ISRAEL HIGH-TECH & INVESTMENT REPORT

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God's Healers Become Modern Researchers

In the Old Testament healing is mentioned but there is no recognition of doctors. God was the "rofe", "the healer". Men only served as God's intermediary. For centuries the human healers continued to be viewed as God's intermediaries. The pagan world believed in "medicine men", a much different breed of healers. Ultimately, among Jews, medicine became the most respected profession. The connection with healing and God was never severed. It is not surprising that the number of physicians per capita in Israel is the highest in the world. This existed prior to the massive immigration from Russia and was reinforced by the influx of thousands of Russian physicians who immigrated to this country.

Medical Research

Israel's institutes of higher learning are active in medical research. In this issue we detail a promising cancer therapy which destroys tumors by exposing them to light. The procedure has some side effects which may be significantly overcome thanks to new chemical materials developed at the Weizmann Institute of Science. Cardiac and general stents and systems developed in Israel and sold internationally originate from researchers at the Technion, Israel's Massachusetts Institute of Technology. Israeli physicians, in addition to caring for the sick, involve themselves in applied medical research.

The American Food and Drug Administration testified to their excellence when it granted a seal of approval for Israelis to do "clinical trials" on medical projects to be submitted for FDA approval.

I have reported on these pages eyewitness reports of novel surgical procedures including "bloodless bypass surgery".

Commercialization

Healthcare, medical diagnostics and medical imaging rank high among the approximately 100 Israeli companies on Wall Street. Bio-Technology General, ESC Medical Systems, Elbit Medical Imaging, Elscint, Laser Industries and Teva Pharmaceuticals,

Pharmaceuticals, developer of autoimmunity therapeutics; Smartlight, producers of computerized digital viewers of x-ray images and films.

Milestone Achievements

Recently I attended an International Workshop on Therapeutic Ultrasound Thrombolysis. The focus of the workshop was an ultrasound system for opening cardiac arteries blocked by clots. The hardware and the procedure was developed in Israel and has earned international acclaim. My activities as a "medical project broker" resulted in this project being developed at the Catheterization Laboratory of the Tel-Aviv Medical Center. Under the supervision of Professor Hylton Miller, head of the Tel-Aviv Medical Center's (TAMC) Catheterization Lab, cardiologist Uri Rosenschein developed the system. Dedicated persistence yielded a new medical system for the treatment of cardiac conditions, the world's greatest killer. Its usefulness was confirmed in extensive trials and its efficacy was ascertained.

The Cash Register is Ringing

Multinational giants — including Johnson & Johnson, Boston Scientific, Bausch & Lomb, Medtronic and Siemens — have paid hundreds of millions of dollars to Israeli companies for the right to the use of locally developed medical products. Israel's medical sector has recorded notable achievements to date, but from here it looks as if the future is brighter than ever.

Argomed Raises \$8.5 million

Argomed Ltd., which developed an innovative, minimal intervention has finally raised capital of \$8.5 million. The company is carrying out comprehensive clinical trials on 120 patients in Europe. At the conclusion of these trials, by mid 1998, the company will submit its application for product approval to the US Food and Drug Administration (FDA). Argomed's system already has Israeli and European marketing approval. Initially \$2.5 million of capital was raised with the participation of Israeli venture capital funds and a Norwegian investment bank. The parties investing in Argomed in the second stage, were US and European venture capital funds,

including Venrock - the Rockefeller family fund, Oxford - the leading medical venture capital fund in the US, and Global - a German fund owned by leading European investors.

Fairchild and Tower Extend Agreement to Develop Next Generation Flash Technology

Fairchild Semiconductor, a leading supplier of high performance, multi-market standard semiconductor products, and Tower Semiconductor Ltd. (Nasdaq:TSEMF), an independent manufacturer and service provider of leading-edge foundry services for embedded non-volatile memory and high-density CMOS products, have announced an extension to their groundbreaking market support relationship established in July 1997.

The agreement extension includes a new family of products to improve the competitive positions of both companies. The first project under way is the development of a next-generation Flash technology. "The relationship between Tower and Fairchild was established to support growing demand for high-density and low-voltage EPROMs around the world. The move toward advanced solutions for Flash memory is a natural progression to support a broader range of control store solutions," said Stephen Hamilton, Vice President of Fairchild Semiconductor Memory Products Group. Fairchild will provide product definition, design and test engineering. In addition, Tower will provide wafer fabrication in its advanced non-volatile memory CMOS wafer fab. Fairchild will then provide the final test and packaging and market the product through its worldwide channels to its extensive customer base, under the Fairchild trademark.

Evergreen Group Invests \$2.5 million in AVT

Periscope of I.J.T., venture capital funds managed by Evergreen, whose investment activities exceed \$60 million, have invested \$2.5 million in Advanced Vision Technology (AVT). The balance of company stock is held by the venture capital fund Star, a group of investors headed by Israel Adir and Comsor. AVT develops, manufactures and markets automatic optical computerized control systems, based on sophisticated machine vision technologies. AVT's flagship product, Print

Vision is sold in Europe and the USA. The system automatically detects errors quality and output for the printed product while cutting labor costs and in various types of printing processes in real time, contributing to the material waste. AVT has opened its Brussels subsidiary to conduct the sales and services for its European operations, and has recruited additional sales personnel in the USA, Britain, France and Germany, to support its customer service organizations in these markets.

Israel Approves Free Trade for Jordan Factory Zone

The Israeli cabinet approved an agreement with Jordan extending Israel's free trade area (FTA) status with the United States to Jordan's Irbid industrial zone, according to Israel's Industry and Trade Ministry. As a result, goods produced jointly in the zone by Israeli and Jordanian companies will qualify for duty-free entry into the United States.Industry and Trade Minister Natan Sharansky said that the arrangement was aimed at encouraging cooperation between Israeli and Jordanian firms, and to help Israeli companies enter Middle Eastern markets. Israel estimates that some 1,500 Jordanians already work at the 10 plants already established or being set up in the zone at the edge of Irbid, Jordan's major northern city. Taking advantage of lower Jordanian labour costs, the factories make products ranging from textiles to electronic components. Under the terms of the agreement, which had been previously been approved U.S. government, goods exported from the zone will be able to enter the United States duty free so long as Israeli and Jordanians companies each account for at least one-third of the total production cost or at least 20 percent of total costs, including overheads. Under U.S. law, the ministry said, apparel made from Israeli material and sewn in Jordan would be regarded as Jordanian. Among the companies with operations in Irbid are Jordan's Century Investment Group and Israel's Delta Galil Industries and Koor Industries. Plans call for 5,000 people to be working in the Irbid zone within three years.

Internet Securities Systems

Security 7 has completed a private placement and

has raised \$2.5 million, through share and convertible debenture allotments. The Oppenheimer group led the capital raising through the Genesis Fund and the Bank of Boston. Private investors also participated in the issue.

Security 7 is a start-up company, established by Doron Algeresy and Asher Yoshpe, financed by private entrepreneurs. The company developed a security system for the Internet, designed for large and medium-sized companies, which enables the setting up of an organizational management center and the updating of all network stations. The company has just signed a global distribution agreement with CA for tens of thousands of systems. CA is the second largest software company in the world. In addition, an agreement has been signed for distribution in Japan, with Asgen, which markets software programs for information security. Asgen will also adapt the system to the Japanese language, and will shortly sign a distribution agreement for distribution in the US. Under the terms of the agreement with CA, the latter will sell Security 7 security products during the next eighteen months through its distribution network around the world.

BackWeb Sees Strong Revenue Growth, IPO

BackWeb Technologies, which allows customers to push information over the Internet, said business is growing strongly, placing it in a good position to sell stock publicly.

Eli Barkat, General Manager of BackWeb, was a founder of BRM Technologies, a company specializing in backing companies making products for emerging markets, including Check Point Software Technology (Nasdaq:CHKPF), which sells security software and is now one of the successful public Internet companies. Founded in October 1995, the company has raised \$4 million in seed capital and \$13.5 million in follow-on financing from an investment group including Goldman Sachs & Co., Broadview Associates, Trinity Ventures and Polaris. Analysts and the venture and banking industry expect BackWeb to launch an initial public offering as early as this year. Barkat said the company has already received offers to buy it outright, but the company wants to establish a credible record, including several profitable quarters. Like Check Point, BackWeb's sales, marketing and support operations are in the United States. Barkat said they operated from restaurants and diners for the first few months of existence - while research and development is conducted in Israel. Recently BackWeb began shipping its BackWeb 4.0 software, the third version of the product it first shipped in 1997.

New Galaxy Up and Flying

Israel Aircraft Industries Ltd.'s chief company test pilots, Adi Benaya and Hagai Koren, recently successfully carried out the maiden flight of IAI's new Galaxy widebody business jet. The test flight lasted exactly two hours at an altitude of 10,000 ft and an aircraft speed of 185 knots. The pilots reported that the aircraft had performed flawlessly. The plane was tested for general aircraft handling, inflight stability, engine performance. The Galaxy flight test program will continue throughout the year, to full aircraft certification by the US Federal Aviation Administration (FAA) towards the end of 1998.

The Millennium Projects

SCH Supplies Deutsche Bank with 2000 Conversion Software

SCH (Software Conversion House) of the Formula group recently signed an agreement with Deutsche Bank, the largest bank in Germany and the third largest in the world, for the supply of year 2000 conversion software. The deal is worth some \$2.8 million. Under the agreement, SCH gave the bank user licenses for its C-Mill conversion tools, and training in their use, for the purposes of converting Deutsche Bank's "international trade" system DB Trader. Deutsche Bank's international trade system is the first of the bank's seven main computer systems to undergo conversion. All seven will be converted by the bank's own staff using the same method, with SCH conversion tools.

Compag Invests in Israel

The world's largest personal computer manufac-

turer, Compaq, plans to invest in Israeli venture capital and to participate in Israeli companies developing high technology products. Contacts between Compaq's managers and Israeli representatives, regarding the possibility of strategic investment in Israel, have been going on for a few months. In a meeting with the Israeli consul general and the commercial attaché in Houston, two of the company's managers said that, apart from investing in venture capital funds, Compaq was also interested in focusing on companies in technology incubators, and in start-up companies. They view Israel as a very attractive place for such investments because of the tremendous results achieved in the field of high-tech.

TTI Awarded Contract in Poland

TTI Telecom (Nasdaq: TTILF), an Israeli company, announced that it has been awarded a contract by Tel-Energo S.A. to implement a turnkey solution based on Netrac, the company's state-of-theart network management application suite, throughout the Tel-Energo network. TTI's integrated Network monitoring, surveillance and analysis system, will be used to provide a Fault Management System for Tel-Energo's growing and diverse switching, transmission and data network. TTI expects to complete delivery within six months. Based in Warsaw, Tel-Energo is a dynamic telecommunications company set up by Poland's state-owned Power Distributors and the Polish Power Grid Company (PSE), which runs the national power grid. Tel-Energo, currently completing a \$130 million nationwide fiber-optic network, anticipates doubling its network by the end of 1998. This will place Tel-Energo in a preeminent competitive position to the long range facilities of Poland's state-owned telecom operator, Telekomunikacja Polska (TP), when TP subsequently loses its statutory monopoly. Tel-Energo projects that it will control a quarter of the Polish telecommunications market, worth \$10 billion per vear.

TTI Telecom's Fault Management System allows users to recognize and respond to network situations as they occur. This will enable Tel-Energo to realize benefits such as improved operating rev-

enue and enhanced use of the network by quick detection of network events and root-cause analysis of related faults. The Netrac System will interface with hybrid networks which includes switching and transmission equipment manufactured by Siemens, Alcatel and others. Mr. Zdzislaw Nowak, President of Tel-Energo stated, "Netrac's Fault Management was selected for it ability to support multi-vendor networks, provide scalability and handle integrated network management for our telecommunication infrastructure." He further added "TTI Telecom will provide us with a scalable management system that is able to grow with our needs, and enables us to successfully compete in the Polish Telecommunications market."

Israeli Companies on Wall Street

Orckit Reports Sales Doubled in 1997

Orckit Communications Ltd.(Nasdaq: ORCTF), a leader in the development, manufacture and marketing of Digital Subscriber Line systems and modems, reported that revenues for the year ended December 31, 1997 increased substantially to \$27.5 million, compared to \$13.7 million for 1996. Revenues for Q4 1997 increased 27.9 percent to \$7.4 million, compared to \$5.8 million for Q4 1996. The net loss for the year ended December 31, 1997 was \$158,000, or (\$0.01) per share, compared with a net loss of \$3.1 million, or (\$0.25) per share, for the previous year. Net income for Q4 1997 was \$522,000 or \$0.04 per share, against a net loss of \$ 912,000, or (\$0.06) per share, for Q4 of 1996.

Orckit's DSLAM system, together with Fujitsu Network Communications, were selected for a field trial by the American Sprint telephone service provider. Until recently, US telecom operators were lab-testing the European-style central office equipment. Sprint is the first major US operator to select Orckit's new US-oriented equipment on a competitive basis for use on their telephone lines, and the results have been positive. Building on its success in Europe, Orckit's FastInternet DSLAM systems were selected for a 1,000 line ADSL trial in Holland together with

Lucent Technologies earlier in the quarter. Culminating a year of key strategic partnership announcements, Orckit entered, during the fourth quarter, into an alliance with Rockwell Semiconductor Systems for the development, manufacturing and marketing of HDSL2 chips, in partnership with Siemen's Public Communication Networks Group for incorporation of Orckit's VDSL solution into Siemens' Broadband system. Orckit's involvement in the HDSL2 market for advanced 2 Mbps transmission is an opportunity for Orckit to penetrate the North American market. It expects HDSL2 to be a cost-effective integrated solution together with SONET fiber systems. Its exclusive alliance with Fujitsu Network Communications, a leader in the SONET market, provides Orckit with a direct entry into the telecommunications market.

Orckit Communications develops, manufactures and markets a wide range of high-speed local loop communications systems, including HDSL (High Bit Rate Digital Subscriber Line), ADSL (Asymmetric Digital Subscriber Line), SDSL (Symmetric Digital Subscriber Line) and VDSL (Very High Bit Rate Digital Subscriber Line).

Wiztec Reports Record Results

Wiztec Solutions Ltd. (Nasdaq: WIZTF), a leading provider of subscriber management systems (SMS) for multi-channel subscription television, reported Q4 1997 net income up 315 percent to a record \$610,687 or \$0.09 per share, compared with \$146,500 or \$0.02 per share in Q4 1996. Q4 revenues were up 29 percent to \$2.92 million, compared with \$2.26 million in Q4 1996. Wiztec Solutions' gross profit for Q4 1997 was \$1.58 million, up 67 percent from \$0.95 million in Q4 1996. Operating income increased substantially to a record \$639,504. Net Income for the quarter was \$610,687 or \$0.09 per share, up 315 percent from \$146,500 or \$0.02 per share in Q4 1996. Annual revenues in 1997 rose 44 percent to \$11.97 million, up from \$8.33 million last year and gross profit increased 46 percent to \$5.98 million as compared to \$4.07 million in 1996. Net income for the year was \$2.13 million up 32 percent from \$1.61 million in 1996. Earnings per share were

\$0.34 in 1997 compared to \$0.29 in 1996. In 1997 the company won a number of very significant new projects and also completed the development of the new Client/Server version of WIZARD and entered into a strategic alliance with CBIS, a wholly owned subsidiary of Cincinnati Bell (NYSE: CSN). More than 40 percent of Wiztec Solutions' 1997 revenues stemmed from license and basic customization fees from new customers. One of the most significant achievements was the revenue growth both in Europe and North America. Revenues from Europe more than tripled from 1996 to 1997 and revenues from North America more than doubled. 1997 results especially in the last quarter, could have been even better, were it not for some effects of the economic slow down in the Far East. In 1997, revenues from Far East customers accounted for 16 percent of total revenues, compared to almost 34 percent in 1996 and 41 percent in 1995. Wiztec Solutions achieved several major milestones in 1997. During the year, Wiztec Solutions signed contracts with important new customers, such as Star Choice of Canada, Kabelsignal of Austria and Deutsche Telekom of Germany. This last agreement is especially significant as Deutsche Telekom will use the WIZARD SMS to support the launch of its digital television services in Germany and potentially reach up to 17 million households that now receive TV and radio programs via Deutsche Telekom's T-MediaNet. Wiztec Solutions Ltd. develops, markets and supports computer software which provides multi-channel subscription television system operators with one of the most comprehensive and advanced subscriber management systems available.

Improved Profitability at Aladdin

Aladdin Knowledge Systems Ltd. (Nasdaq: ALDNF), a developer of solutions for the secure licensing and distribution of digital content, reported record revenues and earnings for the fourth quarter and for the year ended December 31, 1997. Q4 sales rose 15.4 percent to \$9.74 million, compared with \$8.43 million during Q4 1996. For the year, sales rose 19 percent to \$34.18 million compared with \$28.70 million in 1996.

Net income for the fourth quarter rose 42.2 percent to \$2.93 million, compared with net income of \$2.06 million for the comparable 1996 quarter. Earnings per share for the fourth quarter rose 38 percent to \$0.29, compared with \$0.21 per share in Q4 1996. Diluted earnings per share for the fourth quarter rose 38 percent to \$0.29, based on 10.263 million shares outstanding, compared with \$0.21 per share in the fourth quarter of 1996, based on 9.992 million shares outstanding The company's net income for the year was \$9.41 million, compared with a net loss of \$3.15 million in 1996. Aladdin's 1997 earnings per share was \$0.95, compared with loss per share of \$0.32 in 1996. Aladdin's 1997 diluted earnings per share was \$0.93, compared with loss per share of \$0.32 in 1996. Aladdin Knowledge Systems is a global leader in the secure licensing and distribution of digital content. Aladdin's product range includes HASP(R) and Hardlock(R), key-based software security systems which monitor software licensing and prevent unauthorized use of computer programs,

Siemens Energy Taps Sapiens

Sapiens International Corporation N.V. (Nasdaq: SPNSF) announced that Siemens Energy & Automation, a leading supplier of electrical and electronic products and systems, has retained Sapiens to make its order processing and sales and marketing software applications year 2000 compliant. Sapiens successfully completed the analysis phase valued at approximately \$500,000, and will now implement the conversion phase valued at approximately \$750,000, for a total of \$1.25 million. The contract extends the Siemens-Sapiens relationship, which began in 1991 with the joint development by IBM and Sapiens of Siemens' order processing and sales and marketing software applications. "We considered other solutions but we were particularly impressed with the accuracy and flexibility of both the Sapiens automated tools and consulting team, in terms of identifying the changes required and establishing a customized plan of action to fit our specific needs. This is a critical project for us, and with Sapiens, we are confident that we have found the best combination

of tools and professional services," said Ms. Kathy Booe-Kiser, Vice President, Business Processes at Siemens. Sapiens International is a leading provider of enterprise-wide, mission-critical business solutions, consulting, and support services to diverse customers around the globe. The Sapiens Y2K(TM) Toolkit features a single comprehensive repository, including multi-language analysis and remediation and is complemented with Falcon2000(TM), a unique conversion tool that identifies and analyzes statements requiring year 2000 conversions in Assembler programs. Sapiens' year 2000 conversion services are offered on-site, and at the company's Y2K Factory. The company's installed base includes General Accident Insurance Group, Guardian Royal Exchange, Honda, IBM, International Paper, the Israeli Air Force, Nissan, Norwich Union, Principal Financial Group and USAA.

Teva Tumbles on Q4 Earnings Warning

Israel's Teva Pharmaceutical Industries Ltd. fell sharply on a warning its fourth-quarter earnings would be far below forecasts. Teva's American Depository Receipts (ADRs) fell in one trading session by 10-14/16, or 23 percent, to 36-1/4 and was among percentage-loss leaders on the Nasdaq exchange. The company said in a statement it expected to report fourth quarter earnings per share between \$0.30 and \$0.34. A consensus estimate had called for earnings per share of \$0.64. Teva said its results were hurt by several factors, including reduced sales in Israel and the effect of changes in its relationship witl aid

in NICE's share price was due to market concerns about Asia, and was not justified. "Asia accounted for less than five percent of the company's revenues in 1997," he noted. NatWest said it expected NICE's Q4 earnings to reach \$0.39 a share, bringing full-year earnings per share (EPS) to \$1.33. For 1998, NatWest estimates that NICE will post a 28 percent increase in EPS to \$1.70 and a similar rise in 1999 to \$2.20. Helft said NICE shares were currently trading at a price-toearnings (P/E) ratio of 21.3 on 1998 EPS and 16.6 on 1999 EPS based on a share price of \$36.38. "We expect the market to revalue the shares over the next six months, to a P/E of 22 times our 1999 estimates, equivalent to a share price of \$50," he said.

News from NICE

NICE Systems Ltd. (Nasdaq: NICEY) announced that it has unveiled the newest release of its call center performance measurement solution, NiceUniverse version 3.0 during Call Center 98. The product is integrated with NICE's NiceLog and NiceCLS systems, and supports the industry's leading switches including Nortel, Lucent and Aspect.

NiceUniverse is a CTI application that automates call center recording and monitoring and assists management in objective evaluation of agent performance. Actual voice recordings are stored on the NiceUniverse voice/data server, while call details are stored in a Windows NT-compatible database. Agent transactions can be archived and easily retrieved, and calls are played back from the voice/data server to the reviewer's telephone. Other features include: Year 2000 compliance, system alarm notification, free-seating support, flexible scheduling, acceleration/deceleration of playback, silence indications, voice annotations by reviewers, custom report generator, import/export of data and a future migration path for NICE's screen capture functionality. NICE Systems is a global provider of Computer Telephony Integrated (CTI) logging, quality measurement and workflow solutions for voice, fax and data. NICE has its headquarters in Tel Aviv. with offices in the US, Canada and Germany.

Neuromedical Systems Shifts Strategic Focus

Neuromedical Systems, Inc. (Nasdaq: NSI) announced plans for strengthening its market position by focusing resources on expanding the role of PAPNET in the laboratory. Early indications from the European laboratory community, where the PAPNET Testing System has been reintroduced under the brand name PAPNET-on-Cyte(TM), demonstrate that rather than using the services of an NSI-operated scanning center to provide image processing and neural network analysis, laboratories want to implement the analysis instrumentation in their own laboratories. In addition, a number of ongoing and planned European clinical trials are designed to yield data supporting the use of PAPNET technology in the primary screening of cervical specimens. To facilitate the process of incorporating PAPNET-on-Cyte into laboratory operations, NSI has released new software for use outside the United States which allows for unattended operation of the PAPNET scanning station. Furthermore NSI has initiated development of a new scanner configuration which will consolidate all aspects of the PAPNET scanning process into a single, user-friendly operating system. This new system is designed to meet the throughput, work-flow, and cost requirements of laboratory customers, and is expected to be released in Europe and Asia by the end of the third quarter of, 1998.

Record Revenues of \$7 Million; Record EPS of \$0.15 per Share

Crystal Systems Solutions Ltd. (Nasdaq: CRYSF), a leading provider of conversion tools and methodologies for the MVS environment, reported that Q4 1997 revenues increased to a record \$7.7 million from \$1.8 million in the same quarter in 1996. Net income for Q4 1997 increased to a record \$1.7 or \$0.15 per share as compared to a loss of (\$93,000) or (\$0.01) per share in the same period in 1996. For all of 1997, revenues were \$24.4 million compared to \$4.5 of 1996. Net income for 1997 was \$4.9 million or \$0.44 per share as compared to a loss of (\$841,000) or (\$0.12) per share. Crystal Systems Solutions is a member of the Formula Group (Nasdaq: FORTY)

which is the largest public information technology group in Israel. Crystal provides software tools and services that perform complex conversion projects for mainframe computer systems. Crystal's C-MILL tool and methodology as well as its automatic conversion tool kit, presents a comprehensive, cost effective year 2000 conversion solution.

Oshap's Subsidiary's Solution Selected by BNP

Oshap Technologies Ltd. (Nasdaq: OSHSF) announced that its subsidiary, Mint Communications Inc. (MINT), has received an order from the New York branch of Banque Nationale de Paris (BNP) for its intelligent financial solution. BNP's New York branch will use MINT software as an integration platform for its strategic data warehousing project. MINT's content-sensitive messaging hub will be used to interconnect various back and front office systems, to transform, consolidate and "normalize" data, and then to transport data to the bank's centralized data warehouse. MINT's sophisticated Rules Manager will transform the data into a uniform data model which can then be analyzed by the bank's management. Mint Communications Inc. is a leading provider of intelligent solutions which are used by major financial institutions to assure seamless connectivity among incompatible applications over a variety of networks and platforms and to achieve straight-through transaction processing.

Oshap Technologies Ltd. is a growth oriented software group. Oshap focuses on companies with advanced technologies and potential leadership positions in high-growth worldwide software niches. Oshap holds 27.5% of the shares of Tecnomatix Technologies Ltd. (Nasdaq:TCNOF), an Israeli corporation which is a leader in the market for CAPE software products. Oshap is also the majority shareholder in two smaller yet growing software companies providing solutions for certain segments of the financial market — an 81.2% interest in Decalog B.V., a Dutch company which provides software products and consulting services for portfolio management operations, specifically to large financial institutions, and an 81.5%

interest in MINT Technologies (1984) Ltd., an Israeli corporation which develops and markets intelligent information flow solutions for use in financial institutions.

Formula Systems Ltd. Offers 2.8 Million Shares.

Formula Systems Ltd. (Nasdaq: FORTY), a leading provider of information technology products and services, announced the offering of 2.8 million ordinary shares of its subsidiary, ForSoft Ltd., (Nasdaq: FORSF), priced at \$9.00. All of the ordinary shares to be offered will be issued and s

based on the discovery that specific proteins in blood leukocytes are indicative of certain mental disorders. Savyon has been retained to develop a test, based on Mindscape's methods, for measuring and evaluating these proteins. According to research (as reported in the fourth edition DSM IV, American Psychiatric Association 1994), it is estimated that up to 50 million Americans, or 20 percent of the total population, suffer from clearly diagnosable mental disorders to a degree that interferes with their employment. No laboratory test exists to aid psychiatrists in diagnosing mental disorders, according to Healthcare which expects to develop a suitable test. According to the agreement, Mindscape will pay Savyon a total of approximately \$1.5 million in phases over a period of approximately three years, based on the completion of pre-determined milestones. Healthcare Technologies through its subsidiaries, Savyon Diagnostics, Diatech Diagnostics Inc., Gamidor Ltd. and Gamidor UK, specializes in the development, manufacture and marketing of medical diagnostic testing kits and systems for certain infectious diseases, sexually transmitted diseases, urinary tract infections, respiratory illnesses and a range of tests for thyroid and steroids. It also develops, manufactures and markets products used in clinical chemistry and pathology laboratories. Healthcare's products are marketed in Israel, Europe, Asia, and the United States.

Wolf Prize in Medicine to Weizmann's Sela & Arnon

Profs. Michael Sela and Ruth Arnon of the Weizmann Institute of Science have been awarded jointly the 1998 Wolf Prize in Medicine. The prize committee announced that Sela and Arnon are being honored "for their major discoveries in the field of immunology". In citing their achievements, the committee noted that the two scientists were the first to introduce synthetic polypeptides, or protein fragments, into immuno-logical research. Through their concept of synthetic vaccines, they paved the way for the production of safe and effective vaccines against infectious diseases, as well as specific peptides for autoimmune disorders. The prize committee also cited Sela and Arnon for developing Copaxone (copolymer-1), a

new drug for the treatment of multiple sclerosis. The Wolf Prize, which is bestowed annually for outstanding achievements in agriculture, chemistry, mathematics, medicine, physics and the arts, and involves an award of US\$100,000, will be presented to Sela and Arnon by President Ezer Weizman at the Knesset, Israel's parliament, on May 10. Two other Weizmann Institute scientists are among the previous recipients: Prof. Leo Sachs (1980) and Prof. Meir Wilchek (1987), also for achievements in medicine.

SCIENCE CORNER

"Green" Approach may Improve Cancer Therapy

A promising cancer therapy, which destroys tumors by exposing them to light, may be significantly improved thanks to new materials developed at the Weizmann Institute of Science. Institute scientists reported on the new development at the Conference on Chemical Modifiers of Cancer Treatment. Photodynamic therapy or PDT, in which light activates cancer-killing drugs, has generated enormous interest in the medical world in recent years. However, currently PDT has several limitations: it is effective only against relatively flat and thin tumors, such as certain types of skin and bladder cancers, and patients undergoing PDT must avoid the sun for weeks following treatment because their skin becomes overly sensitive to strong light. The new materials, derived from chlorophyll, the green pigment that allows plants to capture sunlight, may now overcome these problems. These "green" materials may make it possible to apply PDT to bulky, solid tumors. Moreover, patients may need to avoid the sun for only a day or two after therapy. The materials, developed by Profs. Avigdor Scherz of the Institute's Plant Sciences Department and Yoram Salomon of the Biological Regulation Department, were shown to kill cancer cells in tissue culture and in mice. The Dutch company Steba Beheer NV is now developing them for clinical use worldwide. "If successful, in the future our 'green' PDT could be a powerful new tool in the struggle against cancer," says Prof. Scherz.

Minimizing side effects

PDT uses drugs that become toxic only when exposed to light. First, the drug is injected into the bloodstream or the tumor. Then, the tumor is exposed to light in a controlled manner. As a result, the drug is activated and destroys tumor cells while having little effect on healthy tissues. "The great advantage of this treatment over conventional chemotherapy is that the drug's action is confined to the illuminated tumor site, so that the damage to healthy tissues is minimized and side effects are significantly reduced," says Prof. Salomon.

A precise delivery

To deliver their materials precisely to the desired site, the scientists attach them to antibodies, or other molecules, that act as "guided missiles", transporting the "green" materials to the target in the body. When illuminated, the new materials were found first, to destroy the blood vessels that feed the tumor thus preventing the tumor from developing or even surviving, and then, to destroy the tumor itself. The materials have successfully eradicated relatively large malignant melanoma tumors in mice. In tissue culture, they destroyed other cancer cell types, including breast and colon. The effectiveness of the new materials in humans will soon be tested by Steba Beheer NV, which is planning to conduct clinical trials worldwide.

Iomega Adopts Zoran's Video Compression Chip

Iomega(R) Corp. (NYSE:IOM) has commenced US shipments of Buz(TM)multimedia producer for the PC. Buz is the industry's first video capture solution to combine ultra SCSI and hardware video compression in an integrated solution and is designed to let consumers easily capture, edit and share videos, digital photos and sound using their own PC. To make Buz available to the widest range of customers, Iomega is offering Buz at an unprecedented US street price of \$199. Buz multimedia producer is a combination video capture card, Ultra SCSI controller and software suite that offers one of the easiest ways to get home movies, photos and music from camcorders, DVD-ROMs, digital cameras, VCRs and laser discs into a per-

sonal computer. Some of the fun and unique creations consumers can produce with Buz include contemporary masterpieces using home videos; feature videos; audio postcards to share over the Internet; birthday cards, calendars, photo albums and invitations using digital photos; and personal presentations and reports.

The Power of Hardware

Buz multimedia producer uses a powerful video compression chip set supplied by Israel's Zoran Corp. (Nasdaq:ZRAN). This is a version of Zoran's industry-leading motion JPEG chip set, including code and video PCI controller, which enables recording of high-quality digital video on the storage medium, and accelerates the editing and personalization of the movie content. The movies can also be viewed using Zoran's JPEG software movie player. Buz multimedia producer is a full-featured Ultra SCSI controller with proven Ultra SCSI technology supplied by Advanced System Products, Inc. Featuring plugand-play support and an innovative GUI installation interface, it

allows consumers to effortlessly connect Jaz drives, Zip drives and other SCSI devices to a PC.

GE Agrees to Acquire Elbit Medical Imaging Division

GE Medical Systems, a unit of General Electric Co. (NYSE:GE) said it signed an agreement to acquire Diasonics Vingmed Ultrasound Ltd., a division of Elbit Medical Imaging Ltd. (Nasdaq:EMITF), for \$230 million. Elron Electric Industries Ltd. (Nasdaq:ELRNF) noted that EMITF is a 40%-held affiliate. The company said the transaction is expected to close by April.

Tadiran Tel Considering South Korea Plant

Israel's Tadiran Telecommunications Ltd. said it might shortly begin manufacturing in South Korea to prevent the key Asian market from slipping out of it hands. A company executive said the prospective joint venture manufacturing operation would serve other markets in addition to South Korea for the company's line of advanced telecommunications equipment. He said the venture would likely be with one of the company's Korean

distributors. South Korea is encouraging local manufacturing to avoid spending foreign currency. An advantage is that because of the won's devaluation, local expenses are much lower. Tadiran Telcom, a unit of Israel's Tadiran Ltd. (NYSE: TAD) reported a drop in fourth-quarter earnings to \$0.09 a share from \$0.15 a share a year earlier as revenues fell six percent to \$96 million. Earnings were below analysts' consensus estimates of \$0.14 a share. Thailand, Indonesia, as well as South Korea, accounted for about 14 percent of the company's 1997 revenues. Analysts have said the Asian markets were more crucial to Tadiran Tel than the proportion of total revenues suggested. They said the region was considered the company's key growth market as it sought to reduce reliance on sales to Bezeq.

Orbotech Announces Record Results

Orbotech Ltd. (Nasdaq:ORBKF) announced consolidated financial results for Q4 and full year ended December 31, 1997. Revenues for Q4 were \$53.1 million, an increase of 37% from the \$38.8 million recorded in Q4 1996. Net income for the Q4 1997 totaled \$10.0 million, or \$0.71 per share, an increase of 75% compared with net income from Q4 1996, excluding an \$8 million gain from the sale of the company's holdings in Opal, Inc., of \$5.7 million, or \$0.44 per share. Including this capital gain, reported net income for the 1996 was \$13.7 million, or \$1.06 per share. Revenues for the full year ended December 31, 1997 were \$190.8 million, an increase of 29% from \$148.2 million recorded in 1996. Net income for the full year totaled \$34.6 million, or \$2.52 per share, an increase of 72% compared with net income for the full year, excluding an \$8 million gain from the sale of the company's holdings in Opal Inc., of \$20.1 million, or \$1.54 per share for 1996. Including this capital gain, reported net income for 1996 was \$28.1 million, or \$2.16 per share. Sales from automated optical inspection systems for the manufacture of printed circuit boards increased by 44% as compared with the fourth quarter of 1996. The company delivered three inspection systems for flat panel displays during the quarter, and 15 systems during the full year, compared with 3 systems throughout all of 1996. Q4 1997 revenues include initial sales of Orbotech's new shadow mask inspection systems. In addition, revenues include the fully consolidated results of Orbotech-Schuh GmbH. Orbotech Ltd. is a leader in the design, development, manufacture and marketing of AOI systems for use in the manufacture of PCBs, and is a leading manufacturer of computer-aided manufacturing systems and laser plotters for PCB production. In addition, the company is a leading manufacturer of AOI systems for use in the production of liquid crystal flat panel displays and is applying its proprietary AOI technologies to other applications both within and outside the electronics industry.

Tadiran Telecommunications Ltd. Results

Tadiran Telecommunications Ltd. (Nasdaq: TTELF) announced results for Q4 and full year ended December 31, 1997. Sales for Q4 1997 were \$96 million compared to \$102.1 million for Q4 1996. Operating income was \$2.9 million versus \$2.4 million for the same period last year. Net income was \$2.3 million, or \$0.09 per share, as compared to \$3.7 million, or \$0.15 per share, in Q4 1996. Gross margin for the quarter improved to 29.4% from 27.7% for the same period last year.

Q4 results reflect the continued reduction in sales to Bezeq, which declined by 34% to approximately \$20 million compared with \$29 million in Q4 1996. As previously announced, the company experienced a shortfall in export revenues due to the weakness in Asian markets, especially South Korea. As a result total export sales of approximately \$53 million were nearly unchanged compared to Q4 1996, and represent 55% of sales, as compared to 52% in Q4 1996. A gain in total export sale had been expected. Sales for the full year ending December 31, 1997 were \$444 million, compared to \$468.6 million in 1996. Operating income was \$29.1 million versus \$49.2 million in 1997. Net income for 1997 was \$23.9 million, or \$0.95 per share, as compared to \$41.4 million, or \$1.74 per share, for the same period in 1996. Gross margins for 1997 improved slightly to 31% from 30.6% in 1996.

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