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The Coming of Age

A Technical Paper on Aging, Health and Arizona's Capacity to Care

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Arizona Health Economics and Aging

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Preface

Aging affects all dimensions of our society, but none so much as health. Because of this, St. Luke's Health Initiatives asked Arizona State University's School of Public Affairs and Morrison Institute for Public Policy to explore Arizona's capacity to meet the demands likely from an aging population.

This complex topic called for analysis from a variety of disciplines. Hence, as a key part of The Coming of Age research effort, we invited experts from different fields to explore and write about the topics essential to understanding public policy choices for an aging future. *The Coming of Age Technical Series* is the result. These papers provide in-depth, objective analyses of important trends and facts at the heart of the coming of age.

These technical papers provided the foundation for *The Coming of Age: Aging, Health and Arizona's Capacity to Care*, as well as *Four Scenarios of Arizona's Future.* All of the products from The Coming of Age project are available at www.slhi.org.

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Arizona Health Economics and Aging

Older adults, ages sixty-five and over, are the fastest-growing segment of the U. S. population. This dramatic increase is fueled by the famous baby boomer generation (those born between 1946 and 1964) who will turn sixty-five in 2011. The U.S. Census Bureau estimates that by 2030 nearly 20 percent of the population will be over sixty-five. Obviously, these changes will produce an enormous increase in demand for long-term care (LTC) services.

Table 1. Population Projections for Arizona

Age	1995	2000	2005	2015	2025	% Change
Aged 65^{+}	560,000	635,000	707,000	967,000	1,368,000	**144**
Aged 25–64	2,067,000	2,384,000	2,618,000	2,844,000	2,898,000	40
Aged 18–24	398,000	466,000	530,000	565,000	571,000	43
Aged 5–17	837,000	965,000	1,004,000	1,015,000	1,130,000	35
Aged 0–4	356,000	348,000	371,000	417,000	445,000	25
Total	4,218,000	4,798,000	5,230,000	5,808,000	6,412,000	52

Source: http://www.census.gov/population/projections/state/stpjage.txt.

Table 2. Arizona Population 65^{+}

County	1998	% Total Age Cohort	2000	2005	2015	2025
Apache	4,765	1	4,580	5,100	6,975	9,868
Cochise	16,982	3	16,324	18,175	24,859	35,168
Coconino	7,842	1	7,538	8,393	11,479	16,240
Gila	10,355	2	9,954	11,083	15,158	21,444
Graham	3,995	1	3,840	4,276	5,848	8,273
Greenlee	961	0	924	1,029	1,407	1,990
La Paz	4,053	1	3,896	4,338	5,933	8,393
Maricopa	357,803	**54**	343,943	382,942	523,769	740,968
Mohave	33,032	5	31,753	35,353	48,354	68,405
Navajo	8,615	1	8,281	9,220	12,611	17,841
Pima	126,439	19	121,541	135,322	185,087	261,840
Pinal	23,940	4	23,013	25,622	35,045	49,577
Santa Cruz	4,299	1	4,132	4,601	6,293	8,903
Yavapai	37,904	6	36,436	40,567	55,486	78,495
Yuma	19,603	3	18,844	20,980	28,696	40,596
Total	660,588		635,000	707,000	967,000	1,368,000.00

Source: Data taken from *Arizona Health Status and Vital Statistics.* The distribution of those 65^{+} assumes that the distribution among counties will remain fixed from 1998-2025. Percentages may not total 100 due to rounding.

Like the United States, Arizona is not only growing, but growing older. Arizona's population is expected to reach nine million by 2040 at which time about 20 percent, or nearly two million, will be older than sixty-five. This 169 percent growth in the older population means a burgeoning reliance on LTC programs.

Key factors include:

1. A small proportion of elders will have severe disabilities with about 17 percent requiring assistance with mobility, self-care, or both.
2. The oldest elders are most likely to have severe disabilities. The growth of the proportion of the eighty-five and older population will place increasing demands on Arizona's fragmented long-term care system. Poor and female elders are represented disproportionately among the severely disabled.
3. Elders with severe disabilities are likely to live alone.
4. Many residents of assisted-living facilities have some impairments.

Table 3. Percent of Population Requiring Assistance with Mobility or Self-care or Both (Noninstitutional, 65^{+})

County	%	1995	2000	2005	2015	2025
Apache	38	213,920	242,570	270,074	369,394	522,576
Cochise	15	83,440	94,615	105,343	144,083	203,832
Coconino	20	113,680	128,905	143,521	196,301	277,704
Gila	17	95,760	108,585	120,897	165,357	233,928
Graham	22	122,080	138,430	154,126	210,806	298,224
Greenlee	11	62,160	70,485	78,477	107,337	151,848
La Paz	15	85,680	97,155	108,171	147,951	209,304
Maricopa	16	90,720	102,870	114,534	156,654	221,616
Mohave	13	74,480	84,455	94,031	128,611	181,944
Navajo	22	123,760	140,335	156,247	213,707	302,328
Pima	18	100,800	114,300	127,260	174,060	246,240
Pinal	17	94,640	107,315	119,483	163,423	231,192
Santa Cruz	20	111,440	126,365	140,693	192,433	272,232
Yavapai	13	70,560	80,010	89,082	121,842	172,368
Yuma	14	77,840	88,265	98,273	134,413	190,152
Arizona Total	17	92,400	104,775	116,655	159,555	225,720
Arizona Population 65^{+} Cohort		560,000	635,000	707,000	967,000	1,368,000

Source: Data used from http://www.slhi.org/arch-old/lt-exsum.html; assumes a constant assistance % of Population

A Forecast for the Future

Elders with disabilities are, and will continue to be, a large, diverse population that needs long-term care services in multiple settings. Many of these people can be expected to require public sources to provide them assistance. The following are major findings regarding this group:

- The population of elders is expected to increase by one-third in the next fifteen years.
- The fastest growing segment of the elders' population is the oldest. Those age eighty-five and over will continue to increase at a higher percentage in 2010.
- Hispanic elders will triple in number by the year 2010.
- Elders with severe disabilities will grow by 50 percent, even as the rate of disability in the overall population drops.
- Elders with severe disabilities living at home will grow by 45 percent.
- The number of elders with disabilities who live in nursing homes is projected to grow by 40 percent.
- Women will continue to be involved with long-term care, both as care recipients and caregivers.

Long-term Care Costs

Total long-term care costs will accelerate rapidly. The majority of costs, and thus cost growth, occur in nursing home care. The majority of nursing homes are publicly financed, while home care is primarily privately paid. In 2015, it is projected that the total public cost to meet nursing home needs in Arizona will be $130.4 million.

Key factors include:

1. Long-term care costs may more than double in the next twenty-five years.
2. Medicare does not cover long-term care, private insurance is expensive and limited in coverage, and out-of-pocket costs are high.
3. Middle-class families are hit the hardest.
4. An institutional bias still drives long-term care spending.
5. Despite elders' strong preferences for home- and community-based services, long-term care dollars are overwhelmingly spent on nursing home care.
6. The cost of living in a nursing home is beyond the means of most individuals.

The Arizona Long-term Care System (ALTCS)

When Arizona enacted the Arizona Health Care Cost Containment System (AHCCCS) in 1982, it excluded long-term care services from the covered benefit package. AHCCCS paid for the acute care services received by indigent nursing home residents, but the counties remained responsible for paying the nursing home bill. In 1998, the Arizona Legislature decided to provide long-term care benefits to AHCCCS beneficiaries and the federal government approved the change to the state's 1115 waiver. However, there were three unusual features to the long-term

care program. First, the state required that beneficiaries receive long-term care services through managed care organizations. Arizona is the only state in the United States with such a requirement. Second, the legislature created a separate managed care system for the elderly in need of long-term care. The new system, a part of Arizona's Medicaid, is called the Arizona Long-term Care System (ALTCS) and provides a full range of medical services from acute to long-term. This program is currently the only statewide, capitated, managed, long-term care system that exists in the United States. Third, the state required county governments to pay for ALTCS costs not paid by the federal government.[1]

Table 4. Per Capita Income and Medicaid State Share

Category	1989	1990	1991	1992	1993	1994
United Sates Per Capita Income	$18,566	$19,584	$20,089	$21,082	$21,718	$22,581
Arizona Per Capita Income	$16,568	$17,211	$17,563	$18,131	$18,756	$19,774
State Share of Medicaid	$40.16	$39.55	$39.34	$38.70	$38.86	$39.41

Table 4. Cont.

Category Cont.	1995	1996	1997	1998	1999	% Change
United Sates Per Capita Income	$23,562	$24,651	$25,874	$27,332	$28,542	35
Arizona Per Capita Income	$20,634	$21,611	$22,781	$24,133	$25,189	34
State Share of Medicaid	$39.41	$39.45	$39.62	$39.73	$39.71	-1
Average State Share 1989–1999			**$39.45**			

Assumptions: Use average state share for years 1989–1999. Used 1996 nursing home figures as basis for projecting into the future, 0.007.

ALTCS is currently serving approximately 19,000 individuals who are elderly and physically disabled. The LTC system now covers about 4 percent of the individuals served by Arizona's Medicaid, but consumes approximately 30 percent of the entire Medicaid budget. The program is targeted to persons with incomes of up to 300 percent of federal Supplemental Security Income ($1,482 per month) who have been assessed by state-employed screeners and assessors as needing at least three months of nursing facility level care.[2]

Arizona Nursing Home Industry

Compared with other states, Arizona has a relatively small system of nursing facilities. The number of nursing home beds per 1,000 Arizona residents over the age of sixty-five is 27.1; the national average is 49.1.[3] Additionally, there are 23.1 nursing home residents per thousand Arizona residents over the age of sixty-five; while the national average is 43.7.

Table 5. Arizona's Medicaid Cost Share of Population Projections

	1995	2000	2005	2015	2025
Aged 65^{+}	560,000	635,000	707,000	967,000	1,368,000
Total Long-term Care Medicaid Expenditures	$201,839,000	$228,871,015	$254,821,737	$348,532,699	$493,063,834
Per Elderly Resident	$360.43	$360.43	$360.43	$360.43	$360.43
Arizona's Medicaid Share for Long-term Care	**$79,623,467**	$90,287,327	$100,524,627	$137,492,664	**$194,508,752**
Arizona's Medicaid Nursing Home Expenditures	**$75,483,047**	$85,592,386	$95,297,347	$130,343,046	**$184,394,297**

Source: http://newfederalism.urban.org/html/anf17html; **Note**: figures do not account for inflation, future value. Assume .948 (1996 percent of long-term care).

Interestingly, however, the state's nursing home infrastructure is growing more rapidly than in other states. For example, in 1980, Arizona had seventy-six nursing homes with 6,197 beds. By 1995, there were 158 facilities with 17,264 beds. By 1998, the numbers were 171 facilities with 19,020 beds. This growth is unmatched by other states. As a result, the number of Arizona nursing home residents increased by 9.1 percent between 1995 and 1996. During that same period, the number of nursing home residents nationally declined by 0.2 percent.[4] If these patterns continue, Arizona's ratio of nursing home beds will soon surpass the national average.

Home- and Community-based Services in Arizona

For years, nursing home care has been the predominant form of publicly funded long-term care. State Medicaid programs are required to pay for nursing home care and home health care for persons who qualify under federal and state criteria. The Medicaid Home Health Care benefit covers skilled nursing services, home health aides, medical supplies and equipment, and physical and other therapies.

In addition to these mandatory Medicaid benefits, both under the Personal Care Program and the Home- and Community-based Care (HCBC) Waiver program, the Personal Care program provides services that help individuals with basic activities of daily living, such as eating, bathing, and dressing. In 1997, thirty-one states, including Arizona, chose to provide Personal Care benefits to Medicaid-eligible individuals.

The HCBC Waiver program allows states to: (1) cover services for specific groups, such as older persons or persons with developmental disabilities, rather than for all Medicaid beneficiaries; (2) provide services on less than a statewide basis; (3) include a wider range of benefits than that offered under the standard Medicaid program; and (4) use a higher income-eligibility standard. States may also cover a wide variety of nonmedical, social, and supportive services, such as case management, homemaker, home health care, personal care, adult day health, and respite.[5]

Every state (except Arizona) had one or more home and community-based waiver programs in 1997. Arizona provided comparable services to waiver programs under a section 1115 research and demonstration waiver.

Informal Caregiving

The economic value of informal caregiving is substantial. Arno, Levine, and Memmot estimated the national economic value of informal caregiving at $196 billion in 1997.[6] This figure dwarfs national spending on formal home health care ($32 billion) and nursing home care ($83 billion). Another study, which focused solely on informal care of older adults with chronic disabilities, projected that the costs of replacing informal help by paid home care would run from $45 billion to $94 billion annually.[7]

Almost 75 percent of the elderly with disabilities receive health care through unpaid family, friends, and neighbors. The role of family and the community in providing informal care will continue to be a critical component of addressing LTC needs of the elderly and disabled because of the shortage of health care professionals. The baby boomers will begin retiring in 2011, a trickle that, over the next twenty years, will become a torrent of individuals who may need care. This will further complicate the LTC labor shortage issue.

Key factors include:

1. Families provide 80 percent of all care at home and are commonly known as "family caregivers."
2. The term "caregiver" refers to anyone who provides assistance to someone else who needs it to maintain an optimal level of independence.
3. The availability of family caregivers is often the deciding factor in whether a loved one can remain at home or must move to a more costly nursing home.
4. Five social trends may affect the supply of caregivers in the future: (1) increasing divorce and remarriage rates; (2) increasing geographic mobility; (3) decreasing family size; (4) delayed childbearing; and (5) more women in the workplace.
5. No comprehensive list of state-funded caregiver programs exists due to the fragmentation of services and variations in eligibility, mode of delivery, and scope of services.[8]

Current and Future "Market Analyses" for Elderly Health Care

The Arizona health care environment is increasingly dynamic. Arizona deals with diverse populations of people that separately present demands while requiring a range of services. With the growing elderly population, the health care market presents challenges and opportunities.

In this fast-paced, technological world, problems are being identified sooner and dealt with more effectively. Phoenix, too, is reaping the benefits of this as the health care industry produces technological advances in equipment as well as pharmaceuticals.

The Phoenix metropolitan area contains large geographical subareas, each being served by hospitals with high-technology capabilities. High-technology equipment assists health care with early identification, diagnostic accuracy, and treatment. Positive ramifications not only help to

drive costs down, but also encourage further research to expand current technological capabilities. The increased availability of technology within geographic locations can be expected to increase utilization rates, as it will decrease travel distance.

Pharmaceutical capabilities have grown incredibly in the past years and are expected to continue as clinical trials produce more effective drugs. Participation in clinical trials is becoming more attractive to patients suffering from chronic or acute illnesses as they offer possibilities for a cure. However, there is contentious debate regarding coverage for plan beneficiaries participating in trials. Health plans attempt to adapt to pharmaceutical advances by monitoring their formularies to include necessary and beneficial medication.

Phoenix Metropolitan Area. It is not new to state that the Phoenix metropolitan area is the fastest growing area within the United States. The population has been estimated at 2,839,539 and is expected to reach higher numbers within the next decade. Mexican residents and persons age sixty-five and older dominate the population immigrating into the state. This introduces implications of no insurance, high cost service requirements, and/or financial demands on the state and county.

While unemployment is still relatively low, more than fifty percent of employed persons work for businesses with less than two hundred employees. Employers with fewer than two hundred employees face greater costs for insurance, resulting in either high cost sharing or no insurance benefits. The median income for the Phoenix population is estimated at $24,911 with fifteen percent of the city's population in poverty. The Phoenix metropolitan area has a large notch group of people without insurance due to an inability to meet AHCCCS income requirements and/or lack of insurance affordability.[9]

Arizona. The State of Arizona, historically, has participated as little as possible in the health care market in the state. However, there have been political impacts from the federal level. The *Balanced Budget Act* created a major cutback in Medicare reimbursement and the implemented usage of risk adjustment plans. The impact of this has resulted in metro health plans dropping Medicare coverage because of low reimbursement rates. Welfare reform has also affected Arizona in terms of the indigent population already fighting for health insurance.

Recently, Arizona has taken a greater initiative in health care by allowing for a large portion of the tobacco tax settlement to be spent on indigent health care. However, the legislature was supposed to further address tobacco tax application to health care this session and potentially in a special session, but failed to do so. State government's involvement in health care has historically been minimal, but each year appears to bring some prospect of governmental participation in addressing the needs of the state.

Political Issues. The Arizona Hospital and Healthcare Association (AzHHA) remains a major player in state politics. Political benefits received by AzHHA members include legislative advocacy at the federal and state levels and assistance with minimizing regulations by making members aware of the associated trade-offs. Other benefits are provided to members in areas of communication, finance, and education.[10] A 1993 program resulted in an approximated $39 million increase in Medicare reimbursements for members. However, the changes brought on by the *Balanced Budget Act* of 1997 affected this.

While speaking to the political shortfalls of our state government, it is important to indicate upcoming regulatory changes initiated in the past six months by the state legislature. Two bills passed in the last regular session enacted: (1) a requirement to transfer regulatory oversight of health care service organizations (HCSOs) and (2) a patient's bill of rights.

The former addressed the lack of regulation that historically has been seen with HCSOs because of too many demands on the Arizona Department of Health Services (DHS). Legislation is attempting to eliminate this problem by transferring authority to the Department of Insurance (DOI) for more comprehensive oversight. It is expected that an increase in regulation of HCSOs will be observed in the near future by placing pressure on valley HCSOs to improve delivery of care. The effective date for this legislation is July 2001. The latter, while weak in its provisions, mandates certain benefits for plan beneficiaries. Contentious issues brought on by this bill include its emphasis on external review and appeals procedures as well as the right to sue. Related effects may manifest in higher premiums and increased cost-sharing.

Health Care Market. While Phoenix is experiencing a low percentage of unemployment, economic problems continue to unfold. The solvency of the Maricopa Integrated Health System (MIHS) is a growing concern to those providing care for the indigent and local health plans. Recent system configuration has seemed to stabilize the system, but the future continues to appear dim. The consequences of its inability to provide care for the indigent places pressure on local health plans to address the health care needs of the indigent.[11]

Phoenix contains multiple, large, private-sector employers with sites located outside of the city. The largest public sector is the Arizona State Retirement System. A majority of private-sector employers offer HMO plans to employees and public-sector employers offer a variety of HMO plan choices. Health care systems in Phoenix are considered large employers and simultaneously assist with driving the health care economy by offering health insurance plans within their system to their employees.[12]

The Phoenix health care market is large in the geographic areas it encompasses. Subareas within Phoenix's metropolitan area have given rise to respective submarkets, each area containing a major hospital providing high levels of care. Submarkets within a large metropolitan area create competition within the entire market as well as among the subareas.

National Health Systems. Multiple subareas and the growing population create an attractive market for larger, national health systems. Subareas provide opportunities for plans to enter and position themselves in a geographic location within the Phoenix metropolitan area. Entry of new health plans implies a greater potential for consolidation, as an attempt to gain entry and stronger ground in the market. Consolidations can prove to be good or bad, the latter presenting possibilities for competing plans to capitalize on their weakness.[13] The entry of large, national plans threatens local plans with their increased capabilities to compete. Two major populations targeted by health plans are the Medicare and commercial.

Phoenix's Growing Medicare Population. Combined with the changes brought on by the *Balanced Budget Act* of 1997, this initiated a competition for attracting enrollees to risk contracts, often requiring little or no premium. HMOs and PPOs enroll 60 percent of the commercial population in Phoenix and competition for this group involves underpricing, broadening provider network, and increasing benefits.[14]

Conclusion

Phoenix's health care market will continue to see a growth in population. Accompanying competition will lead to higher demands for quality care and lower costs. Submarkets within the metropolitan area can expect entry of new plans as larger systems are recognizing the attractiveness of the valley. Medicare reimbursements will continue to affect plans covering Medicare enrollees. Pressure on local plans increases, as the solvency of the county system remains in question.

Notes

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