APOGEE TECHNOLOGY INC
Form 10KSB
April 19, 2005

UNITED STATES
SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

FORM 10-KSB

(Mark One)

x ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934

For the fiscal year ended December 31, 2004

OR

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

For the transition period from to

Commission file number: 000-30656

APOGEE TECHNOLOGY, INC.

(Exact name of small business issuer as specified in its charter)

DELAWARE	**04-3005815**
(State or other jurisdiction of incorporation or organization)	(I.R.S. Employer Identification No.)
129 MORGAN DRIVE NORWOOD, MASSACHUSETTS	**02062**
(Address of principal executive offices)	(Zip Code)

Registrant s telephone number, including area code: **(781) 551-9450**

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

Title of each class	**Name of each exchange on which registered**
Common Stock, $.01 Par Value Per Share	American Stock Exchange

Securities registered pursuant to Section 12(g) of the Exchange Act: **None**

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

to such filing requirements for the past 90 days. Yes x No o

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-KSB or any amendment to this Form 10-KSB o

Indicate by check mark whether the registrant is an accelerated filer (as defined in Exchange Act Rule 12b-2). Yes o No x

For the year ended December 31, 2004, the unaudited revenues of the Registrant were $6,947,936.

The aggregate market value of the registrant s voting and non-voting common stock held by non-affiliates of the registrant on April 15, 2005, based on the closing price of the Common Stock on The American Stock Exchange of $1.30 per share on such date was $9,156,849.

As of April 15, 2005, the registrant had 11,838,332 shares of common stock outstanding.

DOCUMENTS INCORPORATED BY REFERENCE

The following documents (or parts thereof) are incorporated by reference into the following parts of this Form 10-KSB: Certain information required in Part III of this Annual Report on Form 10-KSB is incorporated from the Registrant s Proxy Statement for the Annual Meeting of Stockholders.

NOTE

DUE TO THE COMPANY S INABILITY TO COMPLETE THE AUDIT PROCESS FOR ITS FINANCIAL STATEMENTS FOR THE FISCAL YEAR ENDED DECEMBER 31, 2004, AUDITED FINANCIAL STATEMENTS, MANAGEMENT S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS AND OTHER FINANCIAL INFORMATION ARE NOT INCLUDED IN THIS DOCUMENT.

THE COMPANY IS UNABLE TO FILE ITS AUDITED FINANCIAL STATEMENTS FOR THE YEAR ENDED DECEMBER 31, 2004 AS A RESULT OF (I) THE RESIGNATION OF THE COMPANY S INDEPENDENT REGISTERED PUBLIC ACCOUNTANTS ON APRIL 12, 2005, AND (II) THE COMPANY S REVIEW OF REVENUE RECOGNITION FOR ITS CUSTOMERS DURING 2003 AND 2004.

UNAUDITED FINANCIAL INFORMATION FOR THE FISCAL YEAR ENDED DECEMBER 31, 2004, WHICH IS SUBJECT TO CHANGE UPON COMPLETION OF THE AUDIT, HAS BEEN INCLUDED IN A CURRENT REPORT ON FORM 8-K FILED ON THIS DATE. THE COMPANY EXPECTS TO BE ABLE TO COMPLETE THE RE-AUDIT PROCSS FOR ITS 2003 FINANCIAL STATEMENTS AND TO COMPLETE THE AUDIT PROCESS FOR ITS 2004 FINANCIAL STATEMENTS BY JUNE 30, 2005.

PART I

THIS ANNUAL REPORT ON FORM 10-KSB CONTAINS FORWARD-LOOKING STATEMENTS AS DEFINED IN THE PRIVATE SECURITIES LITIGATION REFORM ACT OF 1995. FOR THIS PURPOSE, ANY STATEMENTS CONTAINED HEREIN THAT ARE NOT STATEMENTS OF HISTORICAL FACT MAY BE DEEMED TO BE FORWARD-LOOKING STATEMENTS. WITHOUT LIMITING THE FOREGOING, THE WORDS BELIEVES , ANTICIPATES , PLANS , EXPECTS , AND SIMILAR EXPRESSIONS ARE INTENDED TO IDENTIFY FORWARD-LOOKING STATEMENTS. THE IMPORTANT FACTORS DISCUSSED IN ITEM 1, DESCRIPTION OF BUSINESS , AND ITEM 7, MANAGEMENT S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS , AMONG OTHERS, COULD CAUSE ACTUAL FUTURE RESULTS TO DIFFER MATERIALLY FROM THOSE INDICATED BY FORWARD-LOOKING STATEMENTS MADE HEREIN AND PRESENTED ELSEWHERE BY MANAGEMENT FROM TIME TO TIME.

Item 1. BUSINESS

Apogee Technology, Inc. (Apogee or the Company) designs, develops and markets silicon based products that incorporate proprietary technologies. The Company s patented all-digital, high efficiency Direct Digital Amplification (DDX®) integrated circuits (ICs) have been used by over 20 major consumer electronic brands in a wide range of audio products. The company is developing new System-on-Chip (SOC) products using its analog and digital circuit designs and Micro-Electromechanical Systems (MEMS) technology for the consumer, automotive, communications and medical markets. The Company operates a worldwide marketing and sales organization and has offices in the US, China, Hong Kong, Taiwan and Japan.

In May 2004, the Company acquired the portfolio of MEMS intellectual property, trade secrets and know-how developed by Standard MEMS, Inc. Concurrently the Company hired a key staff from the former Standard MEMS, Inc. and established a MEMS Division located in Great River, New York. MEMS are devices produced using high volume IC manufacturing techniques that include both microscopic mechanical systems and electrical circuits. The Company intends to design, develop and market MEMS ICs to the medical, automotive, communications and consumer markets. At the appropriate time, the Company will segment the financial reporting of the MEMS division.

Apogee was organized as a Delaware corporation on July 1, 1987, and initially operated through its wholly owned subsidiary, Apogee Acoustics, Incorporated (Acoustics). Apogee discontinued its loudspeaker business under Acoustics in 1994 and, since that time has focused on the research, development and commercialization of DDX amplifier technology and, since May 2004, MEMS devices.

Apogee maintains an Internet site at *http://www.apogeeddx.com*. The information contained on the Company s Internet site is not incorporated by reference in this report, and it should not be considered part of this report. The Company s Annual Reports on Form 10-KSB, Quarterly Reports on Form 10-QSB, Current Reports on Form 8-K, and any amendments to those reports, are available free of charge on our website as soon as reasonably practicable after they are filed with, or furnished to, the Securities and Exchange Commission.

Unless the context otherwise requires, the terms we , our , Company , and Apogee as used herein refer to Apogee Technology, Inc. and its subsidiary.

Audio Division

The Company believes the DDX technology s all-digital design and high efficiency operation has significant commercial benefits for consumer electronic manufacturers, as well as end users, compared to traditional audio amplifier technology. The benefits include reducing final product size and cost, providing

true digital audio reproduction, increasing audio functionality through digital integration and extending playback time in battery applications. DDX-based IC products are intended for a range of audio applications, including home theater systems, flat-panel TVs, powered speakers, car audio, commercial audio, and PC multi-media. The Company markets DDX products using a worldwide network of direct sales staff, independent sales representatives and distributors.

Under a licensing agreement with STMicroelectronics, NV, one of the world s largest semiconductor companies, the Company is providing intellectual property to be used in royalty-bearing DDX-based IC products produced by STMicroelectronics. In addition, the Company and STMicroelectronics have entered into a development agreement whereby the companies are developing and marketing new semiconductor products that leverage Apogee s DDX technology and STMicroelectronics intellectual property and semiconductor design, development and manufacturing capability. The Company, in 2004, also licensed its DDX-Controller technology to Zoran Corporation, Infra-Com Ltd., and a video IC company in order to expand market opportunities for its DDX products.

The Company began the design, development and marketing of audio amplifier ICs in 1996 based upon its DDX technology. The DDX amplifier solution is implemented by the combination of a DDX Controller and a DDX Power Device IC. The Company released its first Controller IC, the DDX-2000 , in 1999 and since that time has released six additional Controller ICs. These devices integrate from two to eight channels of DDX amplifier processing along with a range of digital audio processing functions. By combining DDX processing with audio functions, such as bass/treble, the Company can provide a low cost, full system amplifier solution to consumer electronic manufacturers. Since inception, the Company has developed and released 13 DDX power devices that can provide up to 240 watts of audio power. These integrated switched mode power devices operate at two to three times the efficiency of traditional audio amplifier ICs, thereby reducing amplifier size and cost. In 2004, the Company introduced a new family of all-in-one DDXi (i for integrated) amplification solutions that combine a DDX Controller and DDX Power Device into a single device. DDXi IC solutions significantly reduce system cost, size and complexity by eliminating the need for a separate audio processor, digital to analog converter and amplifier chips. The Company expects to release one new DDX controller device, four new DDX power solutions and three new DDXi Integrated All-in-One solutions in 2005. The new ICs will extend the market opportunity for DDX technology while also providing better value for current and new applications. These ICs are being developed to target specific high growth applications in the consumer electronics market including flat-panel TVs, multimedia powered speakers and home theater systems.

In August 2004 the Company announced an agreement with Infra-Com Ltd. to jointly develop and market ICs that will enable manufacturers to provide pure digital wireless connectivity and amplification to speakers. The Israel-U.S. Bi-national Industrial Research and Development (BIRD) Foundation awarded this joint program $560,000 for research and development because of its technological and marketing innovation. The Company and Infra-Com have been working collaboratively in marketing and selling current chipset solutions and to design and develop an integrated IrGate/DDX solution.

The Company markets its products using a worldwide network of direct sales staff, independent sales representatives and distributors. The Company s sales headquarters are located in Norwood, Massachusetts with additional locations in China, Hong Kong, Japan and Taiwan. In addition, the Company s office located in Great River, New York will focus on marketing and selling MEMS related products. The Company also utilizes sales representatives in Korea and Brazil as well as independent distributors in Hong Kong, China, Japan, Taiwan, and Singapore.

The Company s audio ICs have been incorporated into a range of consumer electronic products. The majority of these products are DVD receivers, which are part of an all-in-one home theater system that combines a DVD player, AM/FM tuner, three to eight channels of amplification, and speakers. DDX amplifiers are also being used in combination DVD/VCR receivers, A/V receivers, powered speaker

systems, high-end TVs, professional audio/video equipment, commercial audio systems, communication equipment, gaming systems and automotive systems. Over 30 million DDX IC s have been sold to date and have been used in over 50 different consumer products since their release by Apogee and its partner STMicroelectronics approximately 3.5 years ago. Some of the consumer electronic brands using DDX technology include: Boston Acoustic, Daewoo, Fujitsu, Harman Kardon, Hitachi, JBL, JVC, Kenwood, LG, Magnavox, Marantz, Mustek, Philips, RCA, Samsung, Sharp, TEAC, Thomson Multimedia, Toshiba, Vestel, Xbox and Zenith.

Industry Trends and the DDX Advantage

Digital technology is rapidly transforming the way consumers obtain, record, view and listen to content. Traditional analog formats of TV, radio, VCR and cassettes are being replaced with digital standards like DVDs, CDs, Digital Cable, MP3/Internet audio and digital radio, which provide better audio/video quality. The Company believes that over the next several years most audio/video material will be distributed using digital technology. Along with this transition, the consumer is demanding smaller, more integrated systems, such as the DVD receiver that includes a DVD/CD player, radio tuner, multi-channel amplification and speakers.

The Company believes that it is well positioned to take advantage of these market trends because the DDX technology provides digital quality audio reproduction, reduces system cost, and is compact compared to traditional audio amplifier solutions. These benefits are derived from the system s all-digital design and its high operational efficiency.

Existing audio products use analog audio amplifier ICs to amplify analog signals. This technology is suitable for products such as record players and cassette tapes that produce analog signals. However, with the advent of digital audio playback, an additional IC, digital to analog converter (DAC), is required to convert the digital signal to an analog signal suitable for amplification. DDX s all-digital design eliminates the cost of the DAC and the potential quality losses in the conversion and transmission of the analog signals. Thus, with DDX, consumers can enjoy true digital audio reproduction in a low-cost product. In addition, because DDX is a digital implementation, other audio functions such as bass/treble and volume can be integrated easily into DDX-based ICs, thereby lowering overall system cost.

An additional problem with analog amplifier solutions is their low operational efficiency. The goal of an analog amplifier is to produce power to drive a speaker, but because of its poor efficiency it also produces waste heat, which has to be dissipated using a large piece of metal, or heat sink. Because of the size of the heat sink, analog amplifiers are virtually eliminated from use in compact integrated products such as a DVD receiver.

Analog amplifiers poor efficiency also increases the size and cost of the amplifier power supply. As an example, analog amplifiers have a peak efficiency of approximately 60% compared to DDX, which has a peak efficiency of 90%. A typical DVD receiver, which outputs approximately 300 watts of audio power, would require a 500 watt power supply with an analog amplifier solution. A DDX-based design would only require a 330 watt power supply to output 300 watts of audio power, which we believe would create a significant savings for a consumer product.

The Company believes that DDX s digital design and high efficiency will benefit both existing and emerging audio applications. These products include: DVD receivers, digital TVs, cable system components, and fully integrated digital-powered speaker systems. Newer technologies, such as MP3 players, digital playback devices and Internet appliances, can be made fully digital with DDX amplifier solutions.

With the emergence of home networking, DDX can be integrated with the network interface to provide consumers with pure digital sound throughout their homes at a low cost. DDX allows audio

systems to be installed in wall or ceiling spaces without the typical thermal problems associated with analog amplifier installations. In addition, because of DDX s higher efficiency, more amplifiers can be powered and a higher audio output can be produced in network applications operating from a remote power source.

DDX amplifier solutions can also meet the requirements of many traditional audio applications. In the home audio and PC multimedia markets, the Company expects that original equipment manufacturers will recognize efficiencies gained through the incorporation of smaller configuration DDX amplifiers in powered speakers. DDX s smaller and more efficient design will enable car audio designs to deliver more power in a smaller space. Portable audio, hand-held systems and mobile communication devices will also benefit from longer battery life resulting from DDX s greater efficiency.

Audio Products

The Company is commercializing its audio technology by developing and providing intellectual property products to its licensees, STMicroelectronics, Zoran Corporation and others, as well as marketing and selling custom semiconductor products to electronics manufacturers. The Company also supplies customers with circuit boards to support the marketing and sales of its semiconductor products.

a) Intellectual Property Products

The Company has developed and delivered DDX controller core and DDX power technology intellectual property products to support its licensing activities with STMicroelectronics and other customers. DDX Controller core products offered by the Company include; one, two, three, four and eight channel designs some of which include audio processing functionality, interface logic and other functions. The Company intends to develop new intellectual property products to expand its licensing activities. This activity is expected to allow the Company to increase licensing revenue while expanding the applications for its DDX power devices. In addition, by integrating the DDX Controller core with other complimentary technologies the Company hopes to enable new low cost solutions that cannot be supported effectively by stand-alone DDX chip set solutions.

b) Semiconductor Products

The Company s DDX amplifier solution utilizes two different types of ICs. The first is a digital IC that implements DDX and other digital audio processing and is referred to as a Controller . DDX Controller ICs are manufactured utilizing standard digital IC processes. The second component or Power Device converts the Controller outputs into power outputs to drive a loudspeaker. DDX Power ICs are manufactured using a proprietary semiconductor process developed by STMicroelectronics. Both a DDX Controller and a DDX Power Device are required to implement a complete audio amplifier solution. In November 2004, the Company released the first of a new family of all-in-one DDXi (i for integrated) amplification solutions that combine a DDX Controller and a DDX Power Device in a single IC.

The Company has released seven Controllers, thirteen Power Devices and three DDXi All-in-One Integrated ICs developed for medium and high power audio applications. The Company plans to develop and release up to seven new audio ICs in 2005 to expand the market opportunities for its products.

The latest generation of DDX Controller device features Apogee s Automode technology. This preset audio processing mode enables rapid evaluation, design and implementation of advanced features without the hassle of customized programming.

The following semiconductor products have been released or will soon be on the market:

DDXi-2051, 2101 & 2161 (i for integrated) All-in-One Integrated Amplifiers: The DDXi-2051, 2101 and 2161 are the world s first fully integrated, all-digital, high power audio amplifiers that include a complete set of digital audio processing features. The DDXi combine a 2.1 channel DDX processor with a

40, 60 or 80 watt per channel, high efficiency DDX power stage, respectively. This one-chip solution significantly reduces system cost, size and complexity by eliminating the need for a separate audio processor, digital to analog converter and amplifier chips. These benefits make the DDXi ICs ideal solutions for Digital TVs, CD/DVD mini/micro systems, gaming systems, and multi-media speakers. The DDXi-2051, 2101 & 2161 features Apogee s new Automode . These devices were released to production in February 2005.

DDX-2001 Controller: The DDX 2001 Controller combines an advanced digital audio processor with patented DDX processing that supports up to three channels of high efficiency DDX audio amplification. The Controller replaces analog signal processors with digital signal processing to provide a full complement of audio features. The DDX-2001 supports the full line of high-efficiency DDX Power Devices and can be configured in stereo mode or in a 2.1 channel mode to support products that include a separate subwoofer loudspeaker. The IC features Apogee s Automode preset audio processing modes that enable rapid evaluation, design and implementation of advanced features without the hassle of customized programming. The device was released to production in February 2005.

DDX-8001 Controller: The DDX-8001, Apogee s fourth generation digital amplifier controller, combines an advanced digital audio processor with Apogee s patented DDX® processing that supports up to eight channels of high efficiency DDX® amplification. The device was released to production in November 2003. The DDX-8001 features Apogee s new Automode . The device was released to production in February 2004.

DDX-8229 Controller: The DDX-8229, Apogee s fourth generation digital amplifier controller, is a high performance, single-chip solution for multi-channel audio applications. It provides 4 channels of high-performance DDX output plus 4 channels of binary output capable of driving any of Apogee s high-efficiency output stages. The DDX-8229 features Apogee s new Automode , with simple and quick pre-select custom settings built into the IC to shorten the design cycle. The device was released to production in April 2004.

DDX-8000 Controller: The DDX-8000 integrates a configurable audio serial interface, specialized audio processing and eight channels of DDX output. The device was released to production in December 2002.

DDX-8228 Controller: The DDX-8228 includes a complete audio processing feature set and four channels of DDX output. The device also includes an output mode to implement a low cost 5.1 channel design utilizing only two DDX power devices. The device was released to production in March 2003.

DDX-4100/DDX-4100A Controller: The DDX-4100 and the DDX-4100A integrate multiple digital audio interfaces, volume, bass/treble, dynamic compression and other digital audio functions, plus 4.1 channels of DDX outputs. In January 2002 the Company released the DDX-4100A, a revised design of the original DDX-4100, with some improved features.

DDX-2000 Controller: A two-channel DDX Controller that includes a standard audio serial interface, volume control, and a dynamic compression algorithm to reduce amplifier distortion at high power. The device was released to production in December 2000.

DDX-2240 Power Device: The DDX-2240 is a surface mount high efficiency power IC that provides two channels of up to 120 watts into a 6 Ohm speaker load, or 240 watts into a 4 Ohm speaker load at 10% Total Harmonic Distortion (THD) to meet the key power level for premium products. The device is expected to be released to production in the second quarter of 2005.

DDX-2200 Power Device: The DDX-2200 is a surface mount high efficiency power IC that provides two channels of up to 100 watts into a 8 Ohm speaker load, or 200 watts into a 4 Ohm speaker load at 10%

Total Harmonic Distortion (THD) to meet the key power level for premium products. The device is expected to be released to production in the second quarter of 2005.

DDX-2160 Power Device: The DDX-2160 is a surface mount high efficiency power IC that provides two channels of up to 80 watts into a 6 Ohm speaker load, or 160 watts into a 3 Ohm speaker load at 10% Total Harmonic Distortion (THD) to meet the key power level for premium products. The device was released to production in December 2003.

DDX-2120 Power Device: The DDX-2120 is a surface mount high efficiency power IC that provides over 60 watts per channel in stereo and over 120 watts in mono mode into 8 Ohms at 10% Total Harmonic Distortion (THD). This device was released to production in the first quarter of 2004.

DDX-2100 Power Device: The DDX-2100 is a high efficiency power IC that provides two channels of up to 50 watts into a standard 8 Ohm speaker load, or one channel of 100 watts in a 4 Ohm speaker load. The device was released to production in April 2002.

DDX-2060 Power Device: The DDX-2060 is a surface mount high efficiency power IC that provides two channels of up to 35 watts into a standard 8 Ohm speaker load, or 70 watts into a 4 Ohm speaker load. The device was released to production in May 2001.

DDX-2050 Power Device: The DDX-2050 Power Device is a surface mount high efficiency power IC that provides over 25 watts per channel in stereo mode and over 50 watts in mono mode. The device was released to production in June 2003.

DDX-1080 Power Device: The DDX-1080 Power Device is a surface mount high efficiency power IC that provides over 80 watts per channel in bridge mode or 40 watts per ½ bridge. The device was released to production in April of 2004.

DDX-1060 Power Device: The DDX-1060 Power Device is a surface mount high efficiency power IC that provides over 60 watts per channel in bridge mode or 30 watts per ½ bridge. The device was released to production in April of 2004.

DDX-1050 Power Device: The DDX-1050 Power Device is a surface mount high efficiency power IC that provides over 50 watts per channel in bridge mode or 25 watts per ½ bridge.

ATA-120 Analog Integrated Amplifier: The ATA-120 is a single-ended Class-D audio amplifier that converts analog audio input signals into PWM pulses. The device was released to production in August of 2004.

Amplification Products by Application

Home Theater Applications (5.1, 6.1, 7.1 Channels)

DVD/AV Receivers, Powered Speakers, Home Theater-in-a-Box

Application Total Power Range	Controller	Applicable Power Devices
<200 Watts	DDX-8229	DDX-1050, 1060, 1080, 2052, 2062, 2102
200W 400Watts	DDX-8001	DDX-1050, 1060, 1080, 2052, 2062, 2100, 2102, 2120, 2200, 2240
400 Watts and higher	DDX-8001	DDX-1050, 1060, 1080, 2100, 2120, 2160, 2200, 2240

Stereo & Mono Applications

Application		All-in-One Solution or Controller	Applicable Power Devices
Flat-Panel TV 10 25 Watts		DDXi-2051, 2101, ATA-120 DDX-2001	DDX-2052, 2102
Mini/Micro Systems 2, 2.1, 2.2 & 4 **Powered Speakers w/ DSP 2 & 2.1** **Custom Install Audio 2, 2.1 & Mono**			
	≤ 160 Watts	DDXi-2051, 2101, 2161, ATA-120	
	> 160 Watts	DDX-2001, 8229	DDX-1050, 1060, 1080, 2052, 2062, 2100, 2102, 2120, 2160, 2200, 2240
Powered Subwoofer Mono		DDX-2161, ATA-120 with FETS	
Gaming (Slots, Arcade) 2 & 2.1		DDXi-2051, 2101, 2161, ATA-120	
Automotive Trunk Amps 2, 2.1		DDX-8001, 8229	DDX-2052, 2062, 2100, 2102, 2120, 2160, 2200, 2240

c) Board Products

The Company is developing circuit boards for evaluation and reference purposes in order to demonstrate the application of its DDX semiconductor products. These products are provided to customers to support technology and product evaluation and to support customer engineering design activities. At this time, the Company has released three evaluation boards and eight reference boards.

Competition

Integrated audio amplifier ICs marketed today primarily consist of: (1) analog amplifiers known as Class A/B amplifiers; (2) analog high efficiency designs, known as Class D amplifiers, and (3) digital high efficiency Class D designs like DDX. There are several companies currently marketing analog Class D amplifier products, including: Monolithic Power Systems, National Semiconductor Corp., Philips Electronics, STMicroelectronics, Texas Instruments, Inc. Analog Devices, Maxim and Tripath Technology, Inc. STMicroelectronics, under a licensing agreement with Apogee, and Texas Instruments, Inc. are currently marketing complete digital Class D solutions. Companies including Pulsus Technologies, Inc., Wolfson Microelectronics and NeoFidelity, Inc. are marketing digital Class D Controller solutions without an integrated power device.

The Company believes that the competitive advantage of its products is the level of integration and operational efficiency, as well as its low cost solution. The DDX Controller design is digital, which allows the integration of other digital audio functions such as bass/treble, volume, and equalization, to lower overall system cost an approach that the Company believes cannot be accomplished economically using analog solutions in a single IC. DDX efficiency is also greater than analog Class A/B and analog Class D amplifiers, providing manufacturers with power supply and product savings. The agreements with STMicroelectronics and OKI Semiconductor provide for a cost structure that Apogee believes will allow it to compete effectively in the marketplace with acceptable operating margins.

The Company believes that its ability to offer both Class D controllers and power devices provides a distinct competitive and market advantage for gaining overall market share. Some of the Company s controller competitors currently do not offer power devices and are utilizing Apogee s DDX power devices. As such, the Company believes that its DDX power devices are approaching use as an industry standard.

The Company believes that there will be a steady transition of products from analog to digital amplifiers. The Company believes that this transition will lead to increased sales and market share for DDX s all-digital, high efficiency solution.

One of the competitive advantages of DDX technology is that it can be readily integrated with other digital functions to make System on Chip, or SOC, solutions. This cannot be easily accomplished with analog Class D technology. This high level of IC integration enables manufacturers to build products with lower cost, greater simplicity, and smaller size. The Company believes the inclusion of its DDX Controller technology into SOC solutions will enable Apogee to expand the adoption of its technology into highly integrated products and will provide the Company the opportunity to work with the customer to design in a DDX power device.

MEMS/Nanotechnology Division

In May 2004, the Company acquired the portfolio of Micro-Electro-Mechanical Systems (MEMS) intellectual property, trade secrets and know-how developed by Standard MEMS, Inc. (SMI). Concurrently the Company hired key staff from the former SMI and established a MEMS Division in Great River, New York. The Company s strategy is to leverage SMI s investment in MEMS manufacturing technologies, product designs and market development. SMI developed over 12 products and shipped over 50 million MEMS devices, including pressure and gas sensors, biomedical devices, optical and RF switches, ink jet printer heads and infra-red sensors.

The Company intends to utilize its analog and digital circuit designs capability to develop MEMS products for the consumer, automotive, communications and medical markets. The Company will rely on MEMS foundry providers to produce its products, following the same business model used by the Company s audio semiconductor business. The MEMS marketing and sales efforts will be supported by both the Great River Office and the Company s US and foreign sales offices. The Company intends to add additional distributors to handle specific MEMS products.

The Company s initial MEMS development efforts are being directed towards the development of novel pressure sensor products for the industrial and automotive markets as well as the development of medical devices for the transdermal drug delivery (TDD) market. The following provides a summary of the Company s MEMS products and the associated market opportunities.

MEMS Sensor Products:

MEMS based pressure sensors are currently utilized in a wide range of markets including: automotive, industrial, medical and consumer products. MEMS technology was adapted for these applications because it enables sensor and electronics integration resulting in significantly lower systems cost and size compared to previous approaches which utilized multiple machined components and separate, discrete electronics. Applications using MEMS pressure sensors include: engine control, tire pressure monitoring, pump control, blood pressure monitoring and barometric pressure measurement. The total market size for pressure sensors in 2004 was approximately $2.2 billion, with the MEMS portion making up approximately $830 million according to In Stat MDR, a leading MEMS research group.

In November of 2004, the Company established a pressure sensor test capability and began the evaluation of its initial product designs. The Company is optimizing these designs and expects to transition these devices to production in the second half of 2005. In parallel, the Company has established relationships with potential automotive customers and is working with a manufacturing partner to fabricate these products. The Company plans to leverage these designs to build a portfolio of pressure sensors for consumer, medical and industrial applications.

The Company believes that its pressure sensor product has a cost and reliability advantage over existing products on the market because of the unique process used to manufacture the sensor. Companies developing or marketing similar sensor products include All Sensors Corporation, Delphi Corporation, Endevco Corporation, Freescale Semiconductor, Inc, General Electric Company, Honeywell International, Inc., Infineon Technologies AG, Measurement Specialties, Inc., Silicon Microstructure Inc. and Texas Instruments, Inc.

In order to expand its sensor technology the Company signed a cooperative agreement, in November 2004, with The Research Foundation of State University of New York at Stony Brook and The Center for Advanced Technology (SensorCAT), to jointly develop manufacturing technologies to produce highly accurate, low cost micro-sensors. Under the agreement, the Company will have the option to exclusively license the rights to commercialize jointly developed technology. The research activities are focused on combining nano-composite materials and silicon-based micro-fabrication processes. The agreement is for a one-year term and can be renewed by mutual agreement.

MEMS Medical Devices

The Company is developing a unique MEMS-based drug delivery system targeted for use in the TDD market. This development builds upon the intellectual property, product designs and clinical testing performed by SMI. The Company is in the process of filing a patent on the design and the application approach. The Company intends to design, develop and market the drug delivery system to pharmaceutical and medical device manufactures.

TDD systems, commonly know as a patch , is a non-invasive, convenient and painless dosage method that can offer patient benefits such as steady delivery, reduced side effects and improved patient compliance. However, TDD has limited drug applications to small molecule drugs because the skin is an effective barrier to drug transmission to the body. Thus, it is impractical to transdermally deliver large molecule drugs such as proteins, vaccines and most biopharmaceuticals, without the addition of a chemical or physical method to enhance drug delivery. Research is ongoing in the development of transdermal technologies to increase drug delivery rates using electrical, pressure and thermal energy. Another area of research is in the creation of micro-pores in the skin to enhance TDD. These devices include microstructures made of various materials such as metal, glass, silicon, etc. The advantages of a silicon based design are that they a can be manufactured using batch semiconductor process techniques, which lowers cost. In addition, the designs can be readily combined with electronic circuits to enhance delivery or increase the systems functionality. The Company believes this approach provides the best solution for long-term TDD innovation.

The TDD market continues to grow as new drugs are approved for this application. Currently the FDA has approved over 13 specific TDD drug types to be administered using TDD and over 35 TDD applications for TDD systems. According to Frost and Sullivan, the U.S. market for TDD was $1.6 billion in 2002 with expected growth of 300 percent through 2010. The Company believes this growth rate could be enhanced by the adoption of these designs that could expand the range of potential transdermal drugs. Potential applications for enhanced TDD systems include pain management therapies, anxiety therapeutics, antidepressants, sexual dysfunction, vaccines and diabetes.

In November 2004, the Company received the first engineering samples of its silicon based drug delivery system. In order to evaluate the performance of the design, the Company became a member of the New Jersey Center for Biomaterials, a leading US test lab. The Company expects to validate the effectiveness of the design in the first half of 2005 and if the design is validated, plans to establish partnerships with pharmaceutical companies to commercial the design. The Company is also investigating non-drug delivery related transdermal applications for the device.

The Company believes that its MEMS drug delivery design is more robust, has greater design flexibility, because it is silicon based, and has a lower cost to manufacture compared with competitive technologies being developed. Companies developing similar products include: 3M, Alza Corporation, BioValve Incorporated, NanoPass Technologies Limited, and Procter & Gamble.

Research and Development

The Company s research and development activities are directed towards extending its patent protection for its DDX technology, improving the overall performance of the DDX technology, increasing the number of DDX IC designs, and developing new product applications and expanding its technology base. The Company s core technology competencies include: digital signal processing, digital, analog and power IC design and product system applications.

The Company has been granted four patents on its DDX technology and has six additional patents in development for DDX, power supply and related circuit designs.

The Company significantly increased its IC design staff in the last 18 months to develop new DDX and non-DDX products. This investment supported the release of 15 new ICs in 2004. We believe that these designs extend our leadership position including a wider range of power options coupled with a higher performance DDX core and new audio processing features to reduce system design complexity and cost. The Company expects to continue to develop new DDX and non-DDX ICs to meet the requirements of new product applications.

The Company also has invested in new research and development staff to support its MEMS/Nanotechnology business. This staff is engaged in developing proprietary manufacturing processes, product designs, product test and evaluation and packaging solutions. The Company expects the investment in MEMS/Nanotechnology research and development to increase as the first products are released in 2005.

Marketing and Sales

The Company relies on a direct sales force, independent sales representatives and distributors to promote its products worldwide. The Company s sales headquarters are located in Norwood, Massachusetts. In Asia, where most of the world s consumer electronics products are manufactured, the Company has opened sales and application support offices in Hong Kong, Japan and Taiwan. The Company also utilizes sales representatives in Korea and Brazil and independent distributors in Hong Kong, China, Japan, Taiwan, Singapore, Malaysia, Philippines, Thailand and India.

In October 2004 the Company hired Mr. Jeff Gray, Vice President of Marketing and Sales. Mr. Gray brings to Apogee over 15 years of experience in the high technology industry primarily focusing on technology with Application and System Architecture.

The Company s audio business sales strategy is built around making it easy for the customer to utilize its audio ICs and technology. The Company has developed and is providing to customers data sheets, application information, evaluation boards reference designs and, for some products, complete system designs. The Company believes that this information, along with the Company s application engineering support, will enable customers to quickly develop and bring to market high quality audio products.

The Company is promoting the DDX trademark to enhance the value of its products to manufacturers and consumers. The DDX trademark has been registered in the United States and the Company has applied to register the DDX trademark in other countries.

The marketing and sales efforts of the MEMS/Nanotechnology Division will be supported by both the Great River Office and the Company s US and foreign sales offices. The Company intends to add additional distributors to handle specific MEMS products.

The Company also markets its products by attending and exhibiting its products at key industry tradeshows, as well as through the Company s website: *http://www.apogeeddx.com.*

Manufacturing and Quality

The Company currently utilizes several independent companies to manufacture, package and test its IC products. Independent contract manufacturers are utilized to produce and test the Company s circuit board assemblies. The Company inventories and ships ICs and circuit board products from its headquarters in Norwood, Massachusetts and from a warehouse in Hong Kong.

OKI Semiconductor supplies the DDX-2000 device and STMicroelectronics supplies the remaining DDX ICs. Pursuant to the terms of the Company s licensing agreement with STMicroelectronics, all future DDX audio products will be manufactured and supplied by STMicroelectronics. The Company receives packaged, fully tested devices that pass the suppliers internal quality control from both suppliers. The Company believes that its suppliers will have the capacity to meet Apogee s projected requirements for 2005. The Company added two additional semiconductor foundries to produce new IC products in 2004 and plans to contract with independent assembly and test companies to support the manufacturing of its products. The Company also has contracted an ISO certified foundry to produce its MEMS products.

The Company also established a quality management system and procedures and expects to receive ISO certification in 2005.

Employees

As of December 31, 2004, the Company had 35 employees, of which 34 were full-time employees, including 22 in research and development, 8 in sales and marketing and 5 in general and administration. Of the 8 employees in sales and marketing, two of them also support applications and design activities through the Company s Hong Kong office. None of the employees are represented by a collective bargaining agreement, nor has the Company experienced work stoppages. The Company believes that relations with its employees are good.

The following table sets forth certain information with respect to the executive officers of Apogee Technology. All officers serve at the pleasure of the Board of Directors.

Executive Officers of the Company

Name	Age	Position
Herbert M. Stein	76	President, Treasurer, Chief Executive Officer and Chairman of the Board
David B. Meyers	46	Chief Operating Officer
Andrew A. Adrian	41	Vice President of Engineering

Mr. Herbert M. Stein has served as the Company s Chief Executive Officer since January 2001. Mr. Stein has been a Director of the Company since 1996, has been Chairman of the Board and President since January 2000, and has been Treasurer since November 2003. Mr. Stein was Chairman of the Board of Directors of Organogenesis Inc. from 1991 through 1999 and was Chief Executive Officer of Organogenesis from 1987 through 1999.

Mr. David B. Meyers was appointed the Company s Chief Operating Officer in February 2001. From January 2000 until February 2001 he was the Company s Vice-President, Business Development. Prior to joining the Company in 1996, Mr. Meyers was a principal engineer with Arinc Research Corporation and held various engineering and research positions at Northrop Grumman Corporation and Rockwell International.

Mr. Andrew A. Adrian has served as the Company s Vice President of Engineering since August 2001. From 1995 to 2001 he was a principal engineer with the Company. Prior to joining the Company in 1995, Mr. Adrian was a design engineer with Northrop Grumman Corporation.

CERTAIN RISK FACTORS THAT MAY AFFECT FUTURE RESULTS OF OPERATIONS AND OUR COMMON STOCK PRICE

There are a number of important factors that could cause our actual results to differ materially from those indicated or implied by forward-looking statements. Factors that could cause or contribute to such differences include those discussed below, as well as those discussed elsewhere in this Form 10-KSB. We disclaim any intention or obligation to update or revise any forward-looking statements, whether as a result of new information, future events or otherwise except as may be required by law.

RISKS RELATED TO OUR BUSINESS

WE HAVE NOT BEEN ABLE TO COMPLETE THE AUDIT OF OUR 2004 FISCAL YEAR FINANCIAL STATEMENTS AND WILL HAVE TO HAVE OUR 2003 FISCAL YEAR FINANCIAL STATEMENTS RE-AUDITED.

As a result of a disagreement over a revenue recognition issue with our independent registered public accounting firm, Anchin, Block & Anchin LLP, as a result of which they have resigned, we have not been able to complete the audit process with respect to our financial statements for the fiscal year ended December 31, 2004. Although we have included unaudited financial statements for that fiscal year in a Current Report on Form 8-K, no assurance can be given that those results will not change following the completion of the audit process.

In addition, our auditors have concluded that their audit opinion with respect to our financial statements for the fiscal year ended December 31, 2003 may not be relied upon. As a result of the ongoing review of our financial statements, we may have to restate our previously reported 2003 financial statements and recognize revenue in different periods than previously reported.

We are working diligently to retain new independent registered public accountants and to complete a re-audit of our financial statements for the fiscal year ended December 31, 2003 and the audit of our financial statements for the fiscal year ended December 31, 2004 as expeditiously as possible, and we hope to file these audited financial statements prior to June 30, 2005. However, we cannot assure you that we will be successful in meeting that time frame, or that material adjustments in our financial statements for either period will not be necessary.

WE HAVE HAD A HISTORY OF LOSSES AND MAY NOT BE ABLE TO SUSTAIN PROFITABILITY.

Our ability to generate future revenue and sustain profitability will depend on a number of factors, many of which are described throughout this risk factor section. If we are unable to achieve and maintain profitability, our share price would likely decline.

THE COMPANY HAS ONLY A SMALL NUMBER OF CUSTOMERS, AND THE LOSS OF THESE CUSTOMERS WOULD HAVE A MATERIAL ADVERSE EFFECT ON THE COMPANY S BUSINESS.

During the twelve months ended December 31, 2004, the Company derived approximately 81% of both its total revenue and product revenue from five customers and four customers, respectively. The loss of any of the Company s customers would have a material adverse effect on its business, financial condition and results of operations. The Company is working to diversify its customer base in order to reduce its dependence on a small number of customers. The Company may not be able to succeed in these efforts.

OUR BUSINESS IS CONCENTRATED IN A LIMITED NUMBER OF MARKETS AND ANY SIGNIFICANT CHANGE IN THESE MARKETS COULD HAVE A MATERIAL ADVERSE EFFECT ON THE COMPANY S BUSINESS.

Approximately 58% and 30% of the Company s total revenue for the twelve months ended December 31, 2004 were to customers in Asia and Europe, respectively. In addition, 92% of product revenue was from customers in Asia. A significant percentage of the Company s product revenue is to manufacturers producing DVD Receivers. This is a relatively new consumer electronic product with a limited sales history. Although the Company intends to develop new markets in order to diversify the market applications of its products, there is no guaranty that it will be successful.

OUR MARKETS ARE SUBJECT TO RAPID TECHNOLOGICAL CHANGE AND, THEREFORE, OUR SUCCESS DEPENDS ON OUR ABILITY TO INTRODUCE NEW PRODUCTS IN A TIMELY FASHION.

The life cycle of the technology and any future products developed by us may be limited by the emergence of new products and technologies, changes in consumer preferences and other factors. Our future performance will depend on our ability to consistently:

- identify emerging technological trends in our market;
- identify changing consumer requirements;
- develop or maintain competitive technology, including new product offerings;
- improve the performance, features and reliability of our products, particularly in response to technological change and competitive offerings;
- bring technology to market quickly at cost-effective prices, and
- protect our intellectual property.

We may not succeed in developing and marketing new products that respond to technological and competitive developments and changing customer needs, or such products may not gain market acceptance and be incorporated into the technology or products of third parties. Any significant delay or failure to develop new enhanced technologies, including new product offerings, and any failure of the marketplace to accept any new technology and product offerings would have a material adverse effect on our business, financial condition and results of operations.

WE MAY REQUIRE ADDITIONAL CAPITAL TO FUND OUR OPERATIONS AND RESEARCH AND DEVELOPMENT.

With the exception of the fiscal year ended December 31, 2003, we have sustained losses and have had only a limited amount of cash generated from operations. We have funded our operating activities to date primarily from the sale of securities. We will likely require additional capital in the future, which may be in the form of additional sales of securities. The additional capital may not be readily available to us on

favorable terms, if at all. Any sale of securities would result in dilution to our current stockholders ownership in the Company.

OUR ABILITY TO ACHIEVE SUSTAINED REVENUE GROWTH WILL BE HARMED IF WE ARE UNABLE TO MAINTAIN OUR EXISTING LICENSING RELATIONSHIPS.

Part of our business strategy is to expand our licensing activities with STMicroelectronics and to enter into licensing relationships with other companies in order to offer products to a larger customer base than could be reached through our own development and marketing efforts. We believe that such relationships can accelerate market penetration of our products and technologies, while limiting our manufacturing exposure and sales and marketing costs. However, we may not be able to expand or maintain our existing licensing relationships or establish new licensing relationships on commercially reasonable terms, if at all. Any future inability by us to maintain our licensing relationships or to enter into additional licensing relationships, or the failure of one or more of our licensing relationships to contribute to the development and maintenance of a market for our products, could have a material adverse effect on our business, operating results and financial condition.

OUR QUARTERLY OPERATING RESULTS MAY FLUCTUATE.

We have experienced fluctuations in our quarterly operating results in the past and it is likely that these fluctuations will continue in the future. These fluctuations are caused by many factors, including, but not limited to:

- availability and pricing from our suppliers;
- changes in the demand for our products by customers;
- introductions or enhancements of products, or delays in the introductions or enhancements of products, by us or our competitors;
- rate and success of new customer development;
- changes in our pricing policies or those of our competitors;
- success in attracting, retaining and motivating qualified personnel; and
- changes in general economic conditions.

A substantial portion of our operating expenses is related to personnel, facilities, and sales and marketing programs and are fixed. Our expense level is based in part on our expectations of future orders and sales, which are extremely difficult to predict. Accordingly, we may not be able to adjust our fixed expenses quickly enough to address any significant shortfall in demand for our products in relation to our expectations.

Fluctuations in our operating results may also result in fluctuations in our common stock price. In such event, the trading price of our common stock would likely suffer and adversely affect our ability to raise capital and the value of your investment in the Company.

IF WE ARE UNABLE TO HIRE OR RETAIN KEY PERSONNEL, WE MAY NOT BE ABLE TO OPERATE OUR BUSINESS SUCCESSFULLY.

We may not be successful in recruiting and retaining executive officers and other key management and technical personnel. The competition for employees with the necessary high level of technical expertise to design, market and sell our products is intense, particularly in eastern Massachusetts and Asia. We will need to hire a number of additional technical personnel if we are to increase the rate at which we develop new products. Because competition for highly skilled technical personnel is so intense, companies

in Apogee s industry are subject from time to time to complaints brought by competitors alleging interference with contractual relations or wrongful hiring of employees. Such lawsuits may be costly, may divert management attention and resources from the operation of our business, and may therefore adversely affect our financial condition and results of operations. In addition, the loss of the management and technical expertise of our senior management could seriously harm us. Our employees may also be recruited away from us by our competitors. The Company does not have in place employment contracts for some members of its senior management, including the COO and Vice President of Engineering.

THERE IS A NEW EUROPEAN DIRECTIVE TO ELIMINATE HAZARDOUS MATERIALS IN ELECTRONIC PRODUCTS AND AS SUCH WE MAY NOT BE ABLE TO TRANSITION OUR IC PRODUCTS TIMELY TO MEET CUSTOMER NEEDS AND MAY HAVE INVENTORY THAT CAN ONLY BE SOLD IN LIMITED MARKETS.

The IC industry is responding to the European directive of Restriction of Hazardous Materials (RoHS) that will become effective in July of 2006. As a result of this directive, semiconductor companies are working to remove lead and other hazardous materials used in their IC products. The Company expects to transition all of its IC products to conform to the RoHS standard during the first have of 2005. However, the Company may not be able to meet customer delivery requirements to support the 2005 consumer electronic design cycle. In addition, the Company currently has inventory to support European customers that may have to be sold in other markets.

WE DO NOT HAVE MANUFACTURING CAPABILITIES, AND AS A RESULT, WE RELY ON OUTSIDE FOUNDRIES TO MANUFACTURE OUR SEMICONDUCTOR PRODUCTS.

We have no manufacturing capabilities, nor do we have plans to establish any such capabilities. Accordingly, we utilize outside semiconductor foundries, assembly and test companies to manufacture our semiconductor products. There are significant risks associated with our reliance on these foundries that can adversely affect our business, operating results and financial condition. These risks include:

- the ability to maintain foundry relationships, the failure of which could result in significant delays in product introduction due to the time necessary to establish new relationships;
- delays in production or shortages in product delivery as a result of production problems at outside contractors;
- the loss of foundry priority that may result in limiting our ability to obtain products on schedule;
- limited control over product quality that could result in product returns and the loss of customers;
- inability to control manufacturing yield that could increase production costs, thereby reducing sales potential and operating margins; and
- lack of access or control over new processes and manufacturing technologies to maintain product competitiveness in the market.

OUR PRODUCTS USE NEW TECHNOLOGY AND MAY HAVE MANUFACTURING DEFECTS OR OTHER CHARACTERISTICS THAT ARE ONLY DETECTED AFTER INSTALLATION IN CUSTOMER APPLICATIONS, WHICH MAY HARM OUR BUSINESS.

Our products are based on recently developed technology and are manufactured using state-of-the-art manufacturing processes. Our approach to product qualification and testing may not fully evaluate or identify product characteristics or defects that could adversely affect the product s ability to operate in the intended application. If such defects or characteristics are discovered after installation, product revenue

might be significantly delayed and our ability to maintain existing customers and to retain new customers may be seriously affected.

OUR ABILITY TO ACHIEVE REVENUE GROWTH WILL BE HARMED IF WE ARE UNABLE TO PERSUADE THE MARKET TO ADOPT OUR AMPLIFIER AND MEMS TECHNOLOGIES.

We face challenges in persuading manufacturers to adopt our products using our DDX amplifier and MEMS technologies. Traditional amplifiers use design approaches developed in the 1930s. These approaches are still used in most amplifiers and engineers are familiar with these design approaches. In order to adopt our products, manufacturers and engineers must understand and accept our new technology. In addition, our amplifier and MEMS technologies may be more expensive for some applications than traditional technologies. For these reasons, prospective customers may be reluctant to adopt our technologies.

INTENSE COMPETITION IN THE SEMICONDUCTOR AND CONSUMER AUDIO INDUSTRY COULD PREVENT US FROM SUSTAINING PROFITABILITY.

The semiconductor and consumer audio industry is highly competitive, and we expect the intensity of the competition to increase. Many of our competitors have greater financial, technical, research, marketing, sales, distribution, service and other resources than we do. Moreover, our competitors may offer broader product lines and have greater name recognition than we do, and may offer discounts as a competitive tactic. In addition, several development stage companies are currently creating or developing technologies and products that compete with or are being designed to compete with our technologies and products. Our competitors may develop or market technologies or products that are more effective or more commercially attractive than our current or future products, or that may render our technologies or products less competitive or obsolete. Accordingly, if competitors introduce superior technologies or products and we cannot make enhancements to our technologies and products necessary for them to remain competitive, our competitive position, and in turn, our business, revenues and financial condition, will be seriously harmed.

OUR BUSINESS COULD SUFFER IF WE EXPERIENCE DIFFICULTIES IN INTEGRATING ANY TECHNOLOGIES, PRODUCTS OR BUSINESSES WE ACQUIRE.

In May of 2004, the Company acquired the intellectual property and other intangibles and hired staff from Standard MEMS, Inc. Acquisitions typically entail many risks and could result in difficulties in integrating the operations and personnel of companies that we acquire or the technologies and products that we acquire. If we are not able to successfully integrate our acquisitions, we may not obtain the advantages that the acquisitions were intended to create, which could adversely affect our results of operations, financial condition and cash flows. In addition, in connection with acquisitions, we could experience disruption in our business or employee base. There is also a risk that key employees of companies that we acquire or key employees necessary to successfully commercialize technologies and products that we acquire may seek employment elsewhere, including with our competitors.

RISKS RELATED TO OUR INTELLECTUAL PROPERTY

OUR INTELLECTUAL PROPERTY AND PROPRIETARY RIGHTS MAY BE INSUFFICIENT TO PROTECT OUR COMPETITIVE POSITION.

Our business depends, in part, on our ability to protect our intellectual property. We rely primarily on patent, copyright, trademark and trade secret laws to protect our proprietary technologies. We cannot be sure that such measures will provide meaningful protection for our proprietary technologies and processes. We have four issued United States patents and three pending patent applications. In addition, we recently acquired a portfolio of MEMS intellectual property and the Company is reviewing this portfolio to determine which of the acquired rights will be most useful in its business. We cannot be sure that any existing or future patents will not be challenged, invalidated or circumvented, or that any rights granted thereunder would provide us meaningful protection. The failure of any patents to provide protection to our technology would make it easier for our competitors to offer similar products.

We also generally enter into confidentiality agreements with our employees and strategic partners, and generally control access to and distribution of our documentation and other proprietary information. Despite these precautions, it may be possible for a third party to copy or otherwise obtain and use our products or technology without authorization, develop similar technology independently or design around our patents. In addition, effective copyright, trademark and trade secret protection may be unavailable or limited in certain foreign countries in which we operate.

WE MAY BE SUBJECT TO INTELLECTUAL PROPERTY RIGHTS DISPUTES, WHICH COULD DIVERT MANAGEMENT S ATTENTION AND COULD BE COSTLY.

The semiconductor and consumer audio industries are characterized by vigorous protection and pursuit of intellectual property rights. From time to time, we may receive notices of claims of infringement, misappropriation or misuse of other parties proprietary rights. We cannot be sure that we will prevail in these actions, or that other actions alleging infringement by us of third-party patents, misappropriation or misuse by us of third-party trade secrets or the invalidity of one or more patents held by us will not be asserted or prosecuted against us, or that any assertions of infringement, misappropriation or misuse or prosecutions seeking to establish the invalidity of our patents will not seriously harm our business. For example, in a patent or trade secret action, an injunction could be issued against us requiring that we withdraw particular products from the market or necessitating that specific products offered for sale or under development be redesigned.

Irrespective of the validity or successful assertion of various claims of infringement, misappropriation or misuse of other parties proprietary rights, we would likely incur significant costs and diversion of our management and personnel resources with respect to the defense of such claims, which could seriously harm our business. If any claims or actions are asserted against us, we may seek to obtain a license under a third party s intellectual property rights. We cannot be sure that under such circumstances a license would be available on commercially reasonable terms, if at all. Moreover, we often incorporate the intellectual property of our strategic customers into our designs, and we have certain obligations with respect to the non-use and non-disclosure of such intellectual property. We cannot be sure that the steps taken by us to prevent our or our customers misappropriation or infringement of the intellectual property will be successful.

RISKS RELATING TO OUR COMMON STOCK

FACTORS UNRELATED TO OUR BUSINESS COULD NEGATIVELY IMPACT THE MARKET PRICE OF OUR COMMON STOCK.

The stock markets have experienced extreme price and volume fluctuations that have affected and continue to affect the market prices of equity securities of many technology companies. These fluctuations

often have been unrelated or disproportionate to the operating performance of those companies. We expect that the market price of our Common Stock will fluctuate as a result of variations in our quarterly operating results, or for other reasons that are not related to the performance of our business. These fluctuations may be exaggerated if the trading volume of our Common Stock is low. In addition, due to the technology-intensive nature of our business, the market price for our Common Stock may rise and fall in response to various factors including:

- announcements of technological innovations or new products, or competitive developments;
- investor perceptions and expectations regarding our or our competitors products;
- acquisitions or strategic alliances by us or our competitors; or
- the gain or loss of a significant customer or order.

In addition, market fluctuations, as well as general economic, political and market conditions such as recessions, interest rate changes or international currency fluctuations, may negatively impact the market price of our Common Stock.

Item 2. PROPERTIES

The Company leases approximately 5,000 square feet of office space at 129 Morgan Drive, Norwood, Massachusetts. The term of this lease expired on September 30, 2004. Currently the Company is renting this facility on a month-to-month basis. The 5,000 square foot area is leased at a below-market rate. In addition, the Company leases an office in Great River, New York as well as an office in Hong Kong.

Item 3. LEGAL PROCEEDINGS

The Company is not a party to any litigation in any court, and management is not aware of any contemplated proceeding by any governmental authority against the Company.

Item 4. SUBMISSION OF MATTERS TO A VOTE OF SECURITY HOLDERS

No matters were submitted to a vote of the security holders of the Company during the fourth quarter of the year ended December 31, 2004.

PART II

Item 5. MARKET FOR REGISTRANT S COMMON EQUITY AND RELATED STOCKHOLDER MATTERS

Market Information

The Company s Common Stock was listed on the NASDAQ Stock Market (formerly the National Association of Securities Dealers Automated Quotation System) from July 15, 1988 to June 8, 1992 under the symbol APGG. The Common Stock was also listed on the Boston Stock Exchange under the symbol APG from February 14, 1990 until December 18, 1992.

From June 9, 1992 to September 1, 1999, the Company s Common Stock was quoted on the Over-the-Counter Bulletin Board (the OTCBB) of the NASDAQ Stock Market, Inc. under the symbol APGT. From September 1, 1999, the Company s Common Stock was no longer eligible for quotation on the OTCBB due to the phase-in implementation of NASD Rule 6530 requiring all OTCBB quoted companies to report their current financial information to the Securities and Exchange Commission. From September 1, 1999 to September 12, 2000, the Company s Common Stock was quoted on the National Quotation Bureau s Pink Sheets. On August 29, 2000, the Company s Registration Statement on Form 10-SB to register its Common Stock under the Securities Exchange Act of 1934 was declared effective by the Securities and Exchange Commission and on September 12, 2000, the Common Stock resumed being quoted on the Over the Counter Bulletin Board (the OTCBB) under the symbol APGT. From September 14, 2001 to October 8, 2003 the Common Stock was quoted on The Nasdaq SmallCap Market under the symbol APGT. On October 5, 2003, The American Stock Exchange approved the Company s application to list its securities on the American Stock Exchange under the symbol ATA.

The following table sets forth, for the periods indicated, the high and low sales prices for the Common Stock as reported by the American Stock Exchange and The Nasdaq SmallCap Market, as indicated. The bid quotations represent inter-dealer prices, without adjustment for mark-ups, mark-downs or commissions and do not necessarily represent actual transactions. All prices listed below have been adjusted to reflect post split prices.

	Common Stock	
	High	**Low**
2003:		
First Quarter (Nasdaq Small Cap Market from September 14, 2001)	5.2500	2.5900
Second Quarter	5.7700	2.3300
Third Quarter	10.5000	4.6000
Fourth Quarter (American Stock Exchange from October 9, 2003)	14.8500	9.3100
2004:		
First Quarter	11.7900	8.6000
Second Quarter	9.1500	8.3000
Third Quarter	8.4000	3.7000
Fourth Quarter	4.7000	3.4500

Stockholders

As of March 15, 2005, there were approximately 90 holders of record and approximately 807 beneficial holders of 11,838,332 outstanding shares of Common Stock.

Dividends

On August 12, 2003, the Board of Directors approved a two for one split of the Company s Common Stock in the form of a 100% stock dividend. On December 11, 2003 each stockholder of record as of the close of business on November 17, 2003 received one share of Common Stock for each share held.

Unregistered Sales of Securities

Set forth in chronological order is information regarding shares of Common Stock sold and options granted by the Company during the period covered by this Annual Report on Form 10-KSB and not previously reported on the Company s Quarterly Reports on Form 10-QSB. Also included is the consideration, if any, received by the Company for such shares and options and information relating to the section of the Securities Act of 1933, as amended, or rule of the Securities and Exchange Commission under which exemption from registration was claimed. All of the following securities were issued directly by the Company and there were no underwriters or selling agents involved in these transactions.

On December 8, 2004, 2,000 shares of the Company s Common Stock were issued to investors as a result of the exercise of warrants issued pursuant to a Stock Subscription Agreement in a private placement dated January 25, 2000. The exercise price for these shares was $1.25 per share. The exemption from registration relied upon was Section 4(2) of the Securities Act of 1933, as amended.

On December 14, 2004, 40,000 shares of the Company s Common Stock were issued to a former director as a result of the exercise of certain options pursuant to the Company s 1997 Employee, Director, and Consultant Stock Option Plan. The exercise price for these shares was $.275 per share.

From October 4, 2004 to December 2, 2004, the Company granted options to purchase 87,500 shares of Common Stock under its 1997 Employee, Director, and Consultant Stock Option Plan to certain employees at exercise prices ranging from $3.85 to $4.04 per share.

Item 6. SELECTED FINANCIAL DATA

THIS INFORMATION REQUIRED BY THIS ITEM 6 WILL BE FILED UPON COMPLETION OF THE AUDIT PROCESS FOR THE 2004 FISCAL YEAR.

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

THE FINANCIAL INFORMATION REQUIRED BY THIS ITEM 7 WILL BE FILED UPON COMPLETION OF THE AUDIT PROCESS FOR THE 2004 FISCAL YEAR.

Overview

The Company designs, develops and markets silicon based products incorporating proprietary technologies. The Company s patented all-digital, high efficiency Direct Digital Amplification (DDX®) technology Integrated Circuits (ICs) are used in a range of audio applications including: home theater systems, powered speakers, car audio, commercial audio, and PC multi-media. The Company is developing new System-on-Chip (SOC) products using its analog and digital circuit designs and Micro-Electromechanical Systems (MEMS) technology for the consumer, automotive, communications and medical markets. At the appropriate time, the Company will segment the reporting of the MEMS division.

From 1981 until 1995, the Company was in the business of engineering, manufacturing and marketing high quality, high-end patented ribbon loudspeaker systems for use in home audio and video entertainment systems. Since 1995, the Company has focused exclusively on the development and commercialization of its proprietary amplifier technology, known as DDX®. DDX technology is an all-digital, high efficiency amplifier technology that provides true digital audio reproduction while lowering manufacturing cost compared to traditional analog amplifier solutions. The Company s initial DDX development efforts were directed toward the implementation of a digital controller design and the specifications of power designs to support DDX licensing objectives. The Company signed an exclusive licensing agreement for audio applications with STMicroelectronics in February 2001. Under this licensing agreement with STMicroelectronics NV (ST), the Company develops and provides intellectual property to be used in royalty bearing products produced by ST. In addition, the Company is working under a development agreement with ST to develop and market new semiconductor products that leverage Apogee s DDX technology and ST s intellectual property and semiconductor design, development and manufacturing capability. ST is currently shipping eighteen royalty bearing DDX-based semiconductor products to customers. The Company continues to support its licensing activities with STMicroelectronics and other companies.

In 1996 the Company started the development of DDX-based semiconductor products. The Company uses two independent suppliers to produce its semiconductor products. The first DDX-based IC product was released to production in late 2000 and since that time the Company has released 24 additional IC products. The Company markets and sells its semiconductor products to audio manufacturers using a worldwide sales and distribution network. The Company uses contract manufacturers to produce circuit boards for customers who support the Company s IC marketing activities.

The Company outsources the manufacturing, assembly and preliminary testing of its semiconductor products and evaluation boards. Cost of revenue includes the third-party manufacturing, testing and assembly costs as well as costs associated with shipping. Research and development expenses consist primarily of salaries and related overhead costs associated with engineering activities as well as other materials and related services used in the development of the Company s semi-conductor chips. Selling, general and administrative expenses consist primarily of employee compensation and overhead charges as well as expenses directly associated with the marketing of the Company s products.

Critical Accounting Policies

The Company prepares its consolidated financial statements in conformity with accounting principles generally accepted in the United States of America. The preparation of these financial statements requires us to make estimates, judgments and assumptions that we believe are reasonable based upon the

information currently available. These estimates and assumptions affect the reported amounts of assets and liabilities at the date of the financial statements and the reported amounts of revenues and expenses during the periods presented. Any future changes to these estimates and assumptions could have a significant impact on the reported amounts of revenue, expenses, assets and liabilities in our financial statements. The significant accounting policies which we believe are the most critical to aid in fully understanding and evaluating our reported financial results include the following:

Revenue Recognition

Apogee recognizes revenue from product sales at the time of shipment, when the sales price is fixed and determinable and collectibility is reasonably assured. The Company does not offer a right of return on product sales. Any price adjustment after shipment of goods is recorded as an offset to revenue. For sales transactions, we comply with the provisions of Staff Accounting Bulletin 104, Revenue Recognition, which states that revenue should be recognized when the following revenue recognition criteria are met: (1) persuasive evidence of an arrangement exists; (2) the product has been shipped and the customer takes ownership and assumes the risk of loss; (3) the selling price is fixed or determinable; and (4) collection of the resulting receivable is reasonably assured. In addition, the Company records royalty revenue when earned in accordance with the underlying agreements. Consulting revenue is recognized as services are performed.

Accounts Receivable

The Company performs credit evaluations of customers and determines credit limits based upon payment history, customers creditworthiness and other factors, as determined by our review of their current credit information. For a majority of our larger sales, we can require the issuance of a Letter of Credit. Smaller accounts must either pay via credit card or in advance of shipment. We continuously monitor collections and payments from our customers, and we maintain a provision for estimated credit losses based upon our historical experience and any specific customer collection issues that we have identified. We cannot guarantee that we will avoid credit losses in the future. If the financial condition of the Company s customers were to deteriorate, resulting in an impairment of their ability to make payments, additional allowances may be required. Since our accounts receivable are highly concentrated in a small number of customers, a significant change in the liquidity or financial position of any one of these customers could have a material adverse impact on the collectibility of our accounts receivable, our liquidity or our future results of operations.

Inventory

Apogee states its inventory at the lower of cost (first-in, first-out) or market. The Company maintains allowances for estimated excess or obsolete inventories based on the Company s review of inventory levels, projected future sales and comparison of actual manufacturing costs to standard costs. If actual market conditions are less favorable than those projected by management, additional allowances may be required.

Valuation of Long-Lived Assets

Property, plant and equipment, patents, trademarks and other intangible assets are amortized over their estimated useful lives. Useful lives are based on management s estimates over the period that such assets will generate revenue. Intangible assets are reviewed for impairment whenever events or changes in circumstances indicate that the carrying value of an asset may not be recoverable. Future adverse changes in market conditions or poor operating results of underlying capital investments or intangible assets could result in losses or an inability to recover the carrying value of such assets, thereby possibly requiring an impairment charge in the future.

Item 7A. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

The Company s financial instruments include: cash, cash equivalents, accounts receivable and accounts payable. At December 31, 2004, the carrying value of the Company s cash, cash equivalents, accounts receivable and accounts payable approximate fair values given the short maturity of these instruments.

Although the Company s sales are predominately to international markets, the Company believes that it does not have material foreign currency exchange rate risk since international sales are in U.S. dollars and material purchases from foreign suppliers are typically also denominated in U.S. dollars. Additionally, the functional currency of the Company s foreign sales office is the U.S. dollar.

It is the Company s policy not to enter into derivative financial instruments for speculative purposes.

Item 8. FINANCIAL STATEMENTS AND SUPPLEMENTARY DATA

THE INFORMATION REQUIRED BY THIS ITEM 8 WILL BE FILED UPON COMPLETION OF THE AUDIT PROCESS FOR THE 2004 FISCAL YEAR.

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

PLEASE SEE THE DISCLOSURE SET FORTH IN THE COMPANY S FORM 8-K FILED ON THE SAME DAY AS THIS FORM 10-KSB.

Item 9A. CONTROLS AND PROCEDURES

(a) *Evaluation of Disclosure Controls and Procedures*. Our principal executive officer and principal financial officer, after evaluating the effectiveness of our disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) as of the end of the period covered by this Annual Report on Form 10-KSB, have concluded that, based on such evaluation, our disclosure controls and procedures were adequate and effective to ensure that material information relating to us, including our consolidated subsidiaries, was made known to them by others within those entities, particularly during the period in which this Annual Report on Form 10-KSB was being prepared.

(b) *Changes in Internal Controls*. There were no changes in our internal control over financial reporting identified in connection with the evaluation of such internal control that occurred during the fourth quarter of our last fiscal year that have materially affected, or are reasonably likely to materially affect, our internal control over financial reporting.

PART III

Item 10. DIRECTORS AND EXECUTIVE OFFICERS OF THE REGISTRANT

The response to this item is incorporated by reference from the discussion responsive thereto under the captions Management, Compliance with Section 16(a) of the Securities Exchange Act of 1934, and Code of Conduct and Ethics in the Company s Proxy Statement for the 2005 Annual Meeting of Stockholders. Disclosure regarding any amendments to, or waivers from, provisions of the Code of Conduct and Ethics that apply to our principal executive and financial officers will be included in a Current Report on Form 8-K within four business days following the date of the amendment or waiver, unless website posting of such amendments or waivers is permitted by the rules of the American Stock Exchange, Inc.

Item 11. EXECUTIVE COMPENSATION

The response to this item is incorporated by reference from the discussion responsive thereto under the caption Executive Compensation in the Company s Proxy Statement for the 2005 Annual Meeting of Stockholders.

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

The response to this item is incorporated by reference from the discussion responsive thereto under the caption Share Ownership in the Company s Proxy Statement for the 2005 Annual Meeting of Stockholders.

Item 13. CERTAIN RELATIONSHIPS AND RELATED TRANSACTIONS

The response to this item is incorporated by reference from the discussion responsive thereto under the captions Certain Relationships and Related Transactions and Executive Compensation Employment Agreements, Termination of Employment and Change of Control Arrangements in the Company s Proxy Statement for the 2005 Annual Meeting of Stockholders.

Item 14. **EXHIBITS**

Item 14(a)	Not Included
Item 14(a)(1) and (2)	Not Included

Item 14(a)(3) *Exhibits*

The following is a list of exhibits filed as part of this Annual Report on Form 10-KSB.

Exhibit No.	**Description**
3.1	Certificate of Incorporation of Apogee Technology, Inc., incorporated herein by reference to Exhibit 3.1 to the Registrant s Form 10-SB, as amended (File No. 000-17053).
3.2	Amendment of Certificate of Incorporation of Apogee Technology, Inc., incorporated herein by reference to Exhibit 3.2 to the Registrant s Form 10-SB, as amended (File No. 000-17053).
3.3	Certificate of Amendment to Certificate of Incorporation of Apogee Technology, Inc., incorporated herein by reference from Exhibit 3.3 to the Registrant s Quarterly Report on Form 10-QSB for the quarter ended June 30, 2001 (File. No. 000-30656).
3.4	Restated By-Laws of Apogee Technology, Inc., incorporated herein by reference from Exhibit 3.4 to the Registrant s Quarterly Report on Form 10-QSB for the quarter ended June 30, 2001 (File. No. 000-30656).
10.1*	License Agreement dated February 2, 2001 by and between the Registrant and STMicroelectronics, NV, incorporated herein by reference from Exhibit 10.1 to the Registrant s Quarterly Report on Form 10-QSB for the quarter ended March 31, 2001 (File No. 000-30656).
10.2	Form of 1999 Stock and Warrant Subscription Agreement, incorporated herein by reference to Exhibit 10.1 to the Registrant s Form 10-SB, as amended (File No. 000-17053).
10.3	Form of 1999 Warrant to purchase shares of Common Stock of the Registrant, incorporated herein by reference to Exhibit 10.2 to the Registrant s Form10-SB, as amended (File No. 000-17053).
10.4	Form of 2000 Stock Subscription Agreement, incorporated herein by reference to Exhibit 10.3 to the Registrant s Form 10-SB, as amended (File No. 000-17053).
10.5	Securities Purchase Agreement, incorporated herein by reference to Exhibit 10.1 to the Registrant s Current Report on Form 8-K, dated April 29, 2001 (File No. 001-10456).
10.6	Registration Rights Agreement, incorporated herein by reference to Exhibit 10.2 to the Registrant s Current Report on Form 8-K, dated April 29, 2001 (File No. 001-10456).
10.7	Form of Warrant, incorporated herein by reference to Exhibit 10.3 to the Registrant s Current Report on Form 8-K, dated April 29, 2001 (File No. 001-10456).
10.8	Addendum to Securities Purchase Agreement, incorporated herein by reference to Exhibit 10.4 to the Registrant s Current Report on Form 8-K, dated April 29, 2001 (File No. 001-10456).
14	Code of Conduct and Ethics, incorporated herein by reference to Exhibit 14 to the Registrant s Form 10-KSB for the year ended December 31, 2003 (File No. 000-30656).

* Confidential treatment requested as to certain portions of the document, which portions have been omitted and filed separately with the Securities and Exchange Commission.

Where a document is incorporated by reference from a previous filing, the exhibit number of the document in that previous filing is indicated in parentheses after the description of such document.

Item 15. PRINCIPAL ACCOUNTANT FEES AND SERVICES

The response to this item is incorporated by reference from the discussion responsive thereto under the caption Independent Public Accountants in the Company s Proxy Statement for the 2005 Annual Meeting of Stockholders.

SIGNATURES

Pursuant to the requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized, on April 18, 2005.

APOGEE TECHNOLOGY, INC.
By: /s/ HERBERT M. STEIN
Herbert M. Stein
President, Chief Executive Officer,
Treasurer and Chairman of the Board

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 registrant and in the capacities indicated below and on the dates indicated.

	Signatures	Title	Date
By:	/s/ HERBERT M. STEIN Herbert M. Stein	President, Chief Executive Officer Treasurer and Chairman of the Board	April 18, 2005
By:	/s/ CRAIG A. DUBITSKY Craig A. Dubitsky	Director	April 18, 2005
By:	/s/ ARTHUR S. REYNOLDS Arthur S. Reynolds	Director	April 18, 2005
By:	/s/ SHERYL B. STEIN Sheryl B. Stein	Director	April 18, 2005
By:	/s/ ALAN W. TUCK Alan W. Tuck	Director	April 18, 2005