SENATE COMMITTEE
ON
ECONOMIC DEVELOPMENT

SUBCOMMITTEE ON PRIVATE SECTOR BUSINESS FINANCING

INTERIM REPORT TO THE

77TH TEXAS LEGISLATURE

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INTRODUCTION

Lieutenant Governor Rick Perry presented four charges for interim study to the Senate Committee on Economic Development. Senator David Sibley, chairman of the full committee, appointed a special subcommittee to address the first charge which is as follows:

> *Study trends relating to the availability of private sector business financing in an effort to find ways to promote entrepreneurship, job creation, and economic development in Texas.*

Inherent in this charge is determining ways the *public sector* can assist in expanding the availability of *private sector* capital and economic growth. Early in the subcommittee's work, it became clear that states most successful in promoting entrepreneurship and economic development are active partners with private industry in developing new technology products and services. It is not the role of government to become the financier of businesses through direct commitment of taxpayer dollars, but government can have an impact on business growth.

Policy makers, in light of the rapidly developing economy, have an initial decision to make as to whether the goal and focus of state investment is job creation and economic development or maximizing financial profit. When attempted in other states, government has demonstrated a very poor track record as a direct investor. The best programs focus on access to capital, not the cost of capital, and adopt the philosophy that the companies that are growing most rapidly and are the most profitable produce the most desirable economic development. Government support and policy direction, combined with private sector market discipline, are an effective formula for economic development.[1]

The subcommittee, in developing this report, worked through several specific issues in arriving at its recommendations:

What type of businesses are most in need of capital financing?

A significant roadblock to technology development and production is adequate, early-stage financing. The subcommittee heard testimony on the difficulties some small businesses have in attracting capital, but those difficulties often correlate to the type of capital sought. The standard sources of capital include personal debt, bank lending, angel investors, venture capital, tax credits, and others.

What type of capital is most appropriate and available to businesses?

Depending on the size of the capital need and the stage of the business, businesses will find capital available from sources targeting their size or type of business. Some entrepreneurs will find their own

[1] Heard, Robert and John Sibert, Ph.D. "Growing New Businesses with Seed and Venture Capital: State Experiences and Options." Page 18. Internet on-line. Available from <http://www.nasvf.org> [25 May 2000]

personal credit line (through personal savings or bank-issued credit card) as the most logical source of capital. Others might be able to persuade a wealthy individual investor (angel) or network of investors to provide seed capital. But for a company to tap into the wealth of venture capital, it must usually be established and be able to show a healthy revenue stream already in place. Whereas angel investors can be counted on for investments in the tens of thousands of dollars, venture capitalists do not usually get involved with companies until a company's business plan can demonstrate annual revenues of $10 million or more.

What direct assistance can the state provide to increase access to capital?

Some states have initiated successful capital access programs, but there have also been some dismal failures. Elected officials are entrusted with the authority to manage the public's tax dollars, and that responsibility requires good stewardship of limited dollars to meet overwhelming public needs. As a result, it is unrealistic to expect the public to support the direction of millions of their dollars to high-risk capital ventures. Instead of direct appropriations, states use tax incentives which have provided for differing success in economic development depending on a state's particular tax structure. In addition, some states have taken more liberal approaches to investment policies for some of their public pension funds. In Texas, those funds are closely managed with conservative investment policies which cause them to shy away from providing seed capital.

What other creative ways can the state create economic development?

Those whose careers have been spent as investors or lenders are better qualified to positively impact the business development market than a prescribed set of regulatory policies from government. States continue to look for creative ways to capitalize on economic development investments. Some have created foundations, some directly allocate state funds for seed capital, and others dedicate state revenue from oil and gas or lottery revenues, and recently states have begun earmarking tobacco settlement dollars for technology development investments.[2] In the past 20 years, states have used the intellectual and technological wealth within their university systems to create economic growth. Commercialization of university research will attract capital and potentially provide for economic development opportunities.

The Subcommittee on Private Sector Business Financing was chaired by Senator John Carona with Senator David Sibley and Senator Troy Fraser as fellow members. The Subcommittee held two hearings in Austin, soliciting public comments from invited guests and the general public. This report is a summary of the important issues along with recommendations for the 77th Texas Legislature to consider in making capital more accessible to businesses in Texas and stimulate new technology growth.

[2] Heard, Robert and John Sibert, Ph.D. "Growing New Businesses with Seed and Venture Capital: State Experiences and Options." Pages 15-16. Internet on-line. Available from <http://www.nasvf.org> [25 May 2000]

EXECUTIVE SUMMARY

The Subcommittee on Private Sector Business Financing held two hearings in Austin, inviting representatives from state government, business associations, and private business to share their thoughts and suggestions for increasing capital access and economic development in Texas. The general public was also provided an opportunity to be heard on this issue. Based upon the material presented during testimony and from written materials submitted, along with independent research, the subcommittee agrees to forward the following recommendations to the full Senate Committee on Economic Development and the 77th Texas Legislature:

Recommendation One: Create statutory reauthorization of the Texas Product Development Fund and Texas Small Business Incubator Fund.

Recommendation Two: Establish Certified Capital Companies (CAPCOs) in Texas.

Recommendation Three: Provide investment tax credits for investments in qualified Texas companies.

Recommendation Four: Encourage greater commercialization of university research in Texas through increased incubation efforts.

BACKGROUND

There is extensive information available regarding different ways to provide capital financing and encourage economic development. This background report discusses several capital financing trends and examines potential sources for capital financing in Texas.

Economic Growth in Texas

The last ten years have witnessed a time of unprecedented economic growth and expansion in Texas. Statistics do not tell the whole story, but help put this growth into perspective:

- The Texas population has grown to more than 20 million residents, an increase of more than 3 million since 1990.
- Three of the ten largest U.S. cities are in Texas: Houston, San Antonio, and Dallas.
- Texas has added more manufacturing jobs since 1990 than any other state.
- Texas added more than 132,000 high technology jobs from 1993 to 1998.
- Texas is second in the number of high tech workers, totaling 411,000.[3]
- Richardson's Telecom Corridor has the nation's highest concentration of telecommunication's firms - more than 350 within a two-square-mile area.
- Texas is the nation's second largest producer of electronic components.
- Texas is the nation's second leading exporter.[4]
- Texas ranks fourth in the nation for total amount of venture capital funding[5].

This growth has created tremendous economic opportunity as Texas is enjoying a remarkably low unemployment rate. The rate was 4.5 percent in April 2000, representing the lowest figure for April since 1979.[6] Although prolonged low unemployment has placed some strain on the state's ability to provide an adequate labor force for certain sectors, it is one more indicator of Texas' strength in attracting new business and encouraging expansion of existing business.

This type of growth has been created and sustained due to state and local governments, local communities, business leaders, and others working together to create a healthy business climate. However,

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[3] "Texas now second in high-tech jobs." *Houston Chronicle*, May 18, 2000

[4] Texas Department of Economic Development. "Texas Overview." Internet on-line. Available at <http://www.tded.state.tx.us/TXoverview/> [January 18, 2000]

[5] Weil, Jonathan. "Austin Draws Lion's Share of Capital." *Wall Street Journal*. 15 May 2000

[6] Oldham, Charlene. "Jobless rate persistently low in Texas." *Dallas Morning News*. 19 May 2000

continuation of the economic good times depends upon public policy makers expanding ways for Texas to compete with other states for new business. Economic growth is contingent upon numerous factors including a favorable tax climate, an available skilled workforce, a reasonable regulatory environment, commercialization of new technology, and access to adequate capital.

Small Business: Engine of Economic Growth

As ways are examined to increase sources to stimulate economic development, it is useful to understand which businesses are creating the job growth. From the mid 1960s through the mid 1980s, employment at Fortune 500 companies declined by approximately 5 million jobs, while small business added about 35 million jobs.[7] In Texas, small businesses with fewer than 100 workers account for more than 420,000 businesses, nearly 97 percent of all businesses in Texas.[8] Job creation and growth do not always correlate into revenue growth, but the type of business and product or service offered will often determine the capital need.

Typical Sources of Capital Financing

There are three traditional sources for business capital:

- **Loans/debt**--borrowing money is a logical starting point for raising necessary startup capital, but this is not always an easy or attractive source. For one thing, repaying those loans will consume the early cash flow straining a startup company's financial bottom line. In addition, even with a well-packaged business plan, some banks may be hesitant to provide seed capital due to concerns with a company's ability to repay the loan in a timely manner. Local chambers of commerce are a good resource for this type of lending as many have established partnerships with banks and other lending institutions in an effort to provide financial resources to local businesses. Individual investors are also a potential source for capital lending. Small businesses looking for capital in the thousands or hundreds of thousands range will most likely find debt financing most readily accessible.
- **Equity**--this type of financing eliminates the regular debt service payments required by loans, but could be more costly depending on the success of the business. Equity financing is accomplished by exchanging a percentage of ownership in the company for capital. This type of financing is attractive for companies that are in the early stages of development and need more time for initial production and revenue flow. However, in exchange for this type of financing, a business owner must share decision-making and ownership with the investor or investors. *(See "Basic Forms of Risk Capital" below for further discussion.)*
- **Grants**--this is an attractive form of financing since it does not require repayment; but grants are limited and only available for qualified applicants.[9]

[7] "The CAPCO Program: A Multi-State Perspective." Growth Capital Alliance, March 1999.

[8] Statistics submitted by the *Business Success Center* (Austin, Texas), 2nd Quarter 1999 totals

[9] Texas Comptroller of Public Accounts. "Texas Business Advisor." Internet on-line. Available at <http://www.cpa.state.tx

The size and type of business will often determine which financing options, or combination of options, are available and most attractive. The ability to obtain adequate financing will depend upon thorough organization and focused presentation of a business plan able to convince banks or potential investors of the success of the business venture.

Basic Forms of Risk Capital

Research and Development Capital--funds invested in support of basic research and development.
Innovation Capital--funds invested for applied research to develop new products.
Seed Capital--funds invested to support new and young companies without fully established commercial operations, launch new products, or continue research and product development.
Venture Capital--long-term equity capital invested in rapidly expanding enterprises with an expectation of significant capital gains, often for product roll-out. Typical investee companies have demonstrated sales but are not yet profitable.
Mezzanine Capital--capital invested with a structure involving subordinated debt, generally in profitable, established companies.[10]

Venture Capital

Upstart entrepreneurs dominate the most rapidly growing segments of our economy. Young, high-growth firms require large amounts of outside capital long before they can tap into traditional sources of debt from banks or public stock equity. Private equity from individuals or venture capital companies fill this funding gap.[11]
Angels--Angels are typically wealthy individuals with sufficient discretionary capital who prefer to invest in startup businesses rather than traditional investment alternatives. Angel investors are usually willing to risk safety for a higher rate of return on their investment, a philosophy often incompatible with the priorities of venture capital funds. Most angels have first-hand knowledge of the risks of entrepreneurship or extensive knowledge about the individual seeking the funding or the technology being developed. For the entrepreneur seeking under $2 million, an angel may be the best source of capital. According to the National Venture Capital Association, angels invest over ten times the amount invested by venture capitalists in business startup and expansion each year. Some invest only a few thousand dollars while

.us/tba/finance.html> [22 May 2000]

[10] Heard, Robert and John Sibert, Ph.D. "Growing New Businesses with Seed and Venture Capital: State Experiences and Options." Pages 9. Internet on-line. Available from <http://www.nasvf.org> [25 May 2000]

[11] Heard, Robert and John Sibert, Ph.D. "Growing New Businesses with Seed and Venture Capital: State Experiences and Options." Pages 7. Internet on-line. Available from <http://www.nasvf.org> [25 May 2000]

others invest over one million dollars in one project.[12] It is also common for angel investors to join together, as is the case with The Capital Network(TCN) located in Austin. TCN is one of the largest regional matchmaking services. It operates as a non-profit, economic development organization to provide entrepreneurs with training and access to venture capital.[13]

Venture Capital Funds--Venture capital plays only a minor role in funding basic research. According to Harvard Business Review, only six percent of the $10 billion invested by venture capitalists went to start-ups. The majority of investments went to follow-on (or mezzanine level) funding for projects developed by individual investors, public research centers, and private corporations. Venture capitalists usually invest only in high-growth business sectors where they can see a rapid (five years or less) return on their investment.[14] In the past, investors in startups wanted to earn a 10-fold return on their investments over three to five years. Today, those expectations are a 25-fold return within 18 months.[15]

Public Funds

Texas, like other states, has numerous public sector funds. The Employees Retirement System, Teacher Retirement System, and the Permanent School Fund are just three examples of funds with multi-billions of dollars in available assets. However, the importance of these funds and the members they support require careful consideration by their managing boards before investments in private stock enterprises are made. As a result, attempts to use these assets for seed capital investments would violate the "prudent investment" guidelines which govern the investment practices of these funds.

UTIMCO--Created in 1996, The University of Texas Investment Management Company (UTIMCO) is the first external investment corporation in the nation formed by a public university system. As its mission, it manages investments totaling in excess of $13 billion, including the Permanent University Fund, the Permanent Health Fund, the Long Term Fund, the Short/Intermediate Fund, the Short Term Fund, and other assets. UTIMCO is governed by a nine-member board of directors which includes five investment professionals. UTIMCO is responsible for managing investments in compliance with UT Board of Regents' approved investment policies. The investment focus is on generating real economic returns over time through reducing overall portfolio risk.[16]

Texas Growth Fund--Article XVI, Section 70 of the Texas Constitution, created the Texas Growth Fund (TGF) in 1988, a private sector trust fund. The fund is managed by a board of trustees consisting of four public members appointed by the governor and one member each elected by the Board of Regents of The

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[12] Tomlin, Barb. "Angels Flying Close to the Ground With Money for You!" Internet on-line. Available at <http://www.westward.com/library/angel.htm> [26 May 2000]

[13] Greater Austin Chamber of Commerce. "Do Business in Greater Austin." Internet on-line. Available at <http://www.austinchamber.org/Do_Business/Business_Resources/Financial/> [24 April 2000]

[14]Heard, Robert and John Sibert, Ph.D. "Growing New Businesses with Seed and Venture Capital: State Experiences and Options." Page 11. Internet on-line. Available from <http://www.nasvf.org> [25 May 2000]

[15] Bills, Steve. "Finding help for startups." CNNfn. Internet on-line. Available at <http:/www.cnnfn.com> [24 May 2000]

[16] UTIMCO. Internet on-line. Available at <http://www.utimco.org/> [26 June 2000]

University of Texas System, the Board of Regents of The Texas A&M University System, the Board of Trustees of the Teacher Retirement System, the Board of Trustees of the Employees Retirement System, and the State Board of Education.[17] TGF Management Corporation in Austin manages the fund which consists of three private equity funds with committed capital in excess of $575 million. TGF focuses investments solely on companies that do business in Texas, but are not necessarily required to have their headquarters in Texas. TGF prefers to invest in established, well-managed companies that have demonstrated annual revenues of $15 million to $250 million.[18]

State Investment Pools

Texas is cautious relative to its policies directing investment of public pension funds. For this reason, the state has little or no track record of providing direct support of new technology or industry. Other states have decided to take greater investment risk and opted to create state investment pools to provide venture capital.

In Wisconsin, the State of Wisconsin Investment Board (SWIB) has decided to make $50 million available from the Wisconsin Retirement System Trust Fund for investment into private life sciences and technology entities domiciled in Wisconsin and the Midwest. The Board, which is a state agency directed by a Board of Trustees and staffed with professional money managers, is currently contracting with venture capital managers who will work independently on behalf of the Board.[19] The State of Michigan, through the Michigan Strategic Fund, has also invested pension funds in private seed and venture capital partnerships.

The challenge of these investments is employing skilled managers to operate the funds or finding the right private partners to manage these public investments. Otherwise, a state runs the risk of politics infecting the investment decisions and jeopardizing the fund's success.

U.S. Small Business Administration

The U.S. Small Business Administration (SBA) provides numerous levels of assistance to businesses and entrepreneurs. One of the most utilized programs is the Small Business Development Center (SBDC) Program which SBA administers to provide management assistance to current and prospective small business owners. There are 57 small business development centers across the country, four in Texas, with a network of nearly 1,000 service locations. A lead organization coordinates the services through a network of subcenters and satellite locations. Subcenters are located at colleges, universities, community colleges, vocational schools, chambers of commerce, and economic development corporations. Each center is fully staffed and capable of providing counseling, training, and technical assistance in all aspects of small business management. Special SBDC programs and economic

[17] Texas Constitution, Article XVI, Secs. 70(b)-(c)

[18] Texas Growth Fund. Internet on-line. Available at <http://www.texeasgrowthfund.com> [16 June 2000]

[19] State of Wisconsin Investment Board, "Request for Proposal," Venture Capital Investment Advisory Services, February 1, 2000, pp. 3-6.

development activities include international trade assistance, technical assistance, procurement assistance, venture capital formation and rural development. *(For a full listing of financing options available through SBA, visit the SBA's website at <http://www.sbaonline.sba.gov/financing/>)*

Texas Department of Economic Development

The State of Texas, through programs administered by the Texas Department of Economic Development, has created two lending sources to help meet demand for business financing:

> **Capital Access Fund**--this fund was established by the 75th Legislature as a public/private partnership between the State of Texas and lending institutions to assist "near bankable" businesses in accessing needed capital. Qualified businesses must have fewer than 500 total employees and 51 percent of them must be Texas residents. There is no limit on the loan except what the lender feels comfortable in lending the business.
>
> **LinkedDeposit Program**--this program was established to encourage lending to qualified businesses, which are historically underutilized businesses, child care providers, non-profit corporations and small businesses located in Enterprise Zones, by providing lenders and borrowers a lower cost of capital. Loan amounts range from $10,000 to $250,000. Eligible businesses may use the proceeds of a Linked Deposit loan for a variety of needs. Once approved for the loan, a business can use the Linked Deposit Program by having the state deposit an amount of money equal to the loan amount with the lender. The state then requests a lower interest rate for the deposited money and the business owner receives the interest savings.[20]

In addition to these two loan programs, TDED has numerous other resources for small businesses including written publications, databases for financial assistance, and other helpful directions for those interested in relocating or beginning a business in Texas.

Sales Taxes and Tax Abatements Used for Economic Development

Local chambers of commerce and economic development corporations understand the importance of attracting new business to their community. Ideally, local communities will compete interstate rather than intrastate so as to benefit the entire state through successful economic growth. One of the ways used by cities is through dedication of local sales tax revenue to economic development projects. Although authorization for using local sales taxes for economic development has only been in effect since 1989, by 1998 over 378 cities had levied an economic development sales tax. Those cities raised in excess of $200 million additional sales tax revenue through creation of either Section 4A or Section 4B (or both) development corporations funded through an increase in the local sales tax dedicated to economic development or civic and commercial projects.[21]

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[20] *"Finance: Forging financial partnerships between the State of Texas and Texas communities, businesses, and lenders."* Texas Department of Economic Development.

[21] *The Attorney General's Handbook on Economic Development Laws for Texas Cities, Volume 1.* 1998 Edition. Pages 2-3.

In addition to sales tax options, local governments may also use tax abatements within designated "reinvestment zones" to attract new industry or encourage the development of existing businesses. Tax abatements are essentially agreements local governments make to forego property taxes on the increase in valuation a company creates on a piece of property through it establishment or expansion. For example, if a business builds on a piece of property that was valued at $100,000 and the business increases the value of that land to $300,000 the local government can agree to only tax them on the original $100,000 value. By 1998, over 700 tax abatements had been executed by Texas local governments and these were credited with producing over 220,000 new or retained jobs.[22]

While some question the real economic return on these local investments in economic development, these investments have been effective in attracting new industry and commercial enterprises to Texas cities. However, the fact remains that neither of these options would be effective in meeting fundamental financing needs for businesses, especially those in high-growth, new technology fields which need infusions of immediate capital.

Conclusion

After analyzing the various options and roles available for government to successfully expand access to business financing, it is clear that there are too many risks for a state to commit direct appropriations for startup business capital. However, a state can encourage increased partnerships with the private sector through targeted loan programs, expansion of investment tax credit programs, and increased technology transfer at research institutions.

[22] *The Attorney General's Handbook on Economic Development Laws for Texas Cities, Volume 1.* 1998 Edition. Page 95.

Recommendation One

Create statutory reauthorization of the Texas Product Development Fund and Texas Small Business Incubator Fund.

Overview: Article XVI, Section 71 of the Texas Constitution, created the Texas Product Development Fund (PDF) and Texas Small Business Incubator Fund (SBIF). Under this article, the state is authorized to issue up to $25 million in bonds for funding the PDF and an additional $20 million for the SBIF. Although these bonds were authorized in 1989, they were never issued. The Texas Department of Commerce was empowered through enabling legislation to manage both funds, but when the Department was abolished (through the sunset process) in 1997 (and the Department of Economic Development was created in its place) the enabling legislation for management of these funds was eliminated. Since the funds are still authorized in the Constitution and count toward Texas' bond rating, it makes sense to utilize them. Technology continues to develop and fields such as biotechnology are emerging as a high growth sector. It makes sense for Texas to seek ways to attract these businesses and research opportunities. By doing so, it should also attract capital.

In reestablishing these funds, the Texas legislature can examine the structure of successful funds run by other states. For example, the Maryland legislature created programs for direct investment in Maryland companies. The Investment Financing Group was organized in 1995 to manage the investments through three programs: *Challenge Investment*; *Enterprise Investment*; and *Maryland Venture Capital Trust*. The *Challenge Investment Program* may invest as "seed money" in a technology-driven Maryland Company. Matched with $50,000 from a co-investor, the program provides a new business with $100,000 in capital with the investment being repaid over a ten-year period. Recipients of this program are typically small start-up companies that do not have access to bank financing. This fund is helpful in providing small start-up companies with funding to cover the costs associated with bringing a new product to market.

The *Enterprise Investment Fund* provides investments in emerging first and second stage high technology businesses in partnership with private investors. Under this fund, the Department of Business and Economic Development makes direct equity investments ranging from $150,000 to $500,000 requiring a three-to-one co-investor match. The investment decisions are based on the potential return, the range of economic development, and the number of jobs that will be created.

The *Maryland Venture Capital Trust* was formed in 1990. The Trust provides an opportunity for Maryland state and local public pension funds and the State of Maryland and its political subdivisions to invest a portion of their funds in venture capital investments.[23] This fund is similar to the Texas Growth Fund.

The logical agency in Texas to administer the PDF and SBIF is the Texas Department of Economic Development (TDED), but the Legislature has an important decision to make on whether or not to

[23] Maryland Department of Business and Economic Development

reauthorize the department or transfer some of its duties to other agencies doing similar work. In fact, the Sunset Advisory Commission recently recommended that the Legislature transfer TDED's tourism and job training functions to other agencies.[24] Regardless of that decision, the core function of the department remains to serve the state as the central source of economic development information as well as provide financial, location, and export assistance to Texas' businesses and communities. Placing clear statutory direction and guidelines for operation of the PDF and SBIF would provide the department another means of fulfilling its mission.

(Copies of the Maryland statutes/guidelines are included in report as Appendix A)

There are serious considerations when exposing public funds to the risks of venture or seed investing, and states must make certain those risks are limited. While placing public funds in the hands of qualified, private managers can lessen those risks and produce positive economic benefits for the state, it does not eliminate the legitimate concerns. Critics argue that private managers may undermine the state's economic development objectives as their attempts to maximize profits may target specific industries and investments stages, thereby shortchanging other businesses.[25] That is why the state must exercise due diligence in hiring qualified private managers, but leaving in place sufficient oversight regulations to make certain the monies are protected but fully utilized to meet the objective of economic development.

Summary: Authorize the Texas Department of Economic Development to administer and manage the issuance of bonds funding the Texas Product Development Fund and Small Business Incubator Fund.

[24] Texas Department of Economic Development, Sunset Advisory Commission Staff Report, 2000, Page 1.

[25] "Public Involvement in Venture Capital Funding: Lessons from Three Programs." Rural Policy Research Institute. November 1999. Page 9.

Recommendation Two
Establish Certified Capital Companies (CAPCOs) in Texas.

Overview: Certified Capital Companies (CAPCOs) are state-regulated, privately-owned and operated venture capital funds. The function of these funds is to invest in early stage companies. One of the attractive features of CAPCOs is the fact that these funds invest solely in companies whose business operations are in-state. Entities such as investment management firms, banks, and other financial institutions can be designated as CAPCOs. Insurance companies investing in CAPCOs are provided tax credits against their premium tax liabilities. The premium tax is a "sales tax" assessed on revenue from insurance company policies. Insurance companies pay this tax regardless of whether their business operates at a profit or loss.

CAPCOs function like venture capital funds, whereby entrepreneurs present their business plans in seeking seed capital. The CAPCOs then determine which companies have the highest potential for success and rapid growth, but invest in a variety of companies including manufacturing, service, retail, transportation, etc. CAPCOs are distinguished from regular venture capital firms in that they target and invest only in *small business*, *in-state* companies. The CAPCOs work closely with banks, later stage venture funds and economic development organizations in identifying and developing companies in which they invest. Although CAPCOs are subject to state oversight, the state has no direct investment activity role. The state's oversight consists of requiring CAPCOs to file periodic reports and financial statements making them subject to an annual compliance examination.

The most common form of CAPCOs provides insurance companies tax credits against their premium tax liability for their investment. Insurance companies make attractive investment targets because they control large pools of money that need to be invested in long-term financial assets. In addition, premium taxes are a stable and positively trending revenue stream available for states. Five states have initiated CAPCO programs in recent years and several more are considering them. In Louisiana, 24 certified capital companies have been created since the program began in 1998. Those CAPCOs have raised $286 million in capital and generated an additional $570 million in follow-on capital. In Missouri, seven CAPCOs have been created since 1997 and these have raised $100 million in capital. Follow-on capital as a result of the investments is more than $165 million. New York, Wisconsin, and Florida have just begun their CAPCO programs.

Modeling done by Regional Economic Modeling, Inc., indicates that revenue from CAPCO programs exceeds the cost of the tax credits granted to create them. In addition, for five consecutive years, Coopers and Lybrand's Annual Economic Impact of Venture Capital Study has demonstrated that job growth from technology infrastructure alone is exponential. [26]

[26] "The CAPCO Program: A Multi-State Perspective." Growth Capital Alliance, March 1999.

One of the challenges facing states that enter into investment entities such as CAPCOs is making certain the investment decisions are de-politicized. CAPCOs provide a level of shielding from politics since the investments are simply deposited in the CAPCO and the company board or director makes the determinations on investing.

CAPCOs have provided participating states a new source of capital without requiring a current appropriation or bond sale. However, some question the cost (in foregone state revenue) of providing this capital and the advantage CAPCOs then have over other venture capital providers through the subsidized, lower cost of capital provided by the state to CAPCOs.[27]

Senate Bill 899, introduced in the 76th Legislative Session by Senator David Sibley, would have created Certified Capital Companies in Texas. Modeled after the legislation passed in other states, this bill would have allowed the Department of Insurance to license CAPCOs for investing in small businesses. Fifty percent of the qualified investments would have been for early stage businesses. The investment in certified capital would earn a one hundred percent credit against the company's state premium tax liability. The certified investor would be allowed to take up to 10 percent of the tax credit in any taxable year, with the premium tax credits being allowed to be carried over indefinitely until they are used. The Comptroller of Public Accounts was charged with administering the CAPCO program.

(A copy of the engrossed version of SB 899 is attached as Appendix B for review.)

Summary: Authorize CAPCOs in Texas funded through premium tax credits for insurance companies.

[27] "Public Involvement in Venture Capital Funding: Lessons from Three Programs." Rural Policy Research Institute. November 1999. Page 11.

Recommendation Three

Provide investment tax credits for investments in qualified Texas companies.

Overview: In 1999, the Texas Legislature passed SB 441 providing for five business franchise tax credits: a research and development (R&D) credit, a credit for day care/child care expenses, a job creation tax credit, an investment credit, and a credit for contributions to before and after school programs. The legislation also provided an exemption from the state franchise tax for small corporations and provided several sales tax exemptions.

The three targeted for economic development purposes are the R&D credit, the job creation credit, and the capital investment credit. The job creation and capital investment credits are only available for expenditures made in strategic investment areas (a county with above state-average unemployment and below state-average per capita income or an area federally designated as a urban-enterprise or urban-enhanced enterprise community). The R&D credit allows companies to claim a credit for incremental qualified research expenses and basic research payments. These tax exemptions were strongly supported by the business community and should prove helpful for economic development purposes; but they will be most useful for *existing* businesses. To fulfill the goal of the interim charge, the subcommittee looked at new ways to stimulate entrepreneurship. Through increased tax incentives, Texas can do a better job of reaching out to provide seed capital to develop *startup* technology and biotechnology companies.

In addition to premium tax credit incentives for insurance companies that invest in CAPCOs, some states provide other tax credit options. The states of Maine and Ohio offer tax credits to individual angel investors. The guidelines are targeted to encourage seed-stage technology ventures. Indiana, Vermont, and West Virginia give tax credits of 20 to 30 percent to investors in qualifying venture capital partnerships.[28] Because Texas does not have a state personal income tax, this type of credit to individuals would be a challenge to finance.

In 1998, the state of New Jersey passed the Small New Jersey-based High-Technology Business Investment Tax Credit Act. As the name implies, the state of New Jersey offers a credit against the corporation business tax for certain investments made in small New Jersey-based companies. The allowable tax credit is equal to ten percent of the qualified investment up to a maximum of $500,000 per year. Two other laws passed by New Jersey allows emerging technology and biotechnology companies to transfer their unused research and development tax credits and net operating loss (NOL) deductions to other companies providing financial assistance to new or emerging technology or biotechnology companies. This law was targeted to high tech and, specifically, biotech companies that must often wait eight to twelve years before they witness a profit on development of a new treatment for medical conditions. As a result, these industries are not able to benefit fully from the use of R & D tax credits and NOLS. These laws

[28]Heard, Robert and John Sibert, Ph.D. "Growing New Businesses with Seed and Venture Capital: State Experiences and Options." Page 14. Internet on-line. Available from <http://www.nasvf.org> [25 May 2000]

provide much needed capital to research intensive companies as the research actually takes place, allowing these companies to become profitable more quickly. These bills provide new avenues of capital access for new and growing companies.

(Copies of these New Jersey laws are attached as Appendix D.)

The risks associated are inherent in these types of investments, but so is the anticipated return. As financial markets have witnessed the explosion of dot.com companies and millions of investors have been enriched by the numerous initial public offerings (IPOs) of high tech companies, the fact remains that roughly two-thirds of new business ventures fail. However, investors are willing to take that risk for the one in ten that succeeds resulting in an IPO. Because of this risk, it is critical that any decision reached by the state to provide financial incentives is coupled with adequate input from outside experts. The examples from other states embarking on these efforts should provide a basis for possible efforts in Texas.

Summary: Provide for new franchise tax credits for authorized investments in Texas-based technology and biotechnology companies.

Recommendation Four

Encourage greater commercialization of university research in Texas through increased incubation efforts.

Overview: Public and private universities are a well-recognized wealth of groundbreaking research and technology. Many are beginning to capitalize on this research by finding ways to commercialize that research to the benefit of the university and state economy.

Little university technology transfer took place until Congress passed the Bayh-Dole Act in 1980. Before this Act, federal agencies (which funded most university research) had legal title to any inventions derived from the research. Under Bayh-Dole, universities were allowed to retain title to inventions and allowed to patent and license those inventions. Universities were also required to share royalties with the inventors and improve research facilities, as well as give small, U.S.-based companies first preference as licensees. This Act opened the gates for university-industry technology transfer which, as of 1997, provided $698.5 million in gross income to universities from 6,974 licenses and options.[29]

The University of Texas at Austin houses the self-supporting Office of Technology Licensing and Intellectual Property (OTL) to commercialize UT Austin research. The OTL fulfills its mission by providing information and guidance for protecting intellectual property developed at UT, evaluating invention disclosures, marketing and licensing those inventions, and assisting in the creation of new business opportunities.[30] These licensing efforts allow faculty to see their innovations commercialized and provide additional research revenue for the university. In fact, UT-Austin recently took an equity position in a Florida start-up company in exchange for technology developed at the school. As part of this agreement, the Florida company has committed $1.3 million in a research agreement with the university. This is the first time UT-Austin has chosen to be compensated with stock rather than royalty payments.[31]

Researchers and scientists are finding that although tremendous amounts of venture capital are available, few venture capitalist firms are interested in investing in infant-stage projects. In fact, most venture capital funds focus on opportunities in which they can invest millions of dollars, not simply a few hundred thousand. Because of this trend, some universities are getting active in the venture capital business. Some have even begun their own venture capital funds using endowment money to develop campus companies. The University of Alabama at Birmingham (UAB) started its own venture capital fund to develop campus project companies to the point where they can attract larger investors. Vanderbilt University created the Chancellor Fund and has invested several million dollars in seven companies that grew out of university research. As with UAB, Vanderbilt is hoping to make these companies attractive

[29] Tornatzky, Louis G., Ph. D. *Building State Economies by Promoting University-Industry Technology Transfer*. Pages 9 and 13.

[30] UT-Austin, Office of Technology Licensing and Intellectual Property. Internet on-line. Available at <http://www.utexas.edu/academic/otl/> [17 July 2000]

[31] Goldstein, Alan. "UT takes equity in tech firm." *Dallas Morning News*. 19 May 2000

to outside investors. Over the past year, the Chancellor Fund established at Vanderbilt has invested several million dollars in seven companies that resulted from research at the university.[32] Some critics argue that focusing on commercialization distracts universities from their primary mission which is to teach. Others argue that commercialization allows universities to transfer knowledge and research for the public good. However, because of the high risks involved in new product development and licensing, universities might be better served by becoming limited partners in an established venture capital fund with financial experts. In that way, universities can focus on research and development and allow the fund experts to manage the investments.

Universities in Northern California and the Northeast are not as concerned about accessing venture capital since two-thirds of the venture capital raised last year were in those regions. But universities in other areas have a more difficult time attracting outside venture capital. In the Midwest, several Big Ten universities have become limited partners in the C.I.D. Seed Fund to commercialize early-stage research at Midwest universities. The University of Chicago is also raising money for a venture capital fund that will focus on early-stage research in the upper Midwest. UTIMCO became the first external investment corporation formed by a public university system (The University of Texas System) in 1986. *(See page 7 of report for more information on UTIMCO.)*

The benefits are clear both to the university and local economy for commercializing research into local business startups. Texas has established the necessary statutory framework to encourage commercialization of research done in Texas, but not enough is taking place statewide. Under the Texas Education Code, employees of a university system who conceive, create, discover, invent, or develop intellectual property may own or be awarded any amount of equity interest or participation in a business that has an agreement with the state relating to the research, development, licensing, or exploitation of that intellectual property.[33] Each university system in Texas develops their own specific intellectual property policies for approval by the Higher Education Coordinating Board.

To assist with these efforts, the legislature provided for a clearinghouse called the Center for Technology Development and Transfer at The University of Texas at Austin. The legislature created this center in 1985 to promote the statewide development and growth of the high technology industry. The Board of Regents of The University of Texas System is given authorization to accept and administer gifts, grants, and donations to aid in the establishment, maintenance, and operation of the center. The center, with the Board of Regents' approval, may solicit agreements with individuals, corporations, partnerships, associations, and state and federal agencies for funding the discovery, development, and commercialization of new products, technology, and scientific information. The board may also provide research facilities and personnel at the various component institutions of The University of Texas System.[34] Although this center

[32] Desruisseaux, Paul. *The Chronicle of Higher Education*, "Universities Venture into Venture Capitalism." 26 May 2000.

[33] Texas Education Code, Section 51.912(a)(1)

[34] Texas Education Code, Section 65.45(a)-(b)

has not endured under that specific name, UT Austin has created several other offices to assist with technology development and business incubation.

The University of Texas at Austin formed the *IC² Institute* (which stands for Innovation, Creativity, and Capital) in 1978 to assist in the development of university research and commercialization. The IC² Institute works with both the public and private sectors to foster technology-based, regional economic development. As part of its efforts to fulfill its mission, IC² established and operates the *Austin Technology Incubator* (ATI). Forty-two companies, of which five are currently publicly-traded, are graduates of this facility. ATI provides numerous services including consulting help, recruiting assistance, marketing and public relations, financing guidance and office space and administrative support. These resources have been instrumental in assisting technology startups in Austin. ATI's 56 graduate and 15 resident companies have created over 2,000 jobs, generated cumulatively over $720 million in revenue from 1989 to 1998, raised over $230 million in capital in ten years, and resulted in five companies going public.[35] While this is evidence of accomplishments at UT Austin as the city of Austin gains in credibility as a high tech center, it should encourage more universities around the state to capitalize on their strengths.

Texas is blessed with several outstanding research institutions. According to the Texas Higher Education Coordinating Board, total research expenditures totaled $1.45 billion in fiscal year 1999. Of that amount, expenditures in health-related institutions increased 6.6 percent. As biotechnology and medical advancements are fueling economic growth in some areas, Texas universities are looking to tap into this market. In 1983, Baylor College of Medicine in Houston created BCM Technologies to promote commercialization of faculty members' discoveries. During the past 10 years, 16 new companies affiliated with BCM Technologies have raised more than $300 million in investment capital. But there are questions as to whether public universities have the necessary flexibility to form the companies. Public universities are restricted from filing articles of incorporation and starting their own companies, but are permitted to obtain licensing agreements for the products they develop. [36] Again, higher education should not be in the business of running a business, but should concentrate on the mission of teaching and educating leaders. Any other focus could raise unnecessary conflicts of interest as a university pours it resources into a for-profit venture that may or may not succeed. Instead, universities can generate returns on their research by partnering with private business and letting the experts assume the risk and costs of developing and marketing new products and ideas generated at universities. This type of arrangement nets American universities half-a-billion dollars a year in royalties on inventions licensed to private industry which required financing of only a few thousand dollars of technology-transfer funds.[37] The State of Texas appears to have adequate statutory provisions in place for commercialization of university research, but as the legislature reexamines the state's commitment to higher education, a potential area of support could be in helping fund

[35] Austin Technology Incubator. Internet on-line. Available at <http://www.ic2-ati.org/fact-sheet.htm> [17 July 2000]

[36] Fuquay, Jim. "Biotech Quest," *Fort Worth Star-Telegram.* 15 May 2000.

[37] Desruisseaux, Paul. *The Chronicle of Higher Education*, "Universities Venture into Venture Capitalism." 26 May 2000.

targeted incubators linked to research institutions.

The Virginia General Assembly in 1984 created the Center for Innovative Technology (CIT). The center is a non-profit organization designed to enhance the research and development capability of the state's major research institutions. It fulfills this mission by bringing Virginia businesses and institutions of higher education into relationships that promote a climate of cooperation and technological innovation. The majority of funding for the center comes from a direct appropriation of more than $10 million from the state legislature. During its time in operation, CIT has co-funded 836 research and innovative technology projects at Virginia's public universities, involving 786 companies which attracted more than $155 million in private and other funds for Virginia universities. It established 13 technology development centers and institutes at Virginia's research universities, increasing R&D capabilities. CIT's technology assistance and transfer program, based primarily at Virginia's community colleges, completed over 1,900 industry projects. All of these efforts were instrumental in raising Virginia's ranking among states from 18th to 6th in the number of patents issued to universities and non-profit institutions from 1987-1993. In 1994, CIT adopted a new mission of measuring its success in jobs and companies created or retained and the competitiveness created for Virginia's businesses. In 1998, the CIT estimates it assisted Virginia businesses in creating/retaining 10,609 jobs, creating/retaining/converting 132 companies and creating $1.9 billion in competitiveness. CIT has achieved its success through offering a wide array of services to technology-based businesses through a wide variety of services. The center has established expert resources at Virginia' colleges and universities, Technology Development Centers, a Technology Applications Center, Entrepreneurship Centers, and regionally-based manufacturing centers. CIT has industry directors in place in five key technology centers along with regional directors deployed in nine offices around the state. By developing long-term strategies for economic growth, becoming the "knowledge point" for science and technology issues, and nurturing Virginia's entrepreneurial environment, CIT has been able to attract and retain a healthy technology industry.[38]

The State of Georgia has also invested public dollars to create economic development through commercialization of high tech research. The Georgia Research Alliance was founded in 1990 as a public-private partnership in which private donations are matched by state funding. Through fiscal year 1999, the State of Georgia has invested $242 million through the Alliance in research and development programs at its six member universities (The University of Georgia, the Medical College of Georgia, Emory University, Clark Atlanta University, the Georgia Institute of Technology, and Georgia State University), matched by $65 million in private funds. This investment has helped attract over $600 million in additional sponsored research.[39]

Summary: Incubation of new technology developed at universities in Texas can stimulate economic growth. This can be done inexpensively through staffing of offices paid through royalty or equity fee

[38] Virginia Center for Innovative Technology. Internet on-line. Available at <http://www.imc.gmu.edu/CIT/submenus/html/aboutcit.htm> [15 June 2000]

[39] Georgia Research Alliance. Internet on-line. Available at <http://www.gra.org> [6 July 2000]

arrangements with the new companies. Although the incubators may need initial startup capital, they could soon be self-supporting based upon the revenue they generate. Incubators will help keep technology and the students and companies associated with that technology in Texas providing a valuable source of jobs and revenue.

APPENDICES

APPENDIX A

Maryland statutes and regulations governing the state's investment financing programs

APPENDIX B

Engrossed version of SB 699 from 76th legislative session in Texas

APPENDIX C

Letter from Stewart Title Guaranty Company regarding formation of CAPCOs in Texas

APPENDIX D

New Jersey Statutes providing for investment tax credits