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**Power, Identity, and Inequities in
State Support
for Higher Education in Massachusetts**

IHELG Monograph

10-02

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**Power, identity, and inequities in state support
for higher education in Massachusetts**

Paper presented for the annual meeting of the Association for the Study of
Higher Education (ASHE), November 6, 2008, Jacksonville, Florida

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I am grateful to the Spencer Foundation for their financial assistance in the qualitative data collection phase of this study. I also wish to thank Justin Ronca and the Wisconsin Center for the Advancement of Postsecondary Education (WISCAPE) at UW-Madison for their support in the quantitative elements of this project. I bear all responsibility for errors.

The topic of state support for higher education is a perennially important issue facing institutional leaders and state policy makers. Over the past two decades, appropriations have not kept pace with the rising costs of educating students or the ability of states to fund higher education (Toutkoushian, 2006). As such, a number of studies have emerged to shed light on variables that predict levels of appropriations for colleges and universities.

Many studies, for example, point to economic factors such as unemployment rate, per capita income, and availability of revenues in determining state appropriations for colleges and universities (Rizzo, 2006; Toutkoushian, 2006; Lowry, 2001; Layzell & Lyddon, 1990, Hoenack & Pierro, 1990; Strathman, 1994; McLendon, Hearn & Mokher, 2006; Weerts & Ronca, 2006). Other studies have examined state demographic trends and its effects on higher education spending (Rizzo, 2006; McLendon, et al, 2006; Lowry, 2001; Hoenack & Pierro, 1990). Still, other analyses have explored the impact of state politics (McLendon, et al. 2006), competing state priorities (Hovey, 1999; Jenny & Arbak, 2004; Schuh, 1993; Kane, Orszag & Gunter, 2003; Toutkoushian & Hollis, 1998; Weerts & Ronca, 2006) and political climate (Archibald & Feldman, 2006, Rizzo, 2006) on higher education appropriations.

While the aforementioned studies have provided scholars with a promising roadmap to understand factors that explain state support for higher education, such analyses have typically relied on state-level finance data (i.e., share of higher education budgets) as the primary unit of analysis. Consequently, little is known about how state support for higher education may vary among sectors (e.g., research universities, regional comprehensive institutions, community colleges) or even among institutions themselves.

As a result, there is still much to learn about ways in which campus level factors may help explain state appropriations for higher education. Specifically, to what degree might institutional history, contexts, strategies, or structures play a role in determining levels of appropriations for particular institutions? In addition, how do campus level variables interact with state level variables (economic, demographic, governance, and state political culture) to tell a more complete story about state funding for higher education? Addressing these questions can help scholars fill in pieces of the puzzle to better understand this complex phenomenon.

Purpose and research questions:

The purpose of this study is to examine state and institutional level factors that explain differences in state appropriations for higher education. At the state level, I aim to investigate how state economy, demographics, and politics and culture impact appropriations for colleges and universities. At the institutional level, I examine the impact of institutional history, contexts, strategies, and structures in state funding decisions for particular campuses. To narrow the scope my analysis, this paper will focus exclusively on these factors as they pertain to research extensive universities (Carnegie, 2002). The primary research question guiding this study is:

What is the relationship between state level variables (economic, demographic, governance, political, and cultural) and institutional level variables (campus history, contexts, strategies, structures) in explaining differences in state appropriations for research universities?

Literature and theoretical framework

The theoretical framework guiding this study is anchored in the organizational theory literature at both the state and institutional level, and examines the research question through rational, political, and cultural perspectives.

Rational perspectives

At the state level, a rational or data driven indicator predicting levels of state support for higher education is the forecast or current status of a state's economy. A number of studies suggest that unemployment rate, per capita income rate, availability of state revenues, and tax capacity are key factors in determining the level at which the state will fund its public universities (Rizzo, 2006; Toutkoushian, 2006; Lowry, 2001; Layzell & Lyddon, 1990, Hoenack & Pierro, 1990; Strathman, 1994; McLendon, et al., 2006). Similarly, demographic trend data can provide rational arguments for where states should invest in education in the future (Blumenstyk, 1988). For example, the growth or decline of state's population may have positive or negative effects on state appropriations (Toutkoushian & Hollis, 1998; Toutkoushian, 2006). One rational method used by states to equitably distribute funds to institutions is through funding formulas. These formulas provide allotment of appropriations based on enrollment, faculty salaries, research expenditures, and other factors unique to their mission (McKeown & Layzell, 1994; Leslie & Ramey, 1986).

At the campus level, institutional leaders may employ rational strategies to increase their prospects for state appropriations. Rational theorists suggest that organizational leaders choose optimum strategies to compete with other resource-

dependent entities given regulators, competitors, and barriers (Child, 1973). For example, campus leaders may explicitly link their missions/programs to foster state economic development as a way to improve state tax capacity. This strategy was especially effective for institutions seeking state support during the 1980s (Hines, Hickrod, & Pruyne, 1989). Fundraising is another rational strategy to raise taxpayer support for a campus since some state matching fund programs leverage private giving. One study supports this hypothesis, showing a positive connection to state support and private giving (Weerts & Ronca, 2006) while another found that private giving was negatively associated with state appropriations, suggesting that private gifts replace taxpayer support (Rizzo, 2006).

Political perspectives

Campus appropriations may be determined by powerful actors who control funding decisions. For example, a committee chairperson may use his or her position of power to affect appropriations for a particular institution or program (Hovey, 1999). Overall, politicians may act on behalf of institutions based on loyalties or self interests (e.g., alumni of an institution; institution resides in legislator's district). Self interests relate to tasks, career, and other extramural factors (Morgan, 2006). Behavior of politicians might also be understood by party lines. For example, a recent study suggests that higher education funding is repressed when republicans control the legislature and governor's office (McLendon, et al. 2006). Another found that states most likely to cut higher education are politically competitive, multiparty states and have limited gubernatorial power (Rizzo, 2006)

The power of individual actors in the appropriations process may be tempered by the governance structure of higher education in the state. For instance, some studies suggest that institutions governed by consolidated governing boards are likely to receive higher levels of state appropriations than those governed under coordinating structures. The rationale is that consolidated boards better mitigate competition between campuses and may promote a more unified strategy to support all institutions (Lowry, 2001; Weerts & Ronca, 2006). In some cases, campuses may develop political coalitions that bring benefits to institutions. For example, in the 1990s, colleges and universities in Virginia formed a successful partnership with the Virginia Business Council resulting in increased state appropriations (Trombley, 1997).

Power and politics also relates to the presence and strength of competitors. Higher education has been crowded out by powerful competing agencies such as K-12 education, Medicaid, and corrections over the last two decades (Hovey, 1999; Jenny & Arbak, 2004; Schuh, 1993; Kane, Orszag & Gunter, 2003; Toutkoushian & Hollis, 1998). Colleges have been especially vulnerable for funding cuts in states where courts have mandated reforms in K-12 schools (Rizzo, 2006). In the same vein, institutions may also crowd out support for one another. For example, states that have multiple flagship-type research institutions (i.e., Purdue University and Indiana University in Indiana), may see more competition for scarce dollars compared to those where one institution enjoys status as the state's undisputed flagship university (J. Hearn, personal communication, June 13, 2007).

Cultural perspectives

Decisions about state support for higher education also mirror the state's culture. Some cultural theories suggest that paradigms are developed over time and eventually embedded within the general belief systems of decision makers or the public at large (Morgan, 2006). This may be understood through baseline budgeting practices that provide incremental increases in appropriations from year to year. The best predictor of higher education appropriations in a given year relates to the previous year's appropriation (Hossler, et al., 1997), which suggests that appropriations may simply be a reflection of historical investment in a campus.

One cultural theory advanced by March (1981), obligatory action, suggests that decision-making behavior can be viewed as contractual, implicit agreements to act appropriately in return for being treated appropriately. One study, for example, showed that increases in appropriations for campuses during the 1990s were associated with campus commitment to public service and outreach. In these cases, states acted appropriately (supported institutions) in return for being treated appropriately (state needs were met). Overall, the study found that campuses that received greater support during the 1990s had developed positive perceptions about their work with state officials and the public at large (Weerts & Ronca, 2006).

Cultural perspectives may underscore the fact that some states simply value certain kinds of institutions more than others. For example, states that have historically relied on private institutions to educate their citizens feel less of an obligation to fund public higher education (Layzell & Lyddon, 1990). This theory might be extended to individual campuses, as legislators may feel inclined to support campuses due to their

histories and symbolic standing in the state (e.g., land-grant institutions or community colleges).

Methodology

The preceding theoretical framework illustrates that variables predicting state appropriations for higher education are complex, and thus, difficult to quantify and measure. For example, how can one create a variable to measure the impact of unexpected coalitions to support certain campus initiatives? One way to examine these complexities is to identify unique cases in which appropriations for a campus have varied, and then seek to explain reasons behind this variation. As McLendon (2003) suggests, comparative case studies can provide important insights that cannot be gleaned from analysis of statistical models. McLendon contends that cases which deserve analysis are those that appear as an outlier over a long time frame.

Guided by these rationales, this study examines outliers (institutions) from a recent longitudinal study of state appropriations (Weerts & Ronca, 2007) to understand why certain institutions have received higher or lower levels of state appropriations than expected since 1985. Specifically, a sequential mixed method design (Tashakkori & Teddlie, 1998), is employed in which the results from the longitudinal analysis (quantitative) are used to inform the development of a case study analysis (qualitative). The findings from both phases are used to address the research question in this study.

In this section, I begin by briefly summarizing the results of the quantitative phase of the study which derived the outlier case studies for the present analysis. A full explanation of this analysis is found in Weerts & Ronca (2007). Briefly, Weerts &

Ronca, (2007) specified a mixed effects time series model to describe the annual changes in state support for public higher education since 1985. The dependent variable used is the natural log of total state and local appropriations received by each institution in each year from 1985 to 2004. The independent variables were drawn from 23 predictors identified in the literature as most important to explaining levels of state support for higher education. These variables represent broad constructs of state fiscal health, demographic factors, competing state priorities, state political climate, and institutional characteristics. Random effects were used to model the nested structure of the data collected on over 1,000 institutions in each of the 50 United States.

The best fitting model from Weerts & Ronca (2007) revealed that a number of variables are important to explaining differences in support for colleges and universities since 1984. Specifically, appropriations for higher education were negatively associated with increases in unemployment, per capita income, state spending on K-12 education, health care, corrections, and court mandated K-12 reform. Increases were associated with high voter participation, republican governors, and increased number of public universities in a state. Finally, it was found that appropriations are likely to be strongest and most stable for community colleges and less so for major research institutions.

The authors partitioned the residual variance of the model into its component parts so as to better understand the sources of unexplained variation in state funding. From this analysis of residuals, the authors identified outlier institutions—colleges and universities by Carnegie class— that were not well fit by the model (higher or lower than predicted appropriations). Table 1 illustrates outliers within the class of research universities which inform the present study.

Table 1: Typology of state appropriation levels by institutional type (Weerts & Ronca, 2007)		
	Higher than predicted appropriations	Lower than predicted appropriations
Research Universities Doctoral/Research Universities— Extensive (E) and Intensive (I)	<u>Doctoral/Research Extensive</u> 1) SUNY- Stony Brook 2) SUNY- Buffalo 3) Northern Illinois University 4) University of Maryland 5) University of Connecticut <u>Doctoral/Research Intensive</u> 1) UMASS- Lowell 2) Texas A & M Kingsville 3) Texas Southern University 4) George Mason University 5) UMASS-Boston	<u>Doctoral/Research Extensive</u> 1) Virginia Commonwealth 2) University of Oregon 3) University of Virginia 4) UMASS-Amherst 5) University of Mississippi <u>Doctoral/Research Intensive</u> 1) San Diego State 2) SUNY—Environmental and Forestry College 3) North Dakota State University 4) College of William and Mary 5) University of North Dakota

Source: Carnegie Foundation for the Advancement of Teaching (2002). *The Carnegie Classification of Institutions of Higher Education, 2000 Edition*. Menlo Park: The Carnegie Foundation for the Advancement of Teaching.

Analysis of table 1 reveals the outliers are somewhat clustered in regions and within states themselves. For example, some institutions in the SUNY system receive higher than expected appropriations while others receive lower than expected support. Similarly, model reveals that unexplained differences in state support exist for research universities in Virginia and Massachusetts. Overall, the table leads researchers to inquire why some institutions were not well fit in the final model.

The remainder of this paper will examine the anomalies found in Massachusetts. Specifically, I will investigate why UMASS-Lowell and UMASS-Boston fall in the higher than expected appropriations category, while UMASS-Amherst falls in the lower than expected group. These universities were selected for analysis for two reasons. First, these institutions share a unique regional culture that has emphasized private higher

education. Because it is known that such cultures have the effect of suppressing public higher education spending (Bastedo, 2005a; Rizzo, 2006) the placement of these campuses on table 1 suggests that rich contextual differences may exist across institutions competing for scarce dollars. Second, my analysis of Massachusetts is a starting point to consider how regional issues explain differences in funding for higher education. In short, this initial study aims to inform future analyses about how regional politics and culture impacts funding for higher education.

Qualitative data collection and analysis

Interviews and document review were the primary methods of data collection in this case study analysis (Yin, 2001). I interviewed relevant stakeholders including campus lobbyists, boards of trustee staff, governance system executives, state legislators, budget officers, and the gubernatorial representatives that could speak to a 20 year history of the campuses. Snowball sampling (Bogdan & Bicklen, 1992) was used to identify the most informed individuals. The interview protocol, guided by my theoretical framework, appears in appendix A. Sixteen interviews were conducted from December 2007- August 2008 (mostly via the phone). Interviews were recorded and transcribed to ensure accuracy of the data. So not to bias responses, I did not reveal to participants about where their representative institutions appeared on table 1 until after the interview.

In addition to interviews, I reviewed documents including speeches from university executives or state representatives, annual reports, campus and governing board documents, state policy studies, news clippings, and related written materials. These documents were collected in March 2008 via a visit to campus archives. The

coding procedure suggested by Bogdan & Bicklen (1992) was used to categorize, record, and interpret the data.

Inequities in state funding for higher education in Massachusetts? Three narratives

My analysis suggests that three narratives are useful to help one understand apparent inequities in levels of state appropriations for public research institutions in Massachusetts. Furthermore, each of these narratives reflects aspects of the rational, political, and cultural perspectives articulated in the theoretical framework of this paper. Conceptualizing my findings as “narratives” emphasizes that no definitive truths, or consensus, exists about apparent inequities in funding in Massachusetts. Rather, each narrative is important to help frame the phenomenon. For example, in his informative chapter on the rising costs of college, Michael Mumper (2002) noted that there is no consensus on what is driving the high rising costs of college tuition. While some may blame the state, institutions, or the economy, others suggest that rising tuition is not a problem at all. Mumper’s point is that various stakeholder groups have different meanings about circumstances and rely on their own reference points to inform their understandings of a particular issue. The same holds true for the present study.

Before these narratives are presented, I first provide some context about higher education in Massachusetts and how it informs an understanding about differences that may exist in funding public higher education in the Commonwealth. Historically, Massachusetts is home to a world class system of private higher education institutions and struggling public system (Bastedo, 2005a). Due to the strength of private higher education, public higher education has never enjoyed a prominent place in the

educational system in the Massachusetts. As a result, the Commonwealth ranks near the bottom on measures of state financial commitment to higher education. Interviewees representing all stakeholder groups in Massachusetts agreed that public higher education, in general, is underfunded as compared to institutions in other states. As one interviewee explained, any inequities in funding that may exist among institutions in Massachusetts is a matter of “getting a few extra crumbs from the table.” No single institution was viewed among interviewees as “getting rich” at the expense of another, although as my analysis will show, differences in funding from institution to institution are present.

Today, public higher education in Massachusetts serves over 175,000 students within 5 University of Massachusetts (UMASS) campuses, 9 four-year comprehensive universities, and 15 community colleges. Each state and community college campus has a board of trustees appointed by the governor. Campuses in the UMASS system report to one UMASS Board of Trustees. At all the campuses, trustees have oversight and authority for finance and curricular issues. Each board of trustees reports to the coordinating board, the Massachusetts Department of Higher Education.

Higher education governance in Massachusetts has had a turbulent past. Since the 1960s, Massachusetts has undergone numerous reorganizations, reforms, and changes in leadership. Formal governance for higher education in Massachusetts began in 1965 with passing of the Willis-Harington Act. This law, which established a Board of Higher Education, provided structure to coordinate the growth of higher education in the Commonwealth. This coordinating system was replaced by a Board of Regents in 1980, which was replaced by Higher Education Coordinating Council in 1991, and now the current Massachusetts Department of Higher Education. Changes in higher education

governance in Massachusetts largely reflect political shifts which have disrupted and redefined the system over time (Crosson, 1996). Higher education governance in the Commonwealth is highly political, and today, Massachusetts is considered the most prominent case of the contemporary movement toward activist governing boards (Bastedo, 2005b). Within this backdrop, my case studies suggest that structural inequities, regional and board level politics, and campus identity all play a role in telling the story about differences in state support for research universities in Massachusetts.

Narrative #1: Funding inequities are structural

The first narrative identified in my study suggests that structural inequities have been built into the funding allocation system which explains why UMASS-Amherst receives lower than predicted levels of support, and UMASS-Lowell and Boston receive higher than predicted levels of appropriations. Prior to the 1990s, the University of Massachusetts was comprised of its land grant campus (UMASS-Amherst), a medical campus (Worcester), and urban research university (UMASS-Boston). Intense competition for funds through the 1970s and 1980s prompted UMASS president, David Knapp, to create a blue ribbon commission on the future of the university. Established in 1989, this commission was assembled in recognition that the University of Massachusetts needed to greatly bolster its political and financial support if it was to achieve its ambition of becoming a nationally recognized university (Bastedo, 2005a).

Emeritus president of the University of California system, David Saxon, was recruited to lead the panel. Saxon was viewed as a suitable choice to help Massachusetts reform its system since California is seen as a national leader in developing high quality public higher education systems. The Saxon Commission provided three primary

recommendations. First, all public universities in the Commonwealth should be housed under the University of Massachusetts. Second, the UMASS Board of Trustees should be given full governance authority over the campuses. Third, budget requests should go to the legislature as a lump sum request from the UMASS system office (Commission on the Future of the University, 1989). The Saxon recommendations were adopted which resulted in two new campuses being added to the system in 1991—UMASS-Lowell and UMASS-Dartmouth. In addition, allocating funding for each campus became the responsibility of the UMASS board and president.

Funding allocation decisions then and now are guided by a historic distribution model considering past levels of operating expenses of each campus. Some interviewees suggest that this inherited framework for budgeting has perpetuated inequities in the system. Specifically, it is argued that due to imbalances in political power, campuses in Lowell, Boston, and Dartmouth had historically received more than its share, while Amherst was always chronically underfunded. Thus, adopting a historic allocation method simply served to formalize past inequities. Furthermore, much of the dialogue around this narrative promotes the idea that the current funding model treats all the institutions in the system the same, and does not recognize the unique characteristics and mission of the Amherst campus. One interviewee explained,

“The formula does not recognize that there is a difference in missions of the different campuses... The funding that goes to the different campuses does not recognize that per student costs at UMASS Amherst should be higher. Now, it takes into account, all right, the difference in terms of discipline, i.e. engineering is different in funding than enrollment in education, but at the same time, it doesn't recognize the fact that we're dealing with a Research I at Amherst... This has led to a significant amount of fighting, though the goal has always been to keep the fight within the conference room.”

In sum, this narrative suggests that the current allocation system perpetuates inequities from a long history of uneven budgets among campuses. Furthermore, the process promotes “sameness,” not recognizing the unique mission and structural elements of the Amherst campus. Within this narrative, Lowell and Boston are getting higher than expected appropriations because their share of funding is disproportionately higher than their research classification. Conversely, support for Amherst— the state’s only Carnegie classified public research extensive institution— is “watered down” because it shares a limited budget with other institutions in the system.

Narrative #2: Funding inequities are due to board and state level politics

A second narrative suggests that inequities are perpetuated due to power and politics at the board level and state level. While the historic distribution model provides a framework for funding, other, less transparent, factors enter funding decisions as well. Most interviewees explained that the allocation process is somewhat a mystery, and no campus knows what another campus is receiving in appropriations. Because the board and president ultimately make the decision about funding the institutions, board level politics are important to consider. Specifically, the preceding quote about “keeping the fight in the conference room” suggests that power struggles exist on the board which may result in some campuses being somewhat advantaged while others disadvantaged.

Political influences intensified as other campuses joined the UMASS system in 1991. Some interviewed for this project were adamant that efforts were made to create fair representation among campuses; however, others have a more cynical view. These

cynics were typically affiliated with the Amherst campus. One interviewee from Amherst explained:

“If you look at the governance structure in the 1990’s when they morphed to the five-campus system, they took one-third of the trustees from the Lowell campus, one-third of the Trustees from the Dartmouth campus and one-third of the Trustees from the existing three-campus system. You don’t need a Ph.D. in political science to understand what was going to happen. That’s exactly what happened.”

Underlying these political issues at the board level are strong regional politics present in Massachusetts. Past studies have shown that strong political gulf between eastern and western side of the state (Wittaker, 1989) which may also be reflected in board level decisions about funding particular campuses. UMASS board members are selected by the governor and many of these appointees reside in the powerful eastern part of the state (Boston metropolitan area). Thus, board members may have a more sympathetic ear for institutions located in the east (Lowell and Boston) compared to those located in the west (Amherst).

Overall, delegations supporting campuses in the east are stronger than the west. For example, Senator Steven Panagiotakos was often cited as being a strong advocate for the Lowell campus, yet many also suggested that his support for the UMASS system has been evenhanded. And William Bulger, a powerful Bostonian, served as senate president for 18 years then became the president of the University of Massachusetts. In this political context, Amherst seemingly struggles to garner legislative support. One interviewee explained, “Amherst is in the political and geographical boondocks.” The UMASS-Amherst campus has strong support from one vocal senator, Senator Stanley Rosenberg, but his influence is seemingly limited in the greater political arena of Massachusetts.

Overall, this narrative suggests that inequities between UMASS-Boston, UMASS-Lowell and UMASS-Amherst exist due to political forces within the board, and more broadly the region. Those subscribing to this narrative argue that the power determining funding decisions are concentrated in members who are most likely to have the interests of eastern campuses in mind (Lowell and Boston). Because budgeting is a zero-sum game, the Amherst campus loses in this scenario.

Narrative #3: Funding inequities relate to campus history and identity

Still, a third narrative suggests that funding inequities in Massachusetts correspond to the identities of each of the institutions, and that these identities have been shaped, in part by their unique histories, regional context, and strengths and weaknesses of state relations strategies. Under this narrative, some interviewees suggest that each campus can either blame or credit themselves for their current priority in the higher education budget. In the following sections I briefly discuss campus identities from my analysis of interview data and supporting documents.

UMASS-Amherst

UMASS-Amherst was the original campus of the UMASS system and was established in 1863 as the Commonwealth's land grant institution. However, unlike other land grant colleges in other states, the mechanical arts provision of the act was provided by a private institution, MIT. This fact further illustrates the strength of private education in Massachusetts from the early history of this country. In the world of graduate education and research, Amherst was a "Johnny come lately" as one interviewee put it.

The campus did not aspire to become a major research institution until the 1950s, and the agricultural focus of the institution, although important, did not rise to the prominence of those programs in the Midwest.

Given the dominance of surrounding private institutions, UMASS-Amherst has historically not been a first choice for students attending higher education in the Commonwealth. As a result, many graduates who obtained positions of leadership in public office are alumni of private colleges. The fact that UMASS-Amherst does not have a law school is also noteworthy, as many state lawmakers in Massachusetts have law degrees from private institutions. For each of these reasons, UMASS-Amherst has fewer allies in state government. In addition to these natural inhibitors, interviewees suggest that UMASS-Amherst has not successfully cultivated its alumni in the legislature. Many described state relations at Amherst as weak and understaffed, not built to support the kind of program necessary to develop sustained political advocacy for the institution.

But several other factors may explain why the institution has not captured the attention of state leaders. For example, I learned that state officials and the public have a mixed assessment of the institution's contribution to the state's economic and social well being. Some provided high marks for the campus especially in the area of technology transfer and economic development, while others cited that Amherst's outreach efforts are somewhat unknown to the public. Overall, the institution's approach to service was viewed largely as one-way dissemination of products (tech transfer) rather than being engaged on issues of community concern.

In this context, many interviewees argued that the campus has not gotten credit for the work it does in providing expertise to the state on a host of issues. For one, the campus struggles to stay visible in the press as it competes with the Boston market for sports coverage and other campus news. In addition, some recognized that it is difficult for faculty to provide assistance to state leaders due to the distance to the capitol and convenient opportunities for lawmakers to consult with faculty from nearby private institutions. But others held a more cynical view, suggesting that Amherst is more of a sanctuary for liberal ideas, and that faculty and students may be more inclined to “stage a protest than to serve the local community of Springfield” as one interviewee put it. Disagreements about the contribution of UMASS-Amherst have led to awkward messaging for state support. One interviewee explained:

“UMASS-Amherst has sort of an inferiority/superiority complex. They say: If they only knew how great we are, they would throw money at us. Why don’t they throw money at us? Because we are so great. It’s because those people in Boston don’t understand us.”

Finally, over the past several years, institutional leaders, most notably former Chancellor John Lombardi, pushed hard to distinguish the institution and propel it to the ranks of a top research university. However, these efforts were not well received by the board, and Lombardi’s tenure at the university was short lived. Overall, while interviewees in my study typically referred to Amherst as the flagship institution, this identity is seemingly not firmly embraced by state lawmakers or the public due to: 1) the historical dominance of private research universities in the Commonwealth 2) lack of visibility due, in part, to geography 3) mixed public perceptions about its contribution to the state, 4) weak state relations efforts.

UMASS-Lowell

UMASS-Lowell has evolved alongside the city of Lowell, which is the first planned industrial city in the United States. The institution's roots stem from Lowell State College and Lowell Technological Institute, both established in the 1890s. Lowell State primarily trained teachers, while Lowell Tech developed the workforce and leadership for the region's textile industry. These institutions merged in 1975 and created the University of Lowell (UL). In 1991, UL became UMASS-Lowell under recommendations by the Saxon Commission.

UMASS-Lowell has sustained its niche as a regional serving institution. The institution has historically served local students, and many of its programs are geared toward building a sustainable regional economy. Many programs at UMASS-Lowell are purposefully less theoretical and more applied, in efforts to meet the specific demands of the local workforce. For example, the institution has developed expertise in plastics engineering and nano-manufacturing which directly relate to economic development efforts in the region.

Much of the credit for developing UMASS-Lowell's niche over the last thirty years is given to former Chancellor William Hogan, who served as the CEO of the institution from 1982- 2007. Hogan, an engineer by training, brought his experience in the private and public sectors to forge strong partnerships between government and industry. Hogan was strategic in his thinking, as one interviewee explained, "The chancellor [Hogan] was upfront about the feeling that the campus needed to have its niche in the UMASS system. He underwent an extensive three R's: realignment, reorganization, and reallocation." Hogan was politically savvy, and cultivated strong

political support among the local delegation, particularly State Senator Steven Panagiotakos. Hogan bolstered the community relations program under his leadership which has enhanced partnerships with both government and industry. One interviewee affiliated with the campus described the institution's robust connections to the business community.

“I think our campus is one that was never afraid to sort of engage directly with industry whether that be through sponsored research, which we feel a lot of our more private institutions in the state sort of disdain. We've embraced what it means to economically engaged with the region ...whether on a project-by-project basis with industry in the region.... Advisory boards particularly in engineering and the sciences.... have lots of industry representation.”

An analysis of UMASS-Lowell suggests that support for the campus corresponds to perceptions about its identity and contributions to the Commonwealth. While the university at times has struggled with town gown issues, in general, the institution has enjoyed strong public support and its academic reputation has increased over time. Levels of support for UMASS-Lowell may thus correspond to the long standing history of engagement with the region and subsequent political support over this period. Finally, it is important to consider that high-tech programs at UMASS-Lowell may play a role in explaining its high level of state support, since such programs are generally more expensive than other curricular offerings.

UMASS-Boston

UMASS-Boston has a similar history to UMASS-Lowell in that it evolved from the merger of local colleges. In the 1850s, Boston Normal School was established to train local teachers in Boston. This institution evolved from Teachers College of the City

of Boston, to State College of Boston, and eventually Boston State College in 1968. Alongside of these developments, a separate institution within the UMASS System, UMASS-Boston, was established in 1964. This campus was born largely as a solution to absorb enrollment overflow from the Amherst campus (Wittaker, 1989). The campus had a rocky start and difficulty finding a home in Boston, largely because it was seen as a threat to private institutions in the region. In 1982, Boston State College joined UMASS-Boston, and today, the campus has found a permanent home on Columbia Point.

UMASS-Boston has secured its niche as an urban serving institution, largely educating a diverse group of commuter students, many of whom are historically underserved by the region's private institutions. Embedded in the city of Boston, the institution is engaged on many social issues important to the community, and its public policy school is particularly strong in addressing social issues. In addition, the institution sits in a powerful legislative district. Noteworthy is that powerful Boston delegates have held important leadership roles in the state and public higher education system for long periods of time. In particular, William Bulger, a powerful Bostonian, served as senate president for 18 years then became the president of the University of Massachusetts. Overall, interviewees suggest that UMASS-Boston enjoys a strong political caucus that supports the institution's role in promoting equity.

Yet, UMASS-Boston has struggled in some ways in its development. The institution has enjoyed less stable leadership compared to UMASS-Lowell, and many argue that the institution is still impoverished compared to many other institutions. Adding to these issues are questions about the ambitions of the university. Historically a

commuter campus, UMASS-Boston is now building residence halls, leading some to declare that the institution is engaged in mission creep beyond its original charter.

The presence of these contradictory factors suggests a less clear path of support for UMASS-Boston, and that higher than predicted appropriations may be more symbolic and political. Overall, UMASS- Boston has secured a niche as an urban institution, and resides in a strategic location to serve minority and disadvantaged students in Boston. While the campus opened with considerable political opposition, interviewees suggest that the institution is supported due to a strong legislative caucus sensitive to a large underserved population in the region. And like UMASS-Lowell, and unlike UMASS-Amherst, the institution is viewed as deeply embedded in its community and serving social and economic needs of the area. These factors may explain the seemingly higher than expected levels of support for the campus.

Conclusions and implications for theory, practice and future research

This study began with a broad research question about the relationship between state level variables (economic, demographic, governance, political, and cultural) and institutional level variables (campus history, contexts, strategies, structures) in explaining differences in state appropriations for research universities. In this final section, I offer several observations as they relate to addressing the research question and theoretical underpinnings of this study. I acknowledge that I am limited by my single analysis of one state, and concede that more research is needed to make broad conclusions that are generalizable among many states and institutions.

Overall, my study suggests that colleges and universities compete in an intense environment for scarce funds. As found in the longitudinal portion of the study (Weerts & Ronca, 2007), competing state priorities such as K-12 education, health care, and corrections suppress funding for higher education. In addition, the model shows that research universities may be most negatively affected in this environment, most likely since they have the strongest capacity to raise their own funds through tuition flexibility and fundraising. Within this state-level context, my case studies suggest that support for individual campuses is also shaped by higher education governance factors, institutional histories/identities, and regional politics.

Overall, looking through the theoretical lens of this study, one can see that rational, political, and cultural factors—at the state and institutional level—all play a role in explaining levels of support for a particular campus. For example, UMASS-Amherst may sit in the lower than expected support category due to the funding allocation structure (rational perspective), board and regional level politics, and cultural/symbolic issues related to the strength of private research universities and mixed assessment about the institution's commitment to meeting state needs. Conversely, UMASS-Lowell and Boston may fall in the higher level of support category due to having historically stronger political bases of support, which is perpetuated through the funding allocation structure (rational perspective). Furthermore, support for these institutions is reinforced through public perceptions about their contributions to the state, historic and present (cultural/symbolic).

In short, UMASS-Lowell and Boston may be more advantaged due to “where they sit” (regional and board power) and mission differentiation or community

engagement (addressing regional issues). Alternatively, UMASS-Amherst is “geographically challenged” and has not created a recognizable niche for itself in the overall public agenda for higher education. Of the aforementioned variables, the budget allocation issues may be easiest to track. As McKeown (1996) has suggested, budget formulas are inherently political, and thus, may perpetuate inequities in a system. One may argue, however, that in Massachusetts, there is little political will to review the system due to the issues outlined above.

The findings of my study have important implications for future research. Most important, additional case study research is needed to verify whether themes emerging from this study are salient in other states and regions. In addition, future scholars might attempt to quantify the themes emerging from this study for testing in large quantitative databases. For example, one might create a variable to measure how institutional budgets are allocated—whether they are derived from historic operating budgets or include more sophisticated measures that consider Research University status (e.g., flagship designation). Overall, these variables closely relate to differences in governing structure and mission differentiation among campuses. For example, one may argue that UMASS-Lowell’s greater than expected support is simply due to the fact that it offers more expensive programs than other institutions in the state. It is important to understand whether these differences in mission are captured in budget allocation models across states.

In addition, board and regional politics are important to capture in quantitative models. For institutions governed under a consolidated system, quantitative researchers might consider coding zip codes to reflect where board members reside. Each institution

could have a score illustrating “level of representation” by zip code. The purpose of such a variable is to examine whether campuses are fairly represented geographically on the board. Similarly, a simple variable measuring the proximity of the campus, in miles, to the state’s largest metro area, or state capital may be instructive. The present study suggests that institutions furthest away from highly populated or politically strong districts may be disadvantaged in the appropriations process. Furthermore, a variable indicating the size of delegation, number of alumni of a particular campus in the legislature, and size of the state relations staff might be captured to better measure politics of state support. These variables build on Tandberg’s (2008) work, suggesting that size of lobby is an important measure predicting state support for higher education.

Finally, this study shows that public perceptions and community engagement are important to consider in the context of state support for higher education. Future quantitative models might include measures of public perceptions of higher education. These data are often collected by State Higher Education Executive Offices, and in some cases, by individual institutions. Using this data, one could create a score indicating public perceptions about the campus (i.e., positive or negative). Alternatively, a simple dummy variable could be constructed to indicate whether the institution is considered a “community engaged institution” as classified in the new Carnegie classification of community engaged institutions (Carnegie, 2008). By considering one or more of these new measures, scholars and policymakers might paint a clearer picture about the complex issue of state support for higher education.

References

- Archibald, R. B., & Feldman, D. H. (2006). State Higher Education Spending and the Tax Revolt. *Journal of Higher Education* 77(4) 618-644.
- Bastedo, M. N. (2005a). Thwarted ambition: The role of public policy in university development. *New England Journal of Public Policy* 20(2), 45-65.
- Bastedo, M. N. (2005b). The making of an activist governing board. *Review of Higher Education*, 28, 551-570.
- Blumenstyk, G. (1988). Demographics study center to aid higher-education policymakers. *The Chronicle of Higher Education*, 34(43), A16
- Bogdan, R.C., & Bicklen, S.K. (1992). *Qualitative research for education: An introduction to theory and methods*. Needham Heights, MA: Simon & Schuster.
- Carnegie Foundation for the Advancement of Teaching. (2008). *Classification descriptions*. [Online]. Retrieved October 3, 2008 from <http://carnegiefoundation.org/classifications>
- Carnegie Foundation for the Advancement of Teaching (2002). *The Carnegie Classification of Institutions of Higher Education, 2000 Edition*. Menlo Park: The Carnegie Foundation for the Advancement of Teaching.
- Child, J., (1973). Organization, structure, environment, and performance: The role of strategic choice. *Sociology*, 6, 1-17.
- Commission on the Future of the University, (1989). [Saxon Commission], *Learning to Lead: Building a World-Class Public University in Massachusetts*, Boston: University of Massachusetts.
- Crosson, P. J. (1996). Where all politics is local: Massachusetts. In T. J. MacTaggart (Ed.), *Restructuring higher education* (pp. 74–102). San Francisco: Jossey-Bass.
- Hines, E. R., Hickrod, A. G., & Pruyne, G. B, (1989). *State Support of Higher Education: From Expansion to Steady State to Decline, 1969-1989*. MacArthur/Spencer Series No. 9. Normal, Ill.: Center for Education Finance and Higher Education.
- Hoенack S., & Pierro, D. (1990). An econometric model of a public university's income and enrollments. *The Journal of Economic Behavior and Organization*, 14, 403-423.
- Hossler, D., Lund, J. P., Ramin, J., Westfall, S., & Irish, S. (1997). State funding for education: The Sisyphean task. *Journal of Higher Education*, 68(2), 160-190.

- Hovey, H. A. (1999). *State spending for higher education in the next decade: The battle to sustain current support*. Washington, D.C.: National Center for Public Policy and Higher Education.
- Jenny, N. W. & Arbak, E. (2004). Challenges for financing public higher education. *The Rockefeller Institute State Fiscal News*, 4,(2)
- Kane, T. J., Orszag, P. R., & Gunter, D. L. (2003). *State fiscal constraints and higher education spending: The role of Medicaid and the business cycle*. Discussion Paper No. 11. Washington, D.C.: The Urban Institute.
- Layzell, D. T., Lyddon, J. W., (1990). *Budgeting for higher education at the state level: Enigma, paradox, and ritual*. San Francisco: Jossey-Bass.
- Leslie L. L. & Ramey, G., (1986). State appropriations and enrollments: Does enrollment growth still pay? *Journal of Higher Education*. 57(1) 1-19.
- Lowry, R. C. (2001). The effects of state political interests and campus outputs on public university revenues. *Economics of Education Review*, 20, 105-119.
- March, J. G., (1981). Decisions in organizations and theories of choice. In, A. H. Van de Ven & W. F. Joyce (Eds.), *Perspectives on organization design and behavior* (pp. 107-123). New York: Wiley.
- McKeown, M. P., & Layzell, D. T. (1994). State funding formulas for higher education: Trends and issues. *Journal of Education Finance*, 19, 319-346.
- McKeown, M. (1996). State Funding Formulas: Promise Fulfilled? In, *A Struggle to Survive: Funding Higher Education in the Next Century*. Honeyman, Wattenbarger, Westbrook, (Eds). Thousand Oaks, CA: Corwin Press.
- McLendon, M. K., Hearn, J. C., & Mokher, C. G. (2006). *The politics of funding public higher education: A longitudinal analysis of influences on state appropriations patterns*. A paper presented at the Annual Conference of the Association for the Study of Higher Education, Anaheim, CA.
- McLendon, M. K., (2003). The politics of higher education: Toward an expanded research agenda. *Educational Policy*, 17(1), 165-191.
- Morgan, G. (2006). *Images of Organization*. Thousand Oaks, CA: Sage.
- Mumper, M. (2001). The paradox of college prices: Five stories with no clear lesson. In Heller, D. E., (Ed). *The states and public higher education policy: Affordability, access, and accountability*. Baltimore: Johns Hopkins Press.

- Rizzo, M. J., (2006). State preferences for higher education spending: A panel data analysis, 1977-2001. In Ehrenberg, R., (Ed). *What's happening to public higher education?* Westport, CT: Praeger.
- Schuh, J. H. (1993). Fiscal pressures on higher education and student affairs. In M. J. Barr (Ed.), *The handbook of student affairs administration* (pp. 49-68). San Francisco: Jossey-Bass.
- Strathman, J. (1994). Migration, benefit spillovers, and state support for higher education. *Urban Studies*, 31, 913-920.
- Tandberg, D. A. (2008). The politics of state higher education funding. *Higher Education in Review*. 5, p. 2-38.
- Tashakkori, A., & Teddlie, C., (1998). *Mixed methodology: Combining qualitative and quantitative approaches*. London: Sage Publications.
- Toutkoushian, R. K., (2006). *An economist's perspective on the privatization of public higher education*. A paper presented at the State of the Art Conference, Institute of Higher Education, University of Georgia, September 7-9, 2006.
- Toutkoushian, R., K. & Hollis, P. (1998). Using panel data to examine legislative demand for higher education. *Education Economics*. 6, 2, 141-158.
- Trombley, W. (1997.) *Business Higher Education Council: Virginia's coalition of business and academic leaders play political hardball*. Sacramento, CA: The California Higher Education Policy Center. 5 (2).
- Weerts, D. J., & Ronca, J. M. (2007). *A longitudinal study of state support for higher education*. Paper presented at the annual meeting of the Association for the Study of Higher Education, Louisville, KY, November 7, 2007
- Weerts, D. J. & Ronca, J. M., (2006). Examining differences in state support for higher education: A comparative study of state appropriations for research universities. *Journal of Higher Education*, 77(6), 935-965
- Wittaker, J. P., (1989). *Selecting a permanent site and planning an urban campus for the UMASS-Boston, 1964-1973: A case study of the impact of state and local politics on policy formation and planning for an urban public university*. Unpublished doctoral dissertation: UMASS-Amherst
- Yin, R. K. (2001). *Case study research: Designs and methods* (3rd ed.). Thousand Oaks, CA: Sage Publications.

APPENDIX A: INTERVIEW PROTOCOL

OPENING QUESTION:

“From your perspective, what has happened in State X or on campus that best tells the story about the level of state support that Institution X has received since the mid-1980s?”

Thematic areas from conceptual framework

Rational perspectives

How have economic conditions in State X influenced state appropriations for institution X, and higher education in general, during the past 20 years?

To what extent have demographic factors such as overall state population, enrollment levels, and participation rates impacted state appropriations for state institutions, including campus X, during the past 20 years?

Describe the mission and primary initiatives of institution X over the past 20 years.

What economic development initiatives has institution X employed during this period, and to what extent is the institution perceived as meeting regional economic needs?

Please discuss campus enrollment trends over the past 20 years and what explains these trends.

What competitive strategies have institution X employed to garner state appropriations?

What role, if any, has fundraising played in determining levels of state support for institution X?

Political perspectives:

Describe the politics of the budgeting process within State X, and explain how it affects appropriations for higher education, and Institution X, in particular.

To what extent has the Governor’s office affected the level of appropriations for institution X, and higher education in general over the past 20 years? Historically, how important have Governors been in planning for the future of higher education in your state?

Describe the political climate surrounding legislative support for Institution X. To what extent has this climate, or the actions of individual legislators, influenced the level of appropriations during the past two decades?

What priority is given to higher education in your state, in particular Institution X, compared to other competing state agencies or programs such as corrections, K-12 schools, etc?

What has been the impact of campus leadership on forging political support for institution X?

What political alliances, if any, have institution X forged with public/private organizations in the state? What has been its impact?

Describe the relationship between the state, Institution X, and the system or board that governs it. In your opinion, does the governance structure of higher education in your state affect the level of appropriations allocated to Institution X? If so, in what way?

Within this governance structure, how does the method in which state appropriations are allocated influence the level of appropriations for Institution X?

Cultural perspectives

Historically, to what degree has the state supported Institution X and higher education?

Describe the current level of citizens' collective value accorded to Institution X. What significant events or historical precedents may have shaped citizen's attitudes toward this institution?

Historically, how has the legislature treated Institution X? What degree of autonomy or flexibility (e.g. tuition) has been afforded to Institution X since its existence?

What campus behaviors or initiatives may explain public or legislative support or non-support for the campus (i.e., community engagement initiatives, high profile "fall outs" with legislators, etc.)

To what extent has university relations activities been successful in garnering state support for institution X? (i.e., campus visibility and public messages).