretion of the Compensation Committee. For the year ended December 31, 2012, the Compensation Committee approved a 100 percent match which amounted to \$208,383. The 401(k) Company match for the years ended December 31, 2011, and 2010, was \$181,500 and \$176,000, respectively.

##### **Medical Benefit Retirement Plan**

We adopted a plan to provide medical and dental insurance for retirees and their spouses who, at the time of their retirement, have 10 years of service with us and have attained 50 years of age or have attained 45 years of age and

have 15 years of service with us. The coverage is secondary to any government or subsequent employer provided health insurance plans. The annual premium cost to us with respect to the entitled retiree shall not exceed \$12,000, subject to an index for inflation. On December 8, 2003, the Medicare Prescription Drug, Improvement and Modernization Act of 2003 (the "Act") was signed into law. The Act introduced a prescription drug benefit under Medicare (Medicare Part D) as well as a federal subsidy to sponsors of retiree health care benefit plans that provide a benefit that is at least actuarially equivalent to Medicare Part D. The Act, which went into effect January 1, 2006, provides a 28 percent subsidy for post-65 prescription drug benefits. Our liability assumes our plan is actuarially equivalent under the Act.

The plan is unfunded and has no assets. The following disclosures about changes in the benefit obligation under our plan to provide medical and dental insurance for retirees are as of the measurement date of December 31:



|  | 2012        | 2011        |
|--|-------------|-------------|
| Accumulated Postretirement Benefit Obligation at Beginning of Year | \$1,711,092 | \$1,054,875 |
| Service Cost   | 160,428     | 101,787     |
| Interest Cost  | 71,033      | 59,001      |
| Actuarial Loss   | 34,143      | 521,184     |
| Benefits Paid  | (21,580 )   | (25,755 )   |
| Accumulated Postretirement Benefit Obligation at End of Year       | \$1,955,116 | \$1,711,092 |

In accounting for the plan, the assumption made for the discount rate was 4.25 percent and 4.53 percent for the years ended December 31, 2012, and 2011, respectively. The assumed health care cost trend rates in 2012 were 8.5 percent grading to five percent over seven years for medical and five percent per year for dental. The assumed health care cost trend rates in 2011 were eight percent grading to five percent over eight years for medical and five percent per year for dental. The effect on disclosure information of a one percentage point change in the assumed health care cost trend rate for each future year is shown below.

|   | 1% Decrease<br>in Rates | Assumed<br>Rates | 1% Increase<br>in Rates |
|---|-------------------------|------------------|-------------------------|
| Aggregated Service and Interest Cost          | \$ 176,744              | \$231,461        | \$ 307,133              |
| Accumulated Postretirement Benefit Obligation | \$ 1,543,119            | \$1,955,116      | \$ 2,514,991            |

The net periodic postretirement benefit cost for the year is determined as the sum of service cost for the year, interest on the accumulated postretirement benefit obligation and amortization of the transition obligation (asset) less previously accrued expenses over the average remaining service period of employees expected to receive plan benefits. The following is the net periodic postretirement benefit cost for the years ended December 31, 2012, 2011, and 2010:

|  | 2012      | 2011      | 2010      |
|--|-----------|-----------|-----------|
| Service Cost   | \$160,428 | \$101,787 | \$119,939 |
| Interest Cost on Accumulated Postretirement Benefit Obligation | 71,033    | 59,001    | 55,662    |
| Amortization of Transition Obligation                          | 0         | 0         | 0         |

|   |           |           |           |
|---|-----------|-----------|-----------|
| Amortization of Net (Gain)/Loss           | 514       | (7,995 )  | (2,863 )  |
| Net Periodic Post Retirement Benefit Cost | \$231,975 | \$152,793 | \$172,738 |

153

The Company estimates the following benefits to be paid in each of the following years:

|                   |            |
|-------------------|------------|
| 2013              | \$ 16,914  |
| 2014              | \$ 18,421  |
| 2015              | \$ 20,703  |
| 2016              | \$ 24,276  |
| 2017              | \$ 27,946  |
| 2018 through 2022 | \$ 233,181 |

For the year ended December 31, 2012, net unrecognized actuarial losses, which resulted primarily from the decrease in the discount rate, increased by \$33,629, which represents \$34,143 of actuarial losses arising during the year offset by a \$514 reclassification adjustment that increased the net periodic benefit cost for the year.

For the year ended December 31, 2011, net unrecognized actuarial losses, which resulted primarily from the decrease in the discount rate, revised mortality rates and the potential impact of the Patient Protection and Affordable Care Act, increased by \$529,179, which represents \$521,184 of actuarial losses arising during the year and a \$7,995 reclassification adjustment that decreased the net periodic benefit cost for the year.

For the year ended December 31, 2010, net unrecognized actuarial gains, which resulted from demographic changes, increased by \$82,164, which represents \$85,027 of actuarial gains arising during the year, net of a \$2,863 reclassification adjustment which decreased the net periodic benefit cost for the year.

**Executive Mandatory Retirement Benefit Plan**

On May 5, 2011, the Board of Directors of Harris & Harris Group, Inc., terminated the Amended and Restated Executive Mandatory Retirement Benefit Plan. The plan was adopted in 2003 in order to begin planning for eventual management succession for individuals who are employed by us in a bona fide executive or high policy-making position. The plan provided benefits required by age discrimination laws as a result of the Company's policy of mandatory retirement when such individuals attained the age of 65. Our former President accrued benefits under this plan prior to his retirement, and the termination of this plan has no impact on his accrued benefits. At December 31, 2012, and 2011, we had \$248,729 and \$243,635, respectively, accrued for benefits for this former employee under the plan, which is included in "Post retirement plan liabilities" on the Consolidated Statements of Assets and Liabilities.

**NOTE 10. INCOME TAXES**

We filed for the 1999 tax year to elect treatment as a RIC under Subchapter M of the Code and qualified for the same treatment for the years 2000 through 2012. However, there can be no assurance that we will qualify as a RIC for 2013 or subsequent years.

In the case of a RIC that furnishes capital to development corporations, there is an exception to the rule relating to the diversification of investments required to qualify for RIC treatment. This exception is available only to registered investment companies that the SEC determines to be principally engaged in the furnishing of capital to other corporations that are principally engaged in the development or exploitation of inventions, technological improvements, new processes, or products not previously generally available ("SEC Certification"). We have received SEC Certification since 1999, including for 2011, but it is possible that we may not receive SEC Certification in future years. We intend to apply for certification for 2012.

In addition, under certain circumstances, even if we qualified for Subchapter M treatment for a given year, we might take action in a subsequent year to ensure that we would be taxed in that subsequent year as a C Corporation, rather than as a RIC. As a RIC, we must, among other things, distribute at least 90 percent of our investment company taxable income and may either distribute or retain our realized net capital gains on investments.

For federal tax purposes, the Company's 2009 through 2012 tax years remain open for examination by the tax authorities under the normal three-year statute of limitations. Generally, for state tax purposes, the Company's 2008 through 2012 tax years remain open for examination by the tax authorities under a four-year statute of limitations.

During 2012, the Company recorded a consolidated expense of \$15,236 in federal, state and local income taxes. At December 31, 2012, we had \$0 accrued for federal, state and local taxes payable by the Company.

We pay federal, state and local taxes primarily related to sublease income generated by Ventures, which is taxed as a C Corporation. For the years ended December 31, 2012, 2011, and 2010, our income tax expense for Ventures was \$14,331, \$5,896 and \$2,660, respectively.

Tax expense included in the Consolidated Statement of Operations consists of the following:

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

|                          | 2012     | 2011    | 2010    |
|--------------------------|----------|---------|---------|
| Current                  | \$15,236 | \$6,922 | \$4,461 |
| Total income tax expense | \$15,236 | \$6,922 | \$4,461 |

The Company realized short- and long-term capital gains of \$2,421,669 and \$2,265,723 in 2012 and 2011, respectively. The Company offset these gains with capital loss carryforwards and neither owed federal income taxes on the gain nor was required to distribute any portion of this gain to shareholders.

On December 22, 2010, the Regulated Investment Company Modernization Act of 2010 (the "Act") was enacted, which changed various technical rules governing the tax treatment of RICs. The changes are generally effective for taxable years beginning after the date of enactment. One of the more prominent changes addresses capital loss carryforwards. Under the Act, the Company will be permitted to carry forward capital losses incurred in taxable years beginning after the date of enactment for an unlimited period. However, any losses incurred during those future taxable years will be required to be utilized prior to the losses incurred in pre-enactment taxable years, which carry an expiration date. As a result of this ordering rule, pre-enactment capital loss carryforwards may be more likely to expire unused. Additionally, post-enactment capital loss carryforwards will retain their character as either short-term or long-term capital losses rather than being considered all short term as permitted under previous regulation.

As of December 31, 2012, we had no post-enactment loss carryforwards under the provisions of the Act. As of December 31, 2012, we had pre-enactment loss carryforwards totaling \$20,146,763, expiring as follows: 2017 - \$10,191,777; 2018 - \$9,954,986. We had post-October losses totaling \$3,118,563.

Continued qualification as a RIC requires us to satisfy certain investment asset diversification requirements in future years. Our ability to satisfy those requirements may not be controllable by us. There can be no assurance that we will qualify as a RIC in subsequent years.

#### **NOTE 11. COMMITMENTS AND CONTINGENCIES**

On December 28, 2011, the Asahi Kasei Group completed its acquisition of Crystal IS, Inc. As of December 31, 2012, approximately \$273,000 in proceeds from the transaction is held in escrow to cover potential indemnity claims and the expenses of the stockholder agent. If claims are made related to certain intellectual property and patents included in the transaction that exceed the escrow amounts withheld, additional claims could be made seeking funds from the former stockholders, including the Company. This special indemnity provision is capped, in aggregate, across all former stockholders at \$10,250,000 through March 28, 2013, and is capped at \$5 million through December 28, 2013, when the claim period expires. Our pro rata exposure to potential claims would be up to \$487,000 through March 31, 2013, and up to \$238,000 through December 31, 2013. As of December 31, 2012, no such claims had been made.

On January 21, 2010, we moved our corporate headquarters from 111 West 57<sup>th</sup> Street in New York City to 1450 Broadway in New York City. The lease and sublease for our offices at 111 West 57<sup>th</sup> Street expired on April 17, 2010 and on April 29, 2010, respectively. Total rent expense for the office space at 111 West 57<sup>th</sup> Street was \$57,951 in 2010. Our rent expense in 2010 of \$57,951 included \$47,094 of real estate tax escalation charges from 2003 to 2010 paid on the office space at 111 West 57<sup>th</sup> Street.

On September 24, 2009, we signed a ten-year lease for approximately 6,900 square feet of office space located at 1450 Broadway, New York, New York. The lease commenced on January 21, 2010, with these offices replacing our corporate headquarters previously located at 111 West 57<sup>th</sup> Street in New York City. The base rent is \$36 per square foot with a 2.5 percent increase per year over the 10 years of the lease, subject to a full abatement of rent for four months and a rent credit for six months throughout the lease term. The lease expires on December 31, 2019.

We have one option to extend the lease term for a five-year period, provided that we are not in default under the lease. Annual rent during the renewal period will equal 95 percent of the fair market value of the leased premises, as determined in accordance with the lease. Upon an event of default, the lease provides that the landlord may terminate the lease and require us to pay all rent that would have been payable during the remainder of the lease or until the date the landlord re-enters the premises.

On July 1, 2008, we signed a five-year lease for office space at 420 Florence Street, Suite 200, Palo Alto, California, commencing on August 1, 2008, and expiring on August 31, 2013. On April 26, 2011, we signed a one-year lease for office space at 530 Lytton Avenue, 2<sup>nd</sup> Floor, Palo Alto, California, commencing on July 1, 2011, and expiring on June 30, 2012. The lease was renewed commencing on July 1, 2012, and expiring on June 30, 2013. On March 22, 2012, we signed a one-year lease for office space at 140 Preston Executive Drive, Space "L," Cary, North Carolina, commencing on April 1, 2012, and expiring on March 31, 2013. The lease was renewed commencing on April 1, 2013, and expiring on March 31, 2014. Total rent expense for all of our office space was \$408,659 in 2012, \$376,487 in 2011 and \$402,232 in 2010. Aggregate future minimum lease payments in each of the following years are: 2013 - \$358,814, 2014 - \$252,601, 2015 - \$280,673, 2016 - 287,690, 2017 - \$294,882 and thereafter for the remaining term - an aggregate of \$612,065.

In the ordinary course of business, we indemnify our officers and directors, subject to certain regulatory limitations, for loss or liability related to their service on behalf of the Company, including serving on the Boards of Directors or as officers of portfolio companies. At December 31, 2012, and 2011, we believe our estimated exposure is minimal, and accordingly we have no liability recorded.

#### **NOTE 12. CHANGE IN NET ASSETS PER SHARE**

The following table sets forth the computation of basic and diluted per share net increases (decreases) in net assets resulting from operations for the twelve months ended December 31, 2012, 2011, and 2010.

|   | 2012           | 2011           | 2010         |
|---|----------------|----------------|--------------|
| Numerator for (decrease) increase in net assets per share                         | \$(19,986,900) | \$(3,541,363 ) | \$10,586,850 |
| Denominator for basic weighted average shares                                     | 31,000,919     | 30,980,221     | 30,866,239   |
| Basic net (decrease) increase in net assets per share resulting from operations   | \$(0.65 )      | \$(0.12 )      | \$0.34       |
| Denominator for diluted weighted average shares                                   | 31,000,919     | 30,980,221     | 30,896,630   |
| Diluted net (decrease) increase in net assets per share resulting from operations | \$(0.65 )      | \$(0.12 )      | \$0.34       |

For the twelve months ended December 31, 2010, the calculation of net increase in net assets resulting from operations per diluted share includes 30,391 stock options from the March 2009 grant because such options were dilutive. All other options granted in the period from June 2006 through May 2010 were anti-dilutive. All stock options and restricted stock awards may be dilutive in future periods in which there is a net increase in net assets resulting from operations in the event that there are significant increases in the average stock price in the stock market or significant decreases in the amount of unrecognized compensation cost.

### **NOTE 13. SUBSEQUENT EVENTS**

In January 2013, we closed our written call option position in NeoPhotonics Corporation, expiring on February 16, 2013, for a payment of \$4,747. In January 2013, we also sold 508 written call option contracts on NeoPhotonics expiring in February 2013, with a strike price of \$5.00. We received premiums of approximately \$28,893 for these contracts. In January 2013 and February 2013, we sold 50,807 shares of NeoPhotonics for net proceeds of approximately \$252,042. We no longer hold any shares of NeoPhotonics.

In January and February 2013, we sold 1,513 written call option contracts on Solazyme, Inc., expiring in February 2013, with a strike price of \$7.50. We received premiums of approximately \$55,467 for these contracts. We also purchased put options on Solazyme expiring in February 2013 with a strike price of \$7.50. We paid premiums of approximately \$53,840.

In January 2013, we sold 1,000 written call option contracts on Solazyme, Inc., expiring in March 2013, with a strike price of \$7.50. We received premiums of approximately \$89,088 for these contracts.



In February and March 2013, we were assigned on a total of 204,500 shares of Solazyme, Inc., relating to the February and March 2013 written call option contracts. We received net proceeds of approximately \$1,527,157 related to these sales.

In January and February 2013, we sold 1,900 written call option contracts on Solazyme, Inc., expiring in June 2013, with a strike price of \$10.00. We received premiums of approximately \$68,798 for these contracts.

On January 17, 2013, the Company made a \$672,000 follow-on investment in a privately held portfolio company.

On January 23, 2013, the Company made a \$350,000 follow-on investment in Ancora Pharmaceuticals Inc., a privately held portfolio company.

On January 24, 2013, we received \$949,468 upon the release of funds held in escrow from the acquisition of Innovalight, Inc., by DuPont in 2011.

On January 28, 2013, the Company made a \$200,000 follow-on investment in Champions Oncology, Inc., a publicly traded portfolio company.

On March 7, 2013, the Board of Directors of Harris & Harris Group, Inc., amended the Medical Benefit Retirement Plan. The amendment limits the medical benefit to \$10,000 per year for a period of ten years. The amendment does not affect benefits accrued by former employees or one current employee who is grandfathered under the former terms of the plan.

On March 11, 2013, the Company made a \$28,920 follow-on investment in a privately held portfolio company.

On March 12, 2013, the Company made a \$350,000 follow-on investment in Nano Terra, Inc., a privately held portfolio company.

**NOTE 14. SELECTED QUARTERLY DATA (UNAUDITED)**

2012

**1<sup>st</sup> Quarter**

**3<sup>rd</sup> Quarter 4<sup>th</sup> Quarter**

|   | <b>2<sup>nd</sup><br/>Quarter</b> |               |               |                |
|---|-----------------------------------|---------------|---------------|----------------|
| Total investment income (loss)  | \$160,890                         | \$(28,446 )   | \$396,246     | \$193,537      |
| Net operating loss  | \$(2,089,381)                     | \$(3,275,280) | \$(1,450,334) | \$(1,988,348 ) |
| Net increase (decrease) in net assets resulting from operations                               | \$5,580,183                       | \$(1,905,919) | \$(3,669,717) | \$(19,991,447) |
| Net increase (decrease) in net assets resulting from operations per average outstanding share | \$0.18                            | \$(0.06 )     | \$(0.12 )     | \$(0.65 )      |

2011

**1<sup>st</sup> Quarter    2<sup>nd</sup> Quarter    3<sup>rd</sup> Quarter    4<sup>th</sup> Quarter**

|   |               |                |                |               |
|---|---------------|----------------|----------------|---------------|
| Total investment income   | \$ 136,824    | \$ 187,826     | \$ 202,527     | \$ 175,588    |
| Net operating loss  | \$(1,835,303) | \$(1,806,393 ) | \$(2,118,158 ) | \$(2,578,511) |
| Net increase (decrease) in net assets resulting from operations                               | \$(1,126,159) | \$21,222,221   | \$(33,084,607) | \$9,447,182   |
| Net increase (decrease) in net assets resulting from operations per average outstanding share | \$(0.04    )  | \$0.68         | \$(1.07    )   | \$0.31        |

160

**HARRIS & HARRIS GROUP, INC.****FINANCIAL HIGHLIGHTS**

|   | Year Ended<br>December 31, 2012 | Year Ended<br>December 31, 2011 | Year Ended<br>December 31, 2010 |
|---|---------------------------------|---------------------------------|---------------------------------|
| <b>Per Share Operating Performance</b>  |                                 |                                 |                                 |
| Net asset value per share, beginning of year  | \$ 4.70                         | \$ 4.76                         | \$ 4.35                         |
| Net operating loss*   | (0.28)                          | (0.27)                          | (0.25)                          |
| Net realized gain (loss) on investments*  | 0.08                            | 0.08                            | (0.12)                          |
| Net (decrease) increase in unrealized appreciation as a result of sales*  | (0.05)                          | 0.00                            | 0.12                            |
| Net (decrease) increase in unrealized appreciation on investments held and written call options* <sup>(1)</sup> | (0.39)                          | 0.07                            | 0.59                            |
| Total from investment operations*   | (0.64)                          | (0.12)                          | 0.34                            |
| Net increase as a result of stock-based compensation expense*   | 0.09                            | 0.06                            | 0.07                            |
| Net decrease as a result of vested restricted stock awards  | (0.02)                          | 0.00                            | 0.00                            |
| Total increase from capital stock transactions  | 0.07                            | 0.06                            | 0.07                            |
| Net asset value per share, end of year  | \$ 4.13                         | \$ 4.70                         | \$ 4.76                         |
| Stock price per share, end of year  | \$ 3.30                         | \$ 3.46                         | \$ 4.38                         |
| Total return based on stock price   | (4.62)                          | (21.0)                          | (4.16)                          |
| <b>Supplemental Data:</b>   |                                 |                                 |                                 |
| Net assets, end of year   | \$ 128,436,774                  | \$ 145,698,407                  | \$ 146,853,912                  |
| Ratio of expenses to average net assets   | 6.6                             | 6.1                             | 5.7                             |
| Ratio of net operating loss to average net assets   | (6.1)                           | (5.6)                           | (5.4)                           |
| Average debt outstanding  | \$ 1,679,781                    | \$ 1,254,247                    | \$ 0.00                         |
| Average debt per share  | \$ 0.05                         | \$ 0.04                         | \$ 0.00                         |
| Cash dividends paid per share   | \$ 0.00                         | \$ 0.00                         | \$ 0.00                         |

|  |            |            |            |
|--|------------|------------|------------|
| Taxes payable on behalf of shareholders on the deemed dividend per share | \$ 0.00    | \$ 0.00    | \$ 0.00    |
| Number of shares outstanding, end of year                                | 31,116,881 | 31,000,601 | 30,878,164 |

\*Based on average shares outstanding.

<sup>(1)</sup> Net unrealized gains (losses) includes rounding adjustments to reconcile change in net asset value per share. See Item 7. "Management's Discussion and Analysis of Financial Condition and Results of Operations" for a description of unrealized losses on investments.

The accompanying notes are an integral part of this schedule.

**Item 9. Changes in and Disagreements With Accountants on Accounting and Financial Disclosure.**

None.

**Item 9A. Controls and Procedures.**

Disclosure Controls and Procedures

As of the end of the period covered by this report, the Company's management, under the supervision and with the participation of our chief executive officer and chief financial officer, conducted an evaluation of the effectiveness of the design and operation of our disclosure controls and procedures (as required by Rules 13a-15 of the Exchange Act). Disclosure controls and procedures means controls and other procedures of an issuer that are designed to ensure that information required to be disclosed by the issuer in the reports that it files or submits under the Exchange Act is recorded, processed, summarized and reported, within time periods specified in the SEC's rules and forms, and that such information is accumulated and communicated to the issuer's management, as appropriate, to allow timely decisions regarding required disclosures. As of December 31, 2012, based upon this evaluation of our disclosure controls and procedures, our chief executive officer and chief financial officer concluded that our disclosure controls and procedures were effective.

Internal Control Over Financial Reporting

Management's Report on Internal Control Over Financial Reporting and the Report of Independent Registered Public Accounting Firm, on the Company's internal control over financial reporting, is included in Item 8 of this Annual Report on Form 10-K.

Changes in Internal Control Over Financial Reporting

There have not been any changes in the Company's internal control over financial reporting (as such term is defined in Rules 13a-15(f) and 15d-15(f) under the Exchange Act) during the fourth quarter of 2012 to which this report relates that have materially affected, or are reasonably likely to materially affect, the Company's internal control over financial reporting.

**Item 9B. Other Information.**

None.

162



## **PART III**

### **Item 10. Directors, Executive Officers and Corporate Governance.**

The information set forth under the captions "Nominees," "Executive Officers," "Section 16(a) Beneficial Ownership Reporting Compliance" and "Audit Committee" in our Proxy Statement for the Annual Meeting of Shareholders to be held May 2, 2013, to be filed pursuant to Regulation 14A under the Exchange Act (the "2013 Proxy Statement"), is herein incorporated by reference.

We have adopted a Code of Conduct for Directors and Employees, which also applies to our Chief Executive Officer, Chief Financial Officer, Treasurer and Senior Controller, which is posted on our website at <http://ir.hhvc.com/governance.cfm>.

The Board of Directors has determined that W. Dillaway Ayres, Jr., Lucio L. Lanza, Richard P. Shanley and Bruce W. Shewmaker are all "Audit Committee Financial Experts" serving on our Audit Committee. Messrs. Ayres, Lanza, Shanley and Shewmaker are not "interested persons" as defined under Section 2(a)(19) of the 1940 Act and are independent under the rules of the Nasdaq Stock Market.

### **Item 11. Executive Compensation.**

The information set forth under the captions "Executive Compensation," "Compensation Committee Interlocks and Insider Participation" and "Compensation Committee Report on Executive Compensation" in the 2013 Proxy Statement is herein incorporated by reference.

### **Item 12. Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters.**

The information set forth under the caption "How Many Shares Do the Company's Principal Shareholders, Directors and Executive Officers Own?" in the 2013 Proxy Statement is herein incorporated by reference. The "Equity Compensation Plan Information" chart is set forth herein under Item 5.

**Item 13. Certain Relationships and Related Transactions, and Director Independence.**

The information set forth under the captions "Nominees" and "Related Party Transactions" in the 2013 Proxy Statement is herein incorporated by reference.

**Item 14. Principal Accountant Fees and Services.**

The information set forth under the captions "Audit Committee's Pre-Approval Policies" and "Fees Paid to PwC for 2012 and 2011" in the 2013 Proxy Statement is herein incorporated by reference.

PART IV

**Item 15. Exhibits and Financial Statements Schedules.**

(a) The following documents are filed as a part of this report:

(1) Listed below are the financial statements which are filed as part of this report:

- Consolidated Statements of Assets and Liabilities as of December 31, 2012, and 2011;
- Consolidated Statement of Operations for the years ended December 31, 2012, 2011, and 2010;
- Consolidated Statements of Cash Flows for the years ended December 31, 2012, 2011, and 2010;
- Consolidated Statements of Changes in Net Assets for the years ended December 31, 2012, 2011, and 2010;
- Consolidated Schedule of Investments as of December 31, 2012;
- Consolidated Schedule of Investments as of December 31, 2011;
- Footnote to Consolidated Schedule of Investments;
- Notes to Consolidated Financial Statements; and
- Financial Highlights for the years ended December 31, 2012, 2011, and 2010.

(2) No financial statement schedules are required to be filed herewith because (i) such schedules are not required or (ii) the information has been presented in the above financial statements.

(3)

Edgar Filing: HARRIS & HARRIS GROUP INC /NY/ - Form 10-K

The following exhibits are filed with this report or are incorporated herein by reference to a prior filing, in accordance with Rule 12b-32 under the Exchange Act.

Restated Certificate of Incorporation of Harris & Harris Group, Inc., dated September 23, 2005, incorporated by 3.1(a) reference as Exhibit 3.1(a) to the Company's Annual Report on Form 10-K for the year ended December 31, 2010 (File No. 814-00176) filed on March 15, 2011.

Certificate of Amendment of the Certificate of Incorporation of Harris & Harris Group, Inc., dated May 19, 3.1(b) 2006, incorporated by reference to Exhibit 3.1(b) to the Company's Annual Report on Form 10-K for the year ended December 31, 2011 (File No. 814-00176) filed on March 14, 2012.

3.1(c) Certificate of Change of the Certificate of Incorporation of Harris & Harris Group, Inc., dated August 5, 2010, incorporated by reference as Exhibit 3 to Form 8-K (File No. 814-00176) filed on August 6, 2010.

3.2 Amended and Restated By-laws, incorporated by reference as Exhibit 3.1 to the Company's Form 8-K (File No. 814-00176) filed on August 3, 2012.

4 Form of Specimen Certificate of Common Stock, incorporated by reference as Exhibit 4 to the Company's Annual Report on Form 10-K for the year ended December 31, 2008 (File No. 814-00176) filed on March 16, 2009.

10.1 Custody Agreement by and between Harris & Harris Group, Inc. and Union Bank, dated March 11, 2011, incorporated by reference as Exhibit 10.1 to the Company's Form 8-K (File No. 814-00176) filed on March 14, 2011.

10.2 Custody Agreement by and between Harris & Harris Group, Inc. and TD Bank, N.A., dated February 24, 2011, incorporated by reference as Exhibit 10.2 to the Company's Form 8-K (File No. 814-00176) filed on February 24, 2011.

10.3 Revolving Loan Agreement by and between Harris & Harris Group, Inc. and TD Bank, N.A., dated February 24, 2011, incorporated by reference as Exhibit 10.1 to the Company's Form 8-K (File No. 814-00176) filed on February 24, 2011.

10.4 Amendment No. 1 to the Revolving Loan Agreement by and between Harris & Harris Group, Inc. and TD Bank, N.A., dated June 21, 2011, incorporated by reference as Exhibit 10.1 to the Company's Form 8-K (File No. 814-00176) filed on June 21, 2011.

10.5 Form of Indemnification Agreement which has been established with all directors and executive officers of the Company, incorporated by reference as Exhibit 10.2 to the Company's Annual Report on Form 10-K for the year ended December 31, 2008 (File No. 814-00176) filed on March 16, 2009.

10.6 Amended and Restated Harris & Harris Group, Inc. 2012 Equity Incentive Plan, incorporated by reference as Exhibit 10.6 to the Company's Annual Report on Form 10-K for the year ended December 31, 2011 (File No. 814-00176) filed on March 14, 2012.

10.7 Form of Non-Qualified Stock Option Agreement, incorporated by reference as Exhibit 10.11 to the Company's Annual Report on Form 10-K for the year ended December 31, 2008 (File No. 814-00176) filed on March 16, 2009.

10.8 Form of Director Restricted Stock Agreement, incorporated by reference as Exhibit 10.1 to the Company's Quarterly Report on Form 10-Q for the quarter ended March 31, 2012 (File No. 814-00176) filed on May 10, 2012.

Form of Employee Restricted Stock Agreement, incorporated by reference as Exhibit 10.2 to the Company's 10.9 Quarterly Report on Form 10-Q for the quarter ended March 31, 2012 (File No. 814-00176) filed on May 10, 2012.

Lease Agreement, dated September 24, 2009, between Rosh 1450 Properties LLC and Harris & Harris Group, Inc., incorporated by reference as Exhibit 10.1 to the Company's Form 8-K (File No. 814-00176) filed on September 24, 2009.

Lease dated July 1, 2008 by and between Jack Rominger, Tommie Plemons and Dale Denson as Lessor and Harris & Harris Group, Inc., a New York corporation, as Lessee, incorporated by reference as Exhibit 10.1 to the Company's Form 10-Q (File No. 814-00176) filed on November 7, 2008.

Sublease dated February 2, 2012, by and between H&H Ventures Management, Inc. and Capriza, Inc., incorporated by reference to Exhibit 10.10 to the Company's Annual Report on Form 10-K for the year ended December 31, 2011 (File No. 814-00176) filed on March 14, 2012.

Harris & Harris Group, Inc. Employee Stock Purchase Plan, incorporated by reference to Exhibit 10.11 to the Company's Annual Report on Form 10-K for the year ended December 31, 2011 (File No. 814-00176) filed on March 14, 2012.

Code of Conduct for Directors and Employees of Harris & Harris Group, Inc., incorporated by reference as Exhibit 14.1 to the Company's Form 10-K for the year ended December 31, 2009 (File No. 814-00176) filed on March 15, 2010.

21\* Subsidiaries of Registrant and Jurisdiction of Incorporation/Organization.

31.01\* Certification of CEO pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.

31.02\* Certification of CFO pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.

32.01\* Certification of CEO and CFO pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.

\*Filed herewith



## SIGNATURES

Pursuant to the requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934, the Company has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized.

HARRIS & HARRIS GROUP,  
INC.

Date: March 15, 2013 By: /s/ Douglas W. Jamison  
Douglas W. Jamison  
Chairman of the Board and  
Chief Executive Officer

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

| <u>Signatures</u>                                    | <u>Title</u>   | <u>Date</u>    |
|--|--|----------------|
| /s/ Douglas W. Jamison<br>Douglas W. Jamison         | Chairman of the Board<br>and Chief Executive Officer | March 15, 2013 |
| /s/ Patricia N. Egan<br>Patricia N. Egan             | Chief Financial Officer                              | March 15, 2013 |
| /s/ W. Dillaway Ayres, Jr.<br>W. Dillaway Ayres, Jr. | Director   | March 15, 2013 |
| /s/ Phillip A. Bauman<br>Phillip A. Bauman           | Director   | March 15, 2013 |



## EXHIBIT INDEX

The following exhibits are filed with this report in accordance with Rule 12b-32 under the Securities Exchange Act of 1934.

| <b>Exhibit No.</b> | <b>Description</b>   |
|--------------------|--|
| 21                 | Subsidiaries of Registrant and Jurisdiction of Incorporation/Organization.   |
| 31.01              | Certification of CEO pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.  |
| 31.02              | Certification of CFO pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.  |
| 32.01              | Certification of CEO and CFO pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002. |

170