

State of Vermont

2006 - 2016

SHAPING THE FUTURE OF LONG TERM CARE AND INDEPENDENT LIVING

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Executive Summary

The Vermont Department of Disabilities, Aging and Independent Living is developing a model long term care system for elders and adults with physical disabilities. This fifth edition of *Shaping the Future of Long Term Care & Independent Living 2006-2016* is a vital tool used for the development of that system. This yearly report is intended to be a living document, adjusted annually to reflect changing demographics and trends. Using a model developed by The Lewin Group that incorporates both demographic and program use data, the Department is able to project the need for long term care services and make recommendations for addressing that need. By using a rolling 10-year forecast, Vermont can continually adjust to new trends and plan for the future.

Vermont is an *aging state* as a result of its low birth rate and greater life expectancy. In a 2005 ranking of states' relative proportion of the elderly as a percent of the total population, the U.S. Census placed Vermont 17th in the nation with 12.8% of its population age 65 years and older. Vermont is projected to be 8th highest in 2030 with elderly people comprising nearly a quarter of the state's populace. Vermont is poised to benefit from its aging status due to the increasing labor participation rates of elders who constitute a growing pool of potential employees. Since Federal programs such as Medicare and Social Security provide the primary supports for older people, the State's costs for the elderly will be minimized.

The largest segment of Vermont's population is the 40-64 year olds comprising more than a third of the population in 2006. Although the 40-64 year old group captures the majority of the "Baby Boom" generation in 2006, by 2016 some of this cohort will have moved into the 65-74 year old group. "Baby Boomers" began turning 60 years old in 2006 and will begin turning 65 in 2011. As a result, Vermont's 65-74 year old age group is projected to experience the greatest growth during the 10-year period covered in this report. Although at low risk for needing long term care services, this fast growing group is projected to expand a dramatic 62%. During this same period, the projected increase for individuals age 85 and older will be 24%. Even though the "oldest old" are relatively small in number, they have the greatest need for long term care services.

Vermont's aging population and the increasing number of younger adults with disabilities will continue to generate increased demands on the long-term care system. While the prevalence of disability is rising among the younger population, it is decreasing for elders, many of whom will remain healthy and live free of disability for longer periods of time. In spite of this, the actual number of older people with disabilities living in the community will increase 45% over the 10-year period due to the growth in population of this age group. Looking at the entire population of those 18 years old and older, the number of people with disabilities living in the community is estimated to grow by 34%.

As the need for long term care increases, the capacity of the system must grow simultaneously. Forecasting the needed expansion of home and community based services can serve as a guide for future growth. The model in this report projects program utilization for the 10-year period based on “current use patterns”. In addition, this report also profiles potential growth of three major services based on a vision of a more balanced long term care system.

Vermont’s 1996 landmark legislation (Act 160) allowed the State to alter the balance between institutional and home and community based services. The Act required the State to take saved dollars from reduced Medicaid nursing home utilization and shift those funds to home and community based care. Vermont’s aggressive efforts to improve and expand home and community based services have led to a shift away from nursing home care. Since 1992, Vermont has witnessed a steady decline in the use of nursing homes with the sharpest declines seen in Vermont’s oldest old—those 85 years and older. This decline is expected to continue throughout the next ten years.

While this report projects the number of nursing home residents over the ten year period, it also addresses future bed capacity. The Department was able to predict needed nursing home bed capacity for 2016 by assuming a continuation of the current Vermont rate of beds-per-population served. If the number of beds-per-population served remains the same in 2016 as in 2006, only three of Vermont’s 14 counties (Bennington, Orleans and Washington) would need to reduce their capacity by 272 beds to meet the state average. This bed reduction would leave Vermont with 3,057 nursing home beds in 2016, down from its current 3,329. These projections take into account the growth in the number of people with disabilities over the ten year period.

Vermont took a dramatic step in reshaping its long term care system through implementation of the Choices for Care 1115 Medicaid Waiver in October 2005. This research and demonstration waiver allows Vermont to offer an entitlement to home and community based services thereby achieving its goal of serving more people. Choices for Care (CFC) created a unified budget, combining Medicaid costs for both nursing facilities and home and community based care. Vermont has been able to serve more individuals for the same amount of money because home and community based care generally costs less than institutional care, and people who might otherwise have been served in a nursing facility are now choosing to receive their care at home. In the first year of Choices for Care, Vermont has added twice as many new people to its home and community based system as would have been possible under its previous 1915(c) Medicaid Waiver.

This new Waiver allows Vermont to strike a more *equal* balance between the number of nursing facility residents and the number of people served in home and community based settings. While the original goal for each county was to have 40 Medicaid home and community based clients for every 60 Medicaid funded nursing home residents (60/40), five of Vermont’s counties have met or exceeded a 50/50 balance. Choices for Care has opened a door to remarkable and expansive change, creating a consumer-focused system for people to live with independence and dignity in the setting of their choice.

Recommendations:

Progress has been made since the Vermont Department of Disabilities, Aging and Independent Living (DAIL) first issued recommendations in *Shaping the Future of Long Term Care 2000-2010*. Many of these recommendations remain “works in progress” as evidenced by the updates below. The original recommendations from *Shaping the Future of Long Term Care 2000-2010* are in black type while the 2003 updates are in red, the 2004 updates are in blue, the 2005 updates are in green and the 2006 updates are in purple. These recommendations, if implemented, will result in a balanced and sustainable system of care for elders and adults with physical disabilities.

1. In accordance with consumer preference, continue to decrease reliance on nursing facility care. Develop alternatives so that at least 40% of the people needing Medicaid funded nursing home level of care receive that care at home or in other community settings. Update this goal annually based on utilization and projected need. *Five of 12 counties have met or exceeded this goal in 2003. (Grand Isle and Essex are excluded because they lack nursing homes.) In 2004, no new counties have met this goal although Caledonia and Windsor are close. Caledonia and Windsor Counties have met the 60/40 balance bringing the state total to seven counties. Only five counties have not met the 60/40 ratio, one of which (Bennington) has only 15% of people receiving long term care in home and community based settings. A 50/50 balance may be achievable since Addison, Chittenden, Franklin, Lamoille and Orange Counties have already met or exceeded this goal.*
2. Increase Home and Community Based Medicaid Waiver slots by 100 each year and continue to allocate them to people in greatest need. *Due to budget constraints, only 54 slots were allocated in FY 2003 but 100 will be allocated in FY 2004. Only 88 slots were allocated in FY 2004 and 73 are expected in FY 2005. There were 73 slots allocated in FY 2005. With the implementation of Vermont’s Choices for Care 1115 Medicaid Waiver, slots no longer exist. Early results indicate an increase in the number of people served in the Choices for Care program. In the first year of Choices for Care, Vermont added twice as many new people (200) to its CFC home and community based service system as would have been possible under the previous 1915(c) Medicaid Waiver.*
3. Increase the Attendant Services Program to serve an additional 100 people by 2010. In FY 2000, 250 clients were served. *Growth was slower than expected, having risen from 250 clients in FY 2000 to 261 in FY 2003. To maintain the 2003 rate of use, while keeping pace with demographics, the program would have to serve 58 more clients per year by 2013 (i.e., 319 clients in 2013). The FY 2004 client count (260) is virtually unchanged from FY 2003. Additional funding in FY 2004 paid for an increase in participants’ hours of care. The FY 2005 client count increased to 286. Although expenditures actually dropped 4% from FY 2004 to FY 2005, client turnover freed up funds to serve more people*

(newer clients required less intense services). If Attendant Services maintains its 2005 rate of use and keeps pace with demographics, it would serve 381 people in 2015. The number of people served in FY 2006 increased to 293 although funding remained level.

4. As funds permit, continue to improve wages and benefits for personal caregivers in all settings until caregivers receive a *starting* wage of at least \$10/hour, along with basic benefits such as health insurance, sick time and vacation leave. Wages in all settings should be increased annually by an inflation factor. *The only program with a starting wage of \$10/hour is the Consumer or Surrogate Directed Option in the Home and Community Based Medicaid Waiver program. Progress has been made in both nursing facility wages and home health wages but more needs to be done. Due to budget constraints, there has been little progress on wages in FY 2004. Five of eleven Home Health Agencies have raised their starting wage to \$10/hour for personal caregivers and many Agencies provide benefits for caregivers working sufficient hours. The Department is working closely with the Community of Vermont Elders (COVE) on ways to improve recruitment and retention of direct care workers through COVE's Better Jobs Better Care grant and the Vermont Association of Professional Care Providers. Two recently completed studies, one from the Better Jobs Better Care grant and the legislatively mandated Long-Term Care System Sustainability Study recommended annual inflationary increases for all provider rates and wages paid under consumer or surrogate directed programs. The Attendant Services Program received a wage increase in July 2006. DAIL will complete an in-depth study of the direct care workforce by December 2007 which will provide additional information on current wages and benefits.*

5. Develop additional supportive housing such as Enhanced Residential Care, Assisted Living, group-directed congregate housing, and adult family care. Increase funding for home modifications. Continue to promote universal design in all new housing construction. *Enhanced Residential Care and Assisted Living have expanded. Funding for home modification is increasingly inadequate. Promotion of universal building design is in progress. There are now 5 licensed Assisted Living Residences in Vermont, with more under development. As of March 2006, there were 6 Assisted Living Residences with 7 in the planning stages. Enhanced Residential Care grew 17% (155 to 182 residents) from FY 2004 to FY 2005 and is projected to serve 311 residents in 2015 at current use rates. The Vermont Center for Independent Living sponsored the state's second Universal Design Conference in April 2006 and is planning a future forum to showcase model home modifications and universal design. The next Universal Design Conference will be held in 2008. Vermont continues to have six Assisted Living Residences with a seventh scheduled to open in December 2007. The Enhanced Residential Care program served 207 residents in FY 2006 and experienced greater expansion during FY 2007 due to Choices for Care. A 24-hour Care option is being developed (similar to shared living arrangements for*

people with developmental disabilities) which will provide an alternative for individuals who previously had no choice other than a nursing facility or residential care home.

6. Increase the daily capacity of adult day centers from 441 in FY 2000 to 720 in FY 2010. *Daily capacity has grown to 565 in FY 2003. To maintain the 2003 rate of use, while keeping pace with demographic changes and the expected decline in nursing facility use, the program would have to serve 353 more clients by 2013 (i.e., 918 clients in 2013). Daily capacity reached 584 in FY 2004 with expected growth to reach 989 by 2014. Adult Day Services will likely expand as a result of inclusion in the 1115 Waiver. The number of Adult Day clients jumped to 836 in FY 2005, a 43% increase over FY 2004, far exceeding the 2009 projected daily capacity of 785. This gain occurred prior to implementation of Choices for Care and is due to expansions at several sites. If Adult Day Services maintain their 2005 rate of use and keep pace with demographics and the expected decline in nursing facility use, they would serve 1,287 people in 2015. Note: FY 2005 Adult Day counts were cumulative instead of point-in-time. For FY 2006, daily capacity totaled 659. Expansion has occurred at a number of sites and additional development is slated for the future.*

7. Expand the capacity of the Area Agencies on Aging (AAA's) to provide case management to more elders who do not participate in the Medicaid Waiver program. Develop a program to provide case management assistance to adults with physical disabilities between the ages of 18 and 60 who do not qualify for such assistance from any other program. *No progress to date. The Area Agencies on Aging will likely receive substantial new State funding for FY 2006 to help stabilize rather than expand their operations. No additional funding has been identified to develop a case management system for younger adults with physical disabilities. For FY 2006, the AAA's received stabilization funding as well as one-time Global Commitment funding to assist in implementation of the Medicare Modernization Act Part D prescription drug plan. The absence of case management services for people 18-60 has become increasingly problematic and will likely attract more attention in 2006. Plans are underway for two pilot projects which will provide case management services to younger people with physical disabilities. Choices For Care now provides case management services to the CFC Moderate Needs Group (those at risk of institutional placement). The AAA's continue to provide Older Americans Act case management to thousands of Vermonters who are not eligible for Choices for Care. With the aging of the "Baby Boom" cohort, the AAA's anticipate even greater demands for case management.*

8. Expand community-based health promotion and disease prevention programs for elders and adults with physical disabilities. *Expansions include strength training classes predominantly led by elders, the Senior Farmers' Market Nutrition Program, and a quarterly food and nutrition newsletter for providers.*

Governor Douglas established the Commission on Healthy Aging in 2005. A \$48,000 National Governors' Association grant will pay for staffing the Commission this year and procuring additional grants for future work. No additional grants were found. The Department now supports staffing the Commission whose focus this year is developing a Healthy Aging Plan in addition to other statewide initiatives. In FY 2006, Congressional earmark funds targeted to local senior centers will help implement changes to make their services more attractive to "Baby Boomers". The Commodities Supplemental Food Program experienced federal cuts that have resulted in fewer seniors being served. The Governor's Commission on Healthy Aging is addressing two key issues: maintain and expand the number of elder Vermonters in the work force; and prevention of falls. Vermont has the nation's highest rate for falls resulting in death www.cdc.gov/aging/saha.htm p.28. The Department is promoting evidence-based health promotion and disease prevention programs for older adults along with \$5,000 community implementation mini-grants.

9. Expand the Homemaker Program to serve 1,300 people by the year 2010. In 2000, this program served 700 people. *Due to budget constraints and increased costs per client, the Homemaker Program served 614 people in FY 2003, 86 fewer than in FY 2000. To maintain the 2003 rate of use, while keeping pace with demographics, the program would have to serve 404 more clients per year by 2013 (i.e., 1,018 clients in 2013). The 2004 client count (612) is virtually unchanged from 2003 due to level funding. Homemaker Services will likely expand as a result of inclusion in the 1115 Waiver. The Homemaker Program served 648 people in FY 2005, a 6% increase over FY 2004 with no growth in Department funding; however, the Home Health Agencies contributed additional funds of their own. The increase in the number served occurred prior to implementation of Choices for Care and is probably the result of the additional Home Health Agency funds as well as client turnover which freed up funds to serve more people. If the program maintains its 2005 rate of use and keeps pace with demographics, it would serve 998 people in 2015. However, the trend from 2000 to 2005 shows a decline in the number served. The Homemaker Program served 763 people in FY 2006, an 18% increase over FY 2005, due in part to increased funding through the CFC Moderate Needs Group.*
10. Expand and improve the dissemination of public information so that all elders and adults with physical disabilities know how to access the services they need through web sites, publications, the media, and information and assistance lines. *The Senior Help-Guide has been widely distributed, the Guide to Services has been updated on the Department's web page, and radio and TV Public Service Announcements have been created. Funding has been found for a public information initiative in 2004. A public education media campaign has been initiated to publicize the Senior HelpLine and the Vermont Center for Independent Living (VCIL) information and referral line—the "I-Line". Additional funding in FY 2005 allowed for continuation of the public information campaign to promote the Senior HelpLine on a limited basis. In 2006, DAIL was awarded*

a three-year \$800,000 grant to develop Aging and Disability Resource Connections which will provide comprehensive and objective information about long term care supports, resources and assistance. See # 16.

11. New in 2003: *Obtain permission from the Centers for Medicare and Medicaid Services to implement an 1115 Long Term Care Medicaid Waiver to create equal access to either nursing facility or home and community based care, according to the consumer's preference. As of this printing, the Department expects to receive final approval for the 1115 Medicaid Waiver with an implementation date of September 2005. Vermont began implementation of its Choices for Care 1115 Medicaid Waiver in October 2005, showcasing a remarkably smooth transition. Choices For Care is now serving over 300 new participants in CFC home and community based care and 200 fewer Medicaid nursing home residents, with no waiting list for people who are nursing home level of care.*
12. New in 2005: *The Vermont Department of Disabilities, Aging and Independent Living (DAIL) received a \$2.1 million Real Choice Systems Change grant—Comprehensive System Reform (Health and Long Term Care Integration Project) from CMS to develop a system that integrates acute, primary and long term care for elders and people with disabilities. This includes capitating Medicare and Medicaid funds into a flexible pool to create a system of services more person-centered and responsive to individual needs. The Department has made planning grants available to several provider organizations to further develop the model.*
13. New in 2005: *DAIL received a Real Choice Systems Change grant—Quality Assurance and Quality Improvement to develop a comprehensive quality management system across the Department's home and community based Medicaid waivers for elders, people with physical disabilities, traumatic brain injury survivors and people with developmental disabilities. Outcomes and indicators of quality services were developed, followed by the dissemination and implementation of the Quality Management Plan in April 2007.*
14. New in 2005: *DAIL received a Real Choice Systems Change grant—Integrating Long Term Supports with Affordable and Accessible Housing to enhance housing capacity and supportive services so that Medicaid-eligible frail elders and adults with physical disabilities can live in the setting of their choice. With grant completion anticipated in September 2008, work is proceeding in three areas: preserving, developing and enhancing 10 supportive housing projects; establishing medication assistance to support elders in congregate housing; and planning for two PACE sites which will coordinate services with supportive housing projects. (See # 17 for implementation of PACE.)*

15. New in 2005: *DAIL received a Robert Wood Johnson grant to implement a “Cash and Counseling” option for participants in the Choices for Care program. Enrollment in the Flexible Choices program began in July 2006. This program allows people to convert their plans of care for home-based services into a dollar-equivalent allocation, develop a spending plan for that allocation, and then purchase care to more flexibly meet their needs. The initial pilot will serve 50 individuals.*
16. New in 2006: *DAIL was awarded a three-year \$800,000 Administration on Aging grant to establish Aging & Disability Resource Connections (ADRCs). ADRCs will provide a single point of entry for information on and access to public long term support programs and benefits regardless of age or income. Over the course of the grant, services will become available to older Vermonters, younger people with physical disabilities, individuals with developmental disabilities, and people with a traumatic brain injury.*
17. New in 2006: *Vermont opened its first PACE center (Program for All-Inclusive Care for the Elderly). PACE is a health care system for frail individuals 55 years and older that provides for all acute, primary, and long-term care needs. Care is provided or coordinated by an interdisciplinary team and services are financed through a combined Medicare and Medicaid rate. Serving Chittenden and southern Grand Isle Counties, the PACE Center in Colchester is actively enrolling participants. The Rutland site anticipates opening in the Fall of 2007.*

Methodology

The Vermont Department of Disabilities, Aging and Independent Living contracted with The Lewin Group to project both the need for long term care services and the capacity of Vermont's system to meet that need. The target populations are elders and adults with physical disabilities. Vermont-specific data on population growth, demographics, and program utilization were incorporated into the Lewin model to derive both "need" and "use" projections for 2011 and 2016.

Vermont population data from the U.S. Census 2000 serves as the baseline. The University of Massachusetts Institute for Social and Economic Research (MISER) developed population projections for the period 2000 to 2020. The Lewin Group integrated the population projections with a variety of data sources, including disability data, population characteristics, nursing facility utilization, and the Department's Fiscal Year (FY) 2006 actual program use, to produce a set of tables that describes Vermont's need and use of long term care services by county.¹ (See Appendix, p.22.) Detailed methodology reports from both MISER and The Lewin Group are available upon request.

Two essential state-level assumptions drive the projections in this model: the disability rate trend and the nursing facility use rate trend. The first is a major determinate of long term care need, and the second influences the demand for services in the community. These assumptions can be adjusted over time as expected trends change. (See Appendix, Assumptions Sheet, p.23.)

The disability rate trend for individuals younger than 65 years old utilizes growth projections from the Social Security Administration to determine the increase in the percentage of workers receiving Disability Insurance benefits. This trend was applied to children as well because projections for individuals younger than age 18 are not available. For people age 65 and older, the disability trend was derived from Manton's analysis of the 1999 National Long Term Care Survey.² This analysis showed a 1% decline per year (between 1989 and 1999) in the age-adjusted rate of disability. The Lewin model assumed a slightly smaller and flattening decline for the projections because there is debate as to whether these declines will continue into the future.

¹ To produce detailed disability estimates by county, Lewin relied principally on the following sources of data, all from the U.S. Bureau of the Census: (1) for county-level general disability data, the 2000 Public Use Microdata Sample (PUMS); (2) for detailed data on Activities of Daily Living (ADLs), Wave 11 of the 1996 Panel of the Survey of Income and Program Participation (SIPP) conducted during 1999; and (3) for county-level income distribution data, published estimates from the 2000 Census. Because detailed ADL data do not exist at the state or county level, ADL information from the SIPP was statistically matched to the county-level Census disability data to produce ADL estimates for each county.

² Manton, Kenneth F, and Gu, XiLiang, Changes in the Prevalence of Chronic Disability in the United States Black and Nonblack Population above Age 65 from 1982 to 1999. *Proceedings of the National Academy of Sciences*, Vol. 98, No. 11, 2001. This paper defines disability as having difficulty with one or more activities of daily living (ADLs). Lewin applied these age-adjusted trends to the estimates of disability, which are defined as requiring assistance with two or more ADLs. Separate analysis of National Long Term Care Survey data performed by The Lewin Group indicates that these two measures of disability, while different, experienced similar trends from 1982 to 1999. More recent estimates based on Manton's analysis of the 2004/05 National Long Term Care Survey were not incorporated because weighting issues related to the survey have not yet been fully vetted.

The nursing facility use rate trend assumptions are based on an analysis of Vermont's actual nursing home use during the period FY 1993-2006. These data include all payers, both public and private, and incorporate observed trends in nursing facility use through the second quarter of 2006. The trends show the annual percent change in the per capita nursing facility use rate by age group. The model assumes that the five-year and ten-year trends in nursing facility use (i.e., to 2011 and 2016) will resemble the long-term changes observed from FY 1993 to 2006.

The trending assumptions for nursing facility use and for disability rates each affect the model's projections of both the need for long term care and the use of home and community based services. A decline in the assumed rate of nursing facility use results in a larger proportion of people with disabilities living in the community. This in turn increases the expected use of home and community based services. At the same time, a decrease in the expected disability rate within an age group (as among those age 65 and older) results in fewer people of that age group with disabilities in the community, which in turn reduces the expected use of home and community based services.

While the foregoing discussion has focused on the impact of broad, state-level assumptions on projected need for and use of long term care, it is important to understand that the county-level estimates and projections also make use of numerous county-specific data sources. These include county disability data from the 2000 Census, age-specific county demographic data, and actual age-specific county utilization of nursing facilities and home and community based services.

"Disability" is defined as requiring the help of another person to perform two or more activities of daily living (such as dressing, bathing, transferring, toileting, eating). The model excludes people with developmental disabilities. Individuals with mental illness are included only if they have 2 or more ADL limitations. *The numbers in this model represent a "point in time" as opposed to an unduplicated yearly total.* Nursing facility utilization figures represent an average daily census, while use of most other services reflects the average number of users over a one-month period. All "user" data are for the State's fiscal year. As a general rule, county designations for "user" data represent the user's current residence.

The tables in the Appendix display the results of the model. Tables 2 and 3 (p.24-27) show the number of Vermonters with long term care needs, employing more detailed population characteristics. The "low-income" delineation refers to people whose income is below 175% of the Federal Poverty Level, roughly capturing the majority of Vermont's publicly funded long term care clients.

Tables 4 and 5 (p.28, 29) indicate the number of point-in-time "users" for each program or service; "users" in these tables may be served by more than one program. Statewide and county projected use for 2011 and 2016 is based on actual use in FY 2006, projected forward. The projections of use for 2011 and 2016 assume that each county's *rate* of use of each service remains the same as in 2006 within each age group.

Thus, use of home and community based services in a county increases *only enough* to accommodate demographic changes in the county (e.g., aging and disability) and the expected shift from nursing facilities, assuming that historical trends in nursing facility use continue. These projections are meant to illustrate how expected changes in the community will affect use of home and community based services in each county. For example, a county with relatively low rates of home and community based service use in 2006 will still be projected to have low rates of use in 2016 relative to other counties.

The Changing Population

Changes in the population are a result of births, deaths and migration. Generally, births play the most significant role in determining a state's overall composition; however, greater life expectancy has become increasingly important. Vermont has the lowest birth rate in the nation at 10.4 live births per 1,000 people compared with Utah's highest-in-the-nation rate of 20.9³. The combination of Vermont's low birth rate and increasing longevity make Vermont an *aging state*. Although Vermont has the second highest median age in the country (40.7 years in 2005), median age is an imprecise measure for determining the relative proportion of elderly people in the state. (Median age divides the population into two groups, half younger and half older.) In order to determine whether a state has proportionately more elderly people relative to its total population, one needs to look at the percent of elderly. In 2005, the U.S. Census ranked Vermont 17th in the nation with 12.8% of its population 65 years old and older (see table below). Vermont is projected to be 11th in the country in 2010 with 14.3% of its population age 65+ and 8th highest in 2030 with 24.4%.⁴

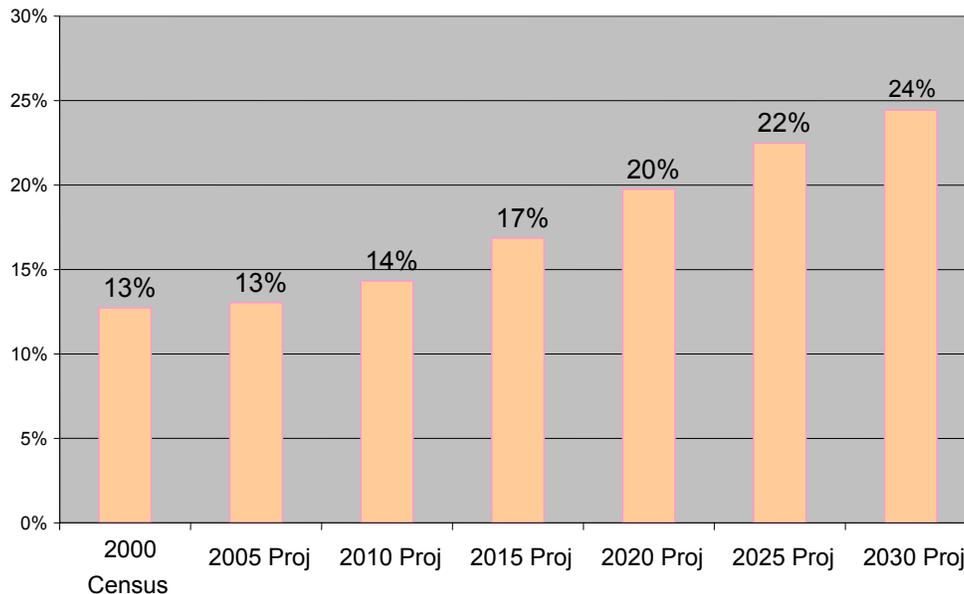
Percent of the Total Population Who Are 65+ Years Old 2005 (U.S. Census)						
Rank		%		Rank		%
1	Florida	16.6		11	Montana	13.3
2	West Virginia	15.0		12	Connecticut	13.0
3	Pennsylvania	14.6		12	Delaware	13.0
4	North Dakota	14.2		14	Alabama	12.9
5	Maine	14.1		14	Massachusetts	12.9
6	Iowa	14.0		14	Oklahoma	12.9
7	Hawaii	13.6		17	Missouri	12.8
7	Rhode Island	13.6		17	Nebraska	12.8
7	South Dakota	13.6		17	Ohio	12.8
10	Arkansas	13.5		17	Vermont	12.8
					United States	12.1

The following chart shows the steady progression of the state's aging status. Vermonters age 65 and older will comprise a growing percent of the state's total population. As mentioned above, 2030 will feature a Vermont with almost a quarter of its population over the age of 65. As a result, people who are 65 years old will likely be considered "middle-aged" while the term "old" may be reserved for those older than 85.

³ National Center for Health Statistics; Births: Preliminary Data for 2005, Table 8.

⁴ U.S. Census Bureau, Population Division, Interim State Population Projections, 2005.

Vermonters Age 65+ as a Growing Percent of Vermont's Population 2000-2030 Projected



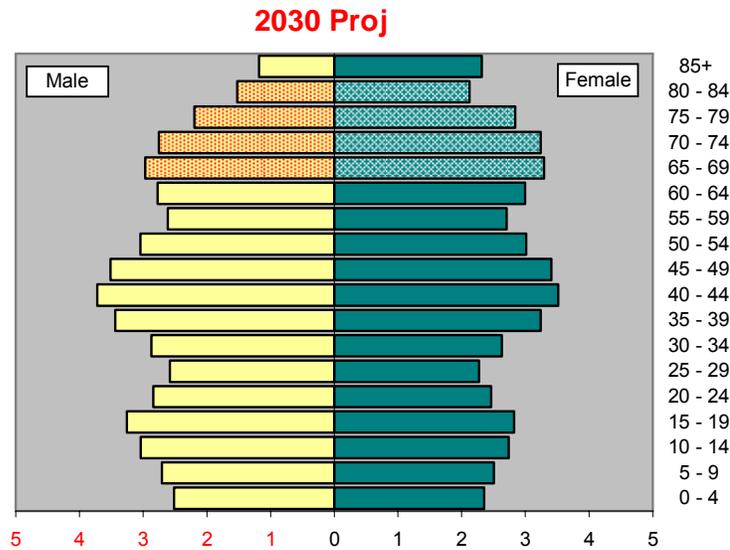
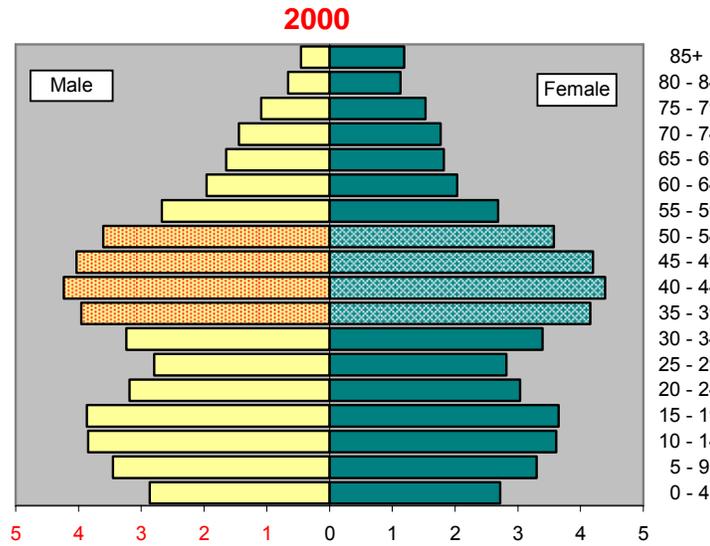
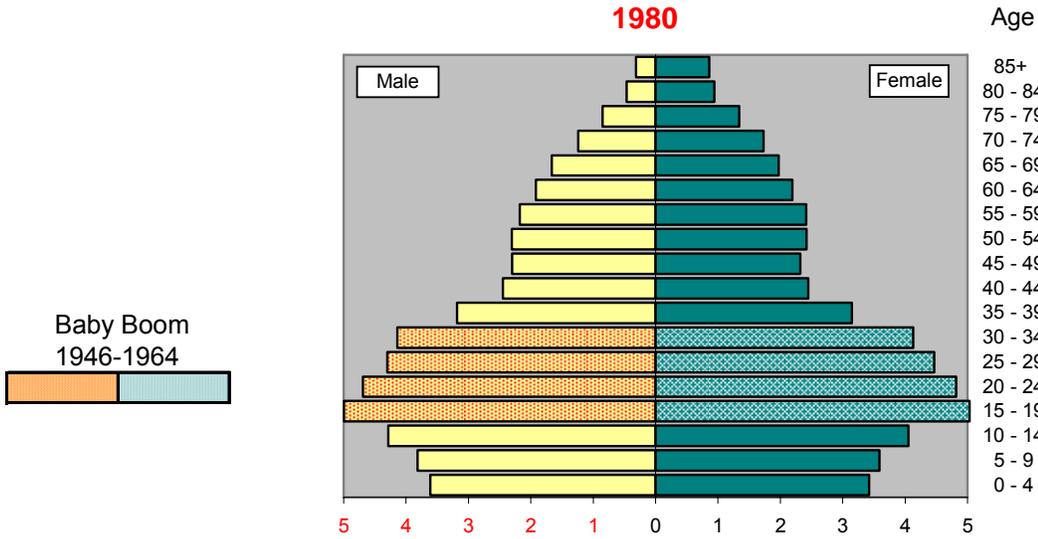
Vermont's age structure can be graphically depicted in a population pyramid. The following page shows three depictions of Vermont's population: one each for the years 1980, 2000 and 2030 projected. The horizontal bars represent age groups with males on the left and females on the right. The population pyramid for 1980 shows a younger population shape, wider at the base with young cohorts and narrower at the top with older age groups. Over time, the pyramid changes shape as a result of smaller birth cohorts and the growing proportion of older people relative to youth. The 2000 age structure shows a fattening around the middle whereas the 2030 profile has become rectangular. By comparing the shapes of the three age structures, one can see the aging of society, otherwise known as the "squaring of the pyramid." For all three, a comparison of the male and female bars shows that women tend to outnumber men with age. Note the "Baby Boom" bulge marching through time (shaded area) with smaller groups both preceding and following it in the 1980 and 2000 profiles. After 2030, the "Baby Boom" cohort will enter the "oldest old" age category of 85+ when long term care services will be in peak demand.

Vermont is poised to benefit from its aging status. Although the number of working age Vermonters (20-64) is projected to decrease slightly from 2005 to 2030, the labor participation rates for older people have been climbing. U.S. workforce participation rates for those age 65-69 were 34% for men and 24% for women in 2005, up from 25% and 16% respectively in 1993. This trend can be seen in older age groups as well. For those 70 years old and older, 14% of men and 7% of women were in the labor force in 2005.⁵ Vermont has the opportunity to capitalize on this growing pool of potential employees. Since Federal programs such as Medicare and Social Security provide the primary supports for older people, the State's costs for the elderly will be minimized.

⁵ Older Americans Update 2006: Key Indicators of Well-Being. Federal Interagency Forum on Aging-Related Statistics. Washington, DC: U.S. Government Printing Office. May 2006. www.agingstats.gov Table 11.

Population Pyramids of Vermont

Percent of Total Population—1980, 2000, 2030 Projected



Population

This report focuses on the 10-year period 2006 to 2016. The population growth for the various age groups during this time period can be seen in the table below. The number of children under 18 years old is projected to decrease each period due to Vermont's declining birth rate. The largest segment of the population is the 40-64 year olds comprising 37% (230,168) of the state's population in 2006. Although the 40-64 year old group captures the majority of the "Baby Boom" generation in 2006, by 2016 some of this cohort will have moved into the 65-74 year old group. This accounts for both the notable drop in the number of 40-64 years olds and the concomitant rise in the number of 65-74 year olds seen in 2016. "Baby Boomers" began turning 60 years old in 2006 and will begin turning 65 in 2011. As a result, the 65-74 year old age group is projected to experience the greatest growth during the next 10-year period.

Vermont Population Growth*

Age	2000 Actual	2006 Projected	2011 Projected	2016 Projected
Under 18	147,523	138,986	130,616	128,363
18-39	180,529	174,796	176,540	180,325
40-64	203,265	230,168	236,984	227,452
65+	77,510	84,646	97,691	118,826
65-74	40,683	44,191	54,987	71,764
75-84	26,831	28,875	29,624	32,687
85+	9,996	11,579	13,080	14,375
Total	608,827	628,595	641,832	654,967

* Numbers may not total due to rounding.
U.S. Census 2000 for "Actual"; MISER for "Projected"

The Vermont population as a whole is projected to grow 4% during the 10-year period 2006 to 2016. The table on the following page depicts the percent change in the projected population growth for each age group during this period. Individuals under 18 years old are projected to decrease 6% during the first 5 years and then another 2% during the second period, ending the 10-year period with an 8% decrease. Although at low risk for needing long term care services, the fastest growing 65-74 year old group is projected to expand a dramatic 62%. Elders age 85 and older (85+) will grow 13% in the first period and an additional 10% in the second period for a ten year projected increase of 24%. Although the "oldest old" are relatively small in number, they have the greatest need for long term care services.

Percent Change in Population Growth*

Age	2006 to 2011 Projected	2011 to 2016 Projected	<i>2006 to 2016 Projected</i>
Under 18	-6%	-2%	-8%
18-39	1%	2%	3%
40-64	3%	-4%	-1%
65+	15%	22%	40%
65-74	24%	31%	62%
75-84	3%	10%	13%
85+	13%	10%	24%
Total	2%	2%	4%

* Growth in the first and second periods does not sum to growth over the 10-year period because growth is compounded over the 10-year period.

The following two pages show the population counts for each county in the state. The baseline 2000 Census and projected 2006, 2011, 2016 counts display the progressive changes over time. Each county has its unique distribution of age groups with some counties having a greater proportion of one age group than another. (See “Age Groups by County” p.10.) For example, Franklin County’s youth (<18) comprises 26% of the county’s population—the highest in the state, whereas Windsor’s youth constitutes 21%. People 65 years and older make up 18% of Bennington County’s population yet this age group comprises only 10% of Chittenden County.

Population growth varies markedly from one county to the next with some counties growing faster than others (see “Percent Change in Growth” p.10). Lamoille County is projected to grow 4.7% compared with Rutland’s growth of 0.5% during the period 2006 to 2011. With regard to age-specific growth, each age group has a different rate of growth; and the growth rate of an age group in one county may be significantly different than the growth of that same age group in another county. In the first instance, Vermonters age 65-74 are projected to grow 24% while those 75-84 are expected to rise only 3% during 2006 to 2011. Regarding the growth rate of a specific age group in one county versus that same age group in another county, Washington County’s 85+ year olds are projected to grow 5% from 2006 to 2011 whereas Caledonia’s are slated to increase 18%. Grand Isle’s dramatic increase for the 85+ is partly a reflection of its small size.

Vermont Population for 2000 Census and 2006, 2011, 2016 Projected

Includes institutionalized. Numbers may not total due to rounding.

2000 Census

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
<18	147,523	8,949	8,758	7,509	34,513	1,653	12,759	1,712	5,645	7,229	6,608	14,739	13,636	10,412	13,401
18-64	383,794	22,960	22,069	17,921	98,278	3,825	27,654	4,339	14,950	17,385	15,717	39,181	36,940	27,631	34,944
65+	77,510	4,065	6,167	4,272	13,780	981	5,004	850	2,638	3,612	3,952	9,480	7,463	6,173	9,073
65-74	40,683	2,146	3,253	2,192	7,364	572	2,765	521	1,391	1,998	2,015	4,850	3,784	3,182	4,650
75-84	26,831	1,422	2,066	1,555	4,576	330	1,686	270	900	1,224	1,440	3,398	2,550	2,117	3,297
85+	9,996	497	848	525	1,840	79	553	59	347	390	497	1,232	1,129	874	1,126
Total	608,827	35,974	36,994	29,702	146,571	6,459	45,417	6,901	23,233	28,226	26,277	63,400	58,039	44,216	57,418

2006 Projected

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
<18	138,986	8,486	8,001	7,015	33,507	1,535	12,489	1,659	5,482	6,559	6,173	13,536	12,755	9,575	12,212
18-64	404,964	24,247	22,748	19,074	104,773	4,017	30,032	4,771	16,109	18,495	16,516	40,474	38,561	28,873	36,275
65+	84,646	4,490	6,572	4,499	15,491	1,072	5,490	1,093	3,083	4,036	4,321	9,990	7,983	6,780	9,747
65-74	44,191	2,355	3,258	2,194	8,193	589	2,940	679	1,728	2,207	2,231	5,065	4,186	3,560	5,005
75-84	28,875	1,551	2,376	1,683	5,094	370	1,911	335	957	1,359	1,459	3,481	2,610	2,269	3,421
85+	11,579	585	938	622	2,204	113	639	80	398	469	630	1,444	1,187	951	1,320
Total	628,595	37,223	37,320	30,588	153,771	6,625	48,011	7,523	24,674	29,090	27,009	64,000	59,299	45,228	58,234

2011 Projected

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
<18	130,616	8,053	7,315	6,698	31,741	1,449	12,081	1,591	5,269	6,017	5,853	12,564	11,958	8,880	11,147
18-64	413,525	24,708	22,849	19,550	108,203	4,062	31,552	5,033	16,826	18,924	16,786	40,565	38,993	29,073	36,400
65+	97,691	5,324	7,278	5,012	18,331	1,227	6,374	1,400	3,737	4,718	4,924	11,203	9,121	7,954	11,087
65-74	54,987	3,105	3,843	2,691	10,366	693	3,659	890	2,230	2,719	2,741	6,151	5,170	4,558	6,171
75-84	29,624	1,544	2,393	1,588	5,387	399	1,966	403	1,066	1,457	1,482	3,466	2,704	2,350	3,418
85+	13,080	675	1,042	733	2,579	135	749	108	441	542	701	1,585	1,247	1,045	1,498
Total	641,832	38,086	37,442	31,260	158,275	6,739	50,007	8,025	25,832	29,659	27,564	64,331	60,072	45,906	58,634

2016 Projected

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
<18	128,363	8,015	7,044	6,768	30,969	1,469	12,113	1,628	5,253	5,863	5,813	12,331	11,655	8,654	10,788
18-64	407,777	24,325	22,147	19,119	108,443	4,001	32,312	5,103	17,019	18,575	16,523	39,189	37,871	28,091	35,060
65+	118,826	6,667	8,371	6,075	22,943	1,405	7,748	1,807	4,714	5,807	5,783	13,195	11,248	9,854	13,210
65-74	71,764	4,193	4,716	3,634	13,957	824	4,772	1,165	2,927	3,581	3,368	7,790	6,927	6,060	7,853
75-84	32,687	1,731	2,478	1,643	6,046	421	2,130	510	1,306	1,615	1,662	3,710	3,021	2,661	3,752
85+	14,375	743	1,177	799	2,940	160	846	132	481	611	754	1,695	1,300	1,133	1,605
Total	654,967	39,007	37,562	31,963	162,355	6,874	52,174	8,538	26,985	30,245	28,119	64,715	60,773	46,599	59,057

Vermont Population for 2000 Census and 2006, 2011, 2016 Projected

Includes institutionalized. Numbers may not total due to rounding.

Age Groups by County–2006 Projected

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
<18	22%	23%	21%	23%	22%	23%	26%	22%	22%	23%	23%	21%	22%	21%	21%
18-64	64%	65%	61%	62%	68%	61%	63%	63%	65%	64%	61%	63%	65%	64%	62%
65+	13%	12%	18%	15%	10%	16%	11%	15%	12%	14%	16%	16%	13%	15%	17%
65-74	7%	6%	9%	7%	5%	9%	6%	9%	7%	8%	8%	8%	7%	8%	9%
75-84	5%	4%	6%	6%	3%	6%	4%	4%	4%	5%	5%	5%	4%	5%	6%
85+	2%	2%	3%	2%	1%	2%	1%	1%	2%	2%	2%	2%	2%	2%	2%
Total	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%

Percent Change in Growth

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
2006-11	2.1%	2.3%	0.3%	2.2%	2.9%	1.7%	4.2%	6.7%	4.7%	2.0%	2.1%	0.5%	1.3%	1.5%	0.7%
2011-16	2.0%	2.4%	0.3%	2.2%	2.6%	2.0%	4.3%	6.4%	4.5%	2.0%	2.0%	0.6%	1.2%	1.5%	0.7%

Percent Change in Growth by Age Group–2006 to 2011 (projected)

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
<18	-6%	-5%	-9%	-5%	-5%	-6%	-3%	-4%	-4%	-8%	-5%	-7%	-6%	-7%	-9%
18-64	2%	2%	0%	2%	3%	1%	5%	6%	4%	2%	2%	0%	1%	1%	0%
65+	15%	19%	11%	11%	18%	14%	16%	28%	21%	17%	14%	12%	14%	17%	14%
65-74	24%	32%	18%	23%	27%	18%	24%	31%	29%	23%	23%	21%	24%	28%	23%
75-84	3%	0%	1%	-6%	6%	8%	3%	20%	11%	7%	2%	0%	4%	4%	0%
85+	13%	15%	11%	18%	17%	20%	17%	35%	11%	16%	11%	10%	5%	10%	13%
Total	2%	2%	0%	2%	3%	2%	4%	7%	5%	2%	2%	1%	1%	1%	1%

Percent Change in Growth by Age Group–2011 to 2016 (projected)

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
<18	-2%	0%	-4%	1%	-2%	1%	0%	2%	0%	-3%	-1%	-2%	-3%	-3%	-3%
18-64	-1%	-2%	-3%	-2%	0%	-2%	2%	1%	1%	-2%	-2%	-3%	-3%	-3%	-4%
65+	22%	25%	15%	21%	25%	14%	22%	29%	26%	23%	17%	18%	23%	24%	19%
65-74	31%	35%	23%	35%	35%	19%	30%	31%	31%	32%	23%	27%	34%	33%	27%
75-84	10%	12%	4%	3%	12%	5%	8%	27%	23%	11%	12%	7%	12%	13%	10%
85+	10%	10%	13%	9%	14%	18%	13%	22%	9%	13%	8%	7%	4%	8%	7%
Total	2%	2%	0%	2%	3%	2%	4%	6%	4%	2%	2%	1%	1%	2%	1%

Disability Trends & Long Term Care

Disability rates for Vermonters under the age of 65 are expected to grow in part because of improved medical care that has allowed children with disabilities to survive birth and early childhood, and allowed adults with disabilities to live longer. Increases in these rates are projected to grow at a slower rate than in the past. The Department’s model predicts that the prevalence of disability will climb by 2.5% annually in the period 2006-2011 and another 1.3% annually in the second period. (See Trends table below.) “Disability” is defined as requiring the help of another person to perform two or more activities of daily living.

Older Vermonters are living longer healthier lives than in previous generations; many will live free of disability for longer periods of time. The decline in disability for elders is attributable to a number of factors: improvements in health, nutrition, and medical treatments; a shift away from manual labor; new medical technologies; lifestyle changes; and improved socioeconomic status, especially with regard to education. Studies have shown that educated individuals have a disability rate half that of less educated people.

The Department’s model predicts a decline in the disability rate of almost 1% annually for Vermonters age 65 and older during the period 2006-2011. This decline persists through the second period, slowing only slightly to -0.8%. (See Trends table below.) (See Appendix, Tables 2 & 3, p.24-27 for detailed disability data.)

Trends in Vermont Disability Rates: Projected *Annual* % Change in Per Capita Disability Rates

Age	2000-2006	2006-2011	2011-2016
Birth-64	3.9%	2.5%	1.3%
65+	-0.9%	-0.9%	-0.8%

In spite of the declining disability rate among elders, the actual number of older Vermonters with a disability is increasing due to population growth. For people age 65 years and older, Vermont is projected to witness a 45% increase in the number of individuals with a disability living in the community. The table below showcases this dramatic rise. This table also shows that the *total* number of people age 65+ who are disabled (the sum of those in the community and those residing in nursing homes) is projected to grow 19% over the period. By comparing the total number of those 65+ disabled with the total population of people age 65+, one can see that the projected growth of the population as a whole (40%) is faster than the projected growth of the total 65+ disabled (19%) which accounts for the overall decline in the elder disability rate.

Number of 65+ Disabled

	2006	2011 proj	2016 proj	<i>% Change</i> <i>2006-2016 proj</i>
65+ Disabled in the Community	3,276	4,001	4,739	45%
65+ in Nursing Homes	2,927	2,758	2,646	-10%
Total 65+ Disabled	6,203	6,759	7,385	19%
Total 65+ Population	84,646	97,691	118,826	40%

As the need for long term care increases, the capacity of the system must grow in concert. Forecasting the expansion of home and community based services can serve as a guide for future growth. Tables 4 and 5 of this report project program utilization for the 10-year period based on changing demographics and “current use patterns” (see Appendix, pages 28-29). In addition, the Department has developed a table (see following page) showing the potential 10-year growth of key services based on changing demographics and a vision of a more balanced long term care system.

The table on the following page features three services: Choices for Care Personal Care, Adult Day Services, and Enhanced Residential Care (ERC). The projection methodology assumes that all counties should be serving a minimum number of people and utilizes the Vermont statewide *Average Use Rate* for each program. (Use Rate = the 2016 projected number of clients ÷ the 2016 projected number of disabled people age 18 years and older living in the community x 100.) For each of the three services, the Department calculated a 2016 projected Vermont average use rate (see green highlight) and applied it to the 2016 projected number of disabled individuals living in the community in each county. In order to achieve the vision of a more balanced long term care system, counties would need to provide services at *either* the state’s 2016 average use rate **or** the 2016 Projected Use enumerated on Table 5 page 29-3 of this report, *whichever is higher*. (Table 5 projections are based on a county’s current use rate in 2006 projected forward to 2016. A county with relatively low use rates in 2006 will have relatively low use rates in 2016.) The following table displays the 2016 number of people to serve (yellow highlight) based on the greater of the two: the 2016 Vermont average use rate (the first blue line) or a county’s current use rate projected forward to 2016 (the second blue line). The asterisks denote counties where the 2016 Vermont average use rate has been applied. The counties with no asterisks currently perform above the state average and are projected to continue doing so, whereas the counties with asterisks are currently performing below the state average but hopefully will rise to the state average by the year 2016.

Projected Growth in Home & Community-Based Services for 2016 Based on a Vision of a More Balanced LTC System 3 Selected Services

Personal Care (CFC): 2016 Proj VT Average Use Rate:	25.3%
# of 2016 Proj Personal Care clients	1,551
# of 2016 Proj 18+ Community Disabled	6,129

Personal Care (CFC)	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
Actual Use Rate in 2006	22%	31%	15%	30%	22%	25%	31%	35%	25%	23%	22%	18%	18%	16%	24%
Actual # Served in 2006	1,014	78	46	70	212	13	90	17	41	51	51	97	73	60	115
2016 # to Serve	1,688	120	110	106	327	18	143	25	67	75	79	175	141	127	175
			*		*						*	*	*	*	
<i>2016 Projected VT Average Use Rate:</i>	1,551	84	110	79	327	17	103	19	59	72	79	175	141	127	160
<i>2016 Projected Use from Table 5:</i>	1,551	120	78	106	320	18	143	25	67	75	77	143	116	88	175

Adult Day: 2016 Proj VT Average Use Rate:	16.8%
# of 2016 Proj Adult Day clients	1,028
# of 2016 Proj 18+ Community Disabled	6,129

Adult Day	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
Actual Use Rate in 2006	14%	53%	14%	31%	8%	8%	18%	6%	27%	14%	10%	8%	12%	11%	10%
Actual # Served in 2006	659	133	43	73	74	4	53	3	44	31	24	40	49	42	46
2016 # to Serve	1,281	200	73	109	217	11	84	12	76	47	52	116	93	84	106
			*		*	*		*			*	*	*	*	*
<i>2016 Projected VT Average Use Rate:</i>	1,028	56	73	53	217	11	68	12	39	47	52	116	93	84	106
<i>2016 Projected Use from Table 5:</i>	1,028	200	72	109	118	6	84	5	76	47	38	61	77	64	71

ERC: 2016 Proj VT Average Use Rate:	5.8%
# of 2016 Proj ERC clients	356
# of 2016 Proj 18+ Community Disabled	6,129

ERC	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
Actual Use Rate in 2006	5%	8%	2%		4%		12%		0.6%	7%	3%	5%	6%	2%	6%
Actual # Served in 2006	207	19	5		34		36		1	15	8	26	23	9	31
2016 # to Serve	444	33	25	18	75	4	66	4	14	23	18	43	40	29	51
			*	*	*	*		*	*		*			*	
<i>2016 Projected VT Average Use Rate:</i>	356	19	25	18	75	4	24	4	14	16	18	40	32	29	37
<i>2016 Projected Use from Table 5:</i>	356	33	11	0	60	0	66	0	1	23	14	43	40	15	51

Any discussion of re-balancing the long term care system needs to include a section on the capacity of institutional settings. Since 1992, Vermont has witnessed a steady decline in nursing facility use upon which the model's 2006-2016 projected nursing home use rates are based. As in the past, the sharpest declines can be seen in those age 85 and older.

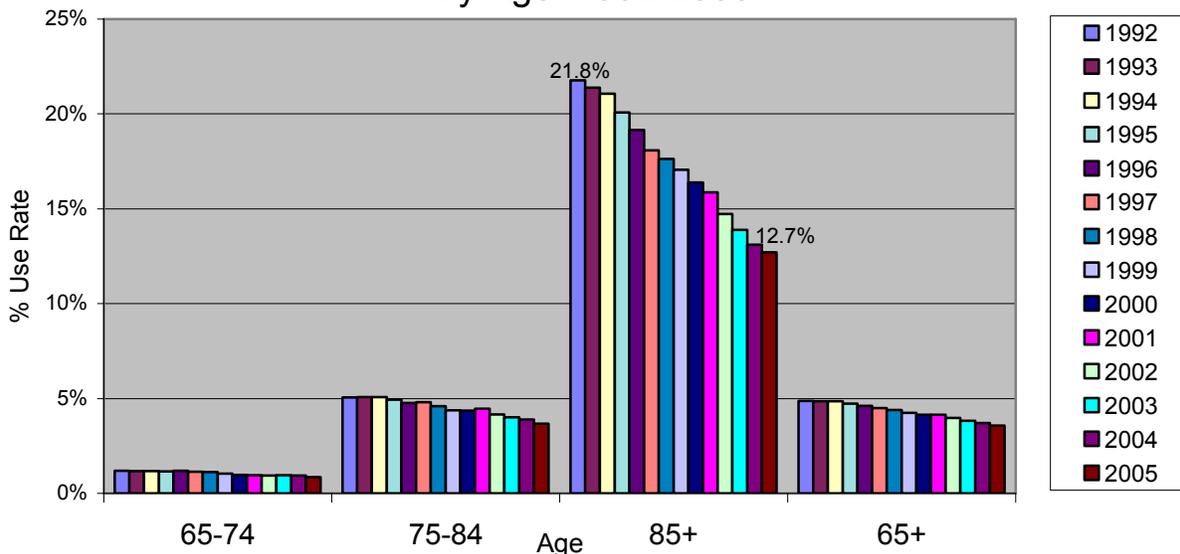
Trends in Vermont Nursing Home Use Rates:
 Projected *Annual % Change* in Per Capita
 Nursing Home Use Rates

Age	2006-2011	2011-2016
18-64	0.1%	0.1%
65-74	-2.9%	-2.9%
75-84	-2.4%	-2.4%
85+	-3.6%	-3.6%

The total number of Vermont's nursing facility residents age 85 and older has declined while the state's overall 85+ population has grown. The chart below shows the yearly downward trend in nursing home use for Vermont's oldest old—those 85+. Factors contributing to this decline are as follows⁶:

- Age-adjusted disability rates for the 85+ have declined over time.
- Poverty rates for the elderly have declined; higher incomes confer more choice.
- Patterns of nursing home use have changed resulting in greater emphasis on short term sub-acute rehabilitation stays.
- Home and community based options for care have grown dramatically.

**Percent of Vermont Elders Residing in Nursing Homes
 By Age 1992-2005**



⁶ Alecxih, Lisa; Nursing Home Use by "Oldest Old" Sharply Declines. The Lewin Group, November 21, 2006.

The bed capacity of Vermont's nursing home system can be measured by comparing the number of beds with the population it serves. By determining the number of nursing home beds per 100 disabled people, one can derive the state's 2006 bed-to-population rate as well as the rate for each county. The table on the following page lists each county, the current number of nursing home beds, the number of disabled people age 18 and older, and the 2006 bed-to-population rate (licensed beds per disabled population). The counties are ranked high to low and divided into two groups, above and below the 2006 Vermont state average bed-to-population rate of 43.1. Bennington County has the highest number of nursing home beds per 100 disabled people (67.8) making it the most "over-bedded" county in the state while Orange County has the lowest (12.6).

Projections of nursing home bed capacity needed over the next ten years can be derived by applying a bed-to-population rate to the 2016 estimated total number of disabled people. For this exercise, the Department assumed that the current 2006 bed-to-population rate of 43.1 (green box) could be held constant over the next ten years; see "2016 Target of 43.1" (yellow box). Utilizing the same bed-to-population rate in 2016 as exists in 2006 is a conservative approach. We know the 2006 rate is reasonable since it currently exists, and holding constant the bed-to-population rate means that most counties would maintain their current bed supply.

Under this scenario, only three of Vermont's 14 counties would need to reduce their nursing home bed capacity to meet the state average bed-to-population rate—Bennington, Orleans and Washington Counties—for a total of 272 beds. (See fifth column from the left "NF Bed Reduction Needed to Reach 2016 Target".) With the aging of society, the total number of disabled individuals is projected to grow from 7,717 in 2006 to 9,010 in 2016 (second and fourth columns). The increasing number of disabled people will have a positive effect on the "over-bedded" status of Rutland County. Over the ten year period, this county's population of disabled will "grow into" its nursing home bed supply. Rutland County ranks above the state average bed-to-population rate in 2006, yet its number of disabled will grow enough by 2016 to put it under the state average thereby requiring "0" bed reductions to reach the 2016 target (fifth column).

Following across the page, the sixth column shows each county's total number of licensed beds at the 2016 target. The subsequent column gives the yearly number of bed closures needed to meet the 2016 target while the remaining columns show the step-wise reductions in bed supply for each year. If these changes in bed supply were to occur, Vermont would have 3,057 nursing home beds by 2016, down from its current 3,329 beds.

**PROJECTED NURSING FACILITY BED CAPACITY 2006 to 2016
NURSING FACILITY (NF) BEDS BY COUNTY
RANKED BY BEDS PER 100 18+ DISABLED POPULATION**

County	2006			2016																
	Licensed NF Beds	Population 18+ Disabled	Licensed NF Beds per 100 18+ Disabled*	Population 18+ Disabled	NF Bed Reduction Needed to	Licensed NF Beds at	NF Bed Reduction per Year for	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	Residents @		
	Jan 2007*	2006 est.*	2006 est.*	2016 est.*	Reach '16 Target	2016 Target	2016 Target	Target	Target	Target	Target	Target	Target	Target	Target	Target	Target	95% occup		
Bennington	545	804	67.8	872	169	376	17	528	511	494	477	461	444	427	410	393	376	357		
Orleans	262	468	56.0	527	35	227	3	259	255	252	248	245	241	238	234	231	227	216		
Washington	459	822	55.9	908	68	391	7	452	445	439	432	425	418	412	405	398	391	372		
Rutland	418	924	45.2	1031	0	418	0	418	418	418	418	418	418	418	418	418	418	397		
Franklin	214	499	42.9	599	0	214	0	214	214	214	214	214	214	214	214	214	214	203		
Caledonia	170	401	42.3	463	0	170	0	170	170	170	170	170	170	170	170	170	170	162		
Windsor	314	774	40.6	894	0	314	0	314	314	314	314	314	314	314	314	314	314	298		
Chittenden	539	1,471	36.7	1807	0	539	0	539	539	539	539	539	539	539	539	539	539	512		
Windham	213	583	36.5	682	0	213	0	213	213	213	213	213	213	213	213	213	213	202		
Addison	105	349	30.0	427	0	105	0	105	105	105	105	105	105	105	105	105	105	100		
Lamoille	60	281	21.3	347	0	60	0	60	60	60	60	60	60	60	60	60	60	57		
Orange	30	239	12.6	312	0	30	0	30	30	30	30	30	30	30	30	30	30	29		
Essex	0	53	0.0	67	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Grand Isle	0	49	0.0	74	0	0	0	0	0	0	0	0	0	0	0	0	0	0		
Vermont	3,329	7,717	43.1	9,010	272	3,057	27	3,302	3,275	3,248	3,220	3,193	3,166	3,139	3,112	3,085	3,057	2,905		
					2016 Target: 43.1															
					Lic'd NF Beds/100 18+ Disabled															

Data Notes: * Includes Veterans Home and Wake Robin.
 Excludes Non-Medicaid/Non-Medicare Facilities (Arbors-12 beds, Mertens-14 beds).
 Disabled Population: Lewin Estimates 2006, defined as "needing assistance with 2 or more activities of daily living".
 NF Beds: DAIL Licensing and Protection, January 2007.
 Does not adjust for beds used by out-of-state residents.
 Lamoille County's 60 NF beds assumes Copley's 40 licensed NF beds plus 20 ERC beds occupied by NF residents.

Shifting the Balance 2007

Vermont has made significant progress in reshaping its long term care system since the implementation of the Choices for Care 1115 Medicaid Waiver in October 2005. This research and demonstration waiver allows Vermont to offer an entitlement to home and community based services thereby achieving its goal of serving more people. Choices for Care functions within a unified budget, combining Medicaid costs for both nursing facilities and home and community based care. Vermont has been able to serve more individuals for the same amount of money because home and community based care generally costs less than institutional care, and people who might otherwise have been served in a nursing facility are now choosing to receive their care at home. In the first year of Choices for Care, Vermont added twice as many new people (200) to its home and community based service system as would have been possible under the previous 1915(c) Medicaid Waiver. Seventeen months into the Choices for Care Waiver (as of March 1, 2007), 1,477 people are receiving Waiver services at home or in alternative settings and 2,086 are being served in nursing facilities. Some of the highlights of the current Waiver include the following:

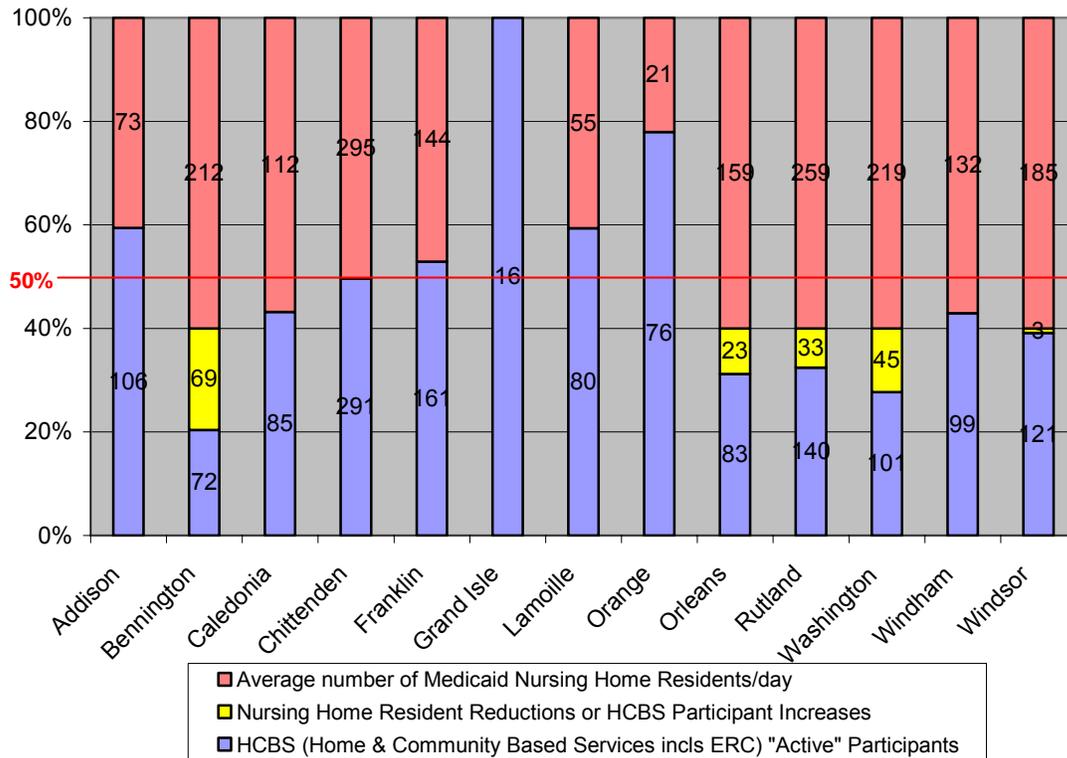
- There are over 300 new people being served today in the Highest and High Need groups since the Waiver began.
- There are about 200 fewer Medicaid residents in nursing homes.
- There is no waiting list at this time; a waiting list of 250 people existed when Choices for Care began.
- Per person costs in the Waiver have remained relatively flat.
- An additional 132 nursing home beds have closed in the past year.

Choices for Care is also creating a wave of innovation that will further expand options for home and community based services. They include:

- An option to permit spouses to be paid caregivers.
- A 24-hour Care option (similar to shared living arrangements for people with developmental disabilities) which will provide an alternative for people who previously had no choice other than a nursing facility or residential care home.
- A pilot “cash and counseling” option (Flexible Choices), which provides even greater consumer direction.
- The opening of Vermont’s first PACE center (Program for All-Inclusive Care for the Elderly).

These changes and innovations challenge conventional thinking about the possibilities for long term care. While the original goal for each county was to have 40 Medicaid home and community based clients for every 60 Medicaid funded nursing home residents (60/40), the Department has come to believe that a 50/50 equal balance is likely in the near future, and that the eventual balance resists predictions. Five of Vermont's counties (Addison, Chittenden, Franklin, Lamoille and Orange) have already met or exceeded a 50/50 balance. (See chart below.)

Medicaid *Choices for Care*: Nursing Home Residents and Home & Community Based Participants--January 2007
Changes (Yellow) Needed to Achieve 60/40 Balance



Meanwhile, the State needs to manage the rightsizing of the nursing facility system, and promote quality and culture change. In terms of rightsizing, one facility recently downsized from 168 beds to 126, and another 90-bed facility closed. In most areas of the state, occupancy levels are increasing to healthy levels as the number of overall beds decreases. In addition, the Governor has proposed changes in the nursing facility rate setting system, a re-basing in Fiscal Year 2008, and an appropriation of nearly \$8 million also in Fiscal Year 2008 to stabilize the nursing home system. At the same time, the State continues to work with nursing facilities on maintaining quality and promoting culture change. The 2006 Vermont Legislature charged the Department with convening a task force and making recommendations on "Nursing Homes for the 21st Century". The Task Force has made fourteen recommendations and the Department is looking at approaches to implement them.

The nursing home industry will be challenged to reinvent itself to respond to consumer demands for change. One can easily envision a future with fewer nursing home beds in facilities that look and feel quite different than the typical nursing home of today.

There are other developments which will continue to influence how Vermont “shifts the balance”. One is the re-organization of the Agency of Human Services which merged the service system for elderly and disabled people with the system for developmentally disabled individuals. The Developmental Disabilities Service system has eliminated its reliance on institutional care and has employed a number of flexible and consumer-directed service options which the rest of the long term care system is learning to employ. Another is the development of a direct care worker association, the Vermont Association of Professional Care Providers. This group’s work will keep the spotlight on the importance of having enough caring and qualified people to serve individuals in need. A third is the continuing work to develop a system which integrates acute, primary and long term care in Vermont. This approach will hopefully result in better care and greater savings that can be re-invested.

The Choices for Care Waiver has opened a door to remarkable and expansive change. While it is impossible to predict the future, it seems certain that a corner has been turned and there will be no looking back as Vermont creates a consumer focused long term care system that offers more options for people to live with independence and dignity in the setting of their choice.

Nursing Facilities

Nursing Home Medicaid Reimbursement Study

The 2006 Vermont Legislature charged the Department of Disabilities, Aging and Independent Living with completing a study of the nursing home reimbursement system. The Task Force included the Commissioner of DAIL, a representative from the Office of Vermont Health Access, the Director of the Division of Rate Setting in the Agency of Human Services, and three representatives from the Vermont Health Care Association (VHCA). This group was charged with making recommendations on changes to the rules, methods, standards, and principles for establishing Medicaid payment rates for nursing facilities in order to meet the protocols and objectives of the Choices for Care Medicaid Waiver. The Legislature appropriated \$25,000 for the study which VHCA matched with another \$25,000.

Most nursing homes, particularly those located near hospitals, have experienced increasing nursing care costs yet the current reimbursement system does not recognize these escalating costs. Nursing care costs became the main focus of the study. After reviewing nearly 30 different reimbursement models, the Task Force agreed to recommend a model that would generate approximately \$3.9 million in higher nursing facility payments, largely targeted to address nursing care costs. The Task Force made additional recommendations and the Department will work with VHCA to follow up on these:

- Retain the current rate setting “occupancy adjustments” based on 90% occupancy, in anticipation of this provision expiring at the end of Fiscal Year 2007.
- Rebase nursing care costs more frequently.
- Enhance the inflation index for nursing care in the non-rebase years.
- Evaluate and develop appropriate dementia/behavioral health payment rules.
- Study the current case mix system to determine if it accurately reflects the care needed by residents and is tied to best practices.

Nursing Facilities for the 21st Century

In response to a charge from the Legislature, the Department convened a task force to examine the future of nursing facilities in Vermont and produce a report on its findings. The Task Force included representation from nursing facilities, the Agency of Human Services, and advocates for older Vermonters and Vermonters with disabilities. The Task Force agreed that significant changes have taken place in Vermont’s long term care system over the last decade, reflecting both changes in

consumer preference and the fact that state and federal funding cannot keep pace with the growing need for long term care if provided primarily by nursing facilities. The Task Force focused on three main areas:

1. Finding other revenue sources for nursing facilities.
2. Right-sizing the industry.
3. Helping nursing facilities become more consumer-responsive and accessible for the benefit of both residents and visitors.

The Task Force agreed that a home-like environment should be the goal for Vermonters who receive their long term care in a nursing home. Nursing facilities should deliver quality care that respects and honors individual backgrounds, customs, values and preferences. The Task Force recommended that the Legislature set aside funding to develop a 10-year plan enumerating approaches to achieve this vision. The Task Force developed 14 recommendations for the Department and eleven for nursing homes. Nursing facilities support these desired changes and are striving to achieve many of them; however, there are various regulatory and reimbursement issues that need to be explored and addressed before significant changes can be achieved.

APPENDIX

ASSUMPTIONS SHEET

Annual % change in per capita disability rate by age group.

Disability Rate Trends (non-MR/DD)

Default values:

	2000-2006	2006-2011	2011-2016
0-64*	3.9%	2.5%	1.3%
65+**	-0.9%	-0.9%	-0.8%

	'00-06	'06-'11	'11-'16
0-64	3.9%	2.5%	1.3%
65+	-0.9%	-0.9%	-0.8%

*Default disability trends for the 0-64 population assumes the same rate of increase as assumed by the Social Security Administration for projections of Disabled Workers (i.e., individuals receiving Social Security Disability Insurance benefits) from the 2006 Annual Trustees Report for those age 18-64. Lewin applied the trends for those age 18-64 to individuals younger than age 18, because projections for individuals younger than age 18 are not available.

**Default disability trends for the 65+ population are informed by disability trends reported by Manton from the National Long Term Care Survey. From Manton's age-adjusted trend analysis, Lewin derived that the percentage of individuals having difficulty with 1+ ADL (2+ ADLs were not reported separately) decreased by 1% annually from 1989 to 1999. The projections assume a slight flattening of this trend in the future.

Nursing Facility Use Rate Trends***

Annual % change in per capita nursing facility use rate by age group.

	2006-2011	2011-2016
18-64	0.1%	0.1%
65-74	-2.9%	-2.9%
75-84	-2.4%	-2.4%
85+	-3.6%	-3.6%

Note: VT historical trends:

	'93-'06	'93-'00	'00-'06
18-64	0.1%	-0.7%	1.0%
65-74	-2.9%	-2.2%	-3.7%
75-84	-2.4%	-2.1%	-2.8%
85+	-3.6%	-3.4%	-3.8%

Default values:

	'06-'11	'11-'16
18-64	0.1%	0.1%
65-74	-2.9%	-2.9%
75-84	-2.4%	-2.4%
85+	-3.6%	-3.6%

***Includes all payers, i.e., both public and private pay nursing facility residents. Default trend assumptions are based on the observed trends in nursing facility use rates calculated on a state fiscal year basis through the second calendar quarter of 2006. Lewin conservatively assumed that the age-specific changes in nursing facility use from 2006 to 2016 will resemble the long term changes observed from 1993 to 2006.

Table 2
Estimated Number of People with LTC Needs¹ by County, 2006, 2011 proj, and 2016 proj.
By Disability Level and Income, Persons of All Ages
Point in Time

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
2006															
Nursing Facility ^{2,3}	3,158	101	492	164	522	-	205	-	118	20	237	392	412	201	295
Community ⁴	623,726	37,107	36,813	30,174	152,947	6,625	47,548	7,523	24,556	29,040	26,472	63,447	58,676	45,028	57,772
All <175% FPL	132,880	7,456	8,123	7,120	31,282	1,683	9,914	1,504	5,241	6,176	6,680	14,465	11,819	9,646	11,772
2+ ADLs	1,883	101	125	101	399	24	124	20	68	90	102	222	163	155	188
1+ ADLs	3,360	181	225	181	712	44	224	36	123	159	180	394	294	268	338
Any ADL or IADL	7,007	377	480	382	1,453	94	471	78	257	332	371	821	615	551	725
All 175%+ FPL	490,846	29,650	28,691	23,054	121,664	4,942	37,634	6,019	19,315	22,864	19,792	48,982	46,858	35,382	46,000
2+ ADLs	2,757	153	192	141	568	30	177	30	98	133	133	319	253	233	298
1+ ADLs	5,072	284	349	258	1,064	55	333	59	184	243	237	575	472	413	545
Any ADL or IADL	11,067	625	759	560	2,342	123	737	134	408	528	507	1,239	1,039	879	1,189
2011 Projected															
Nursing Facility ^{2,3}	2,995	96	459	157	514	-	198	-	114	30	224	362	375	188	278
Community ⁴	637,060	37,971	36,970	30,847	157,454	6,739	49,536	8,025	25,718	29,595	27,032	63,808	59,457	45,719	58,190
All <175% FPL	135,861	7,647	8,157	7,266	32,284	1,714	10,335	1,613	5,494	6,292	6,815	14,552	11,986	9,803	11,905
2+ ADLs	2,194	117	150	117	466	27	147	24	82	102	119	255	191	178	219
1+ ADLs	3,792	204	257	203	809	49	257	44	143	177	203	437	330	300	381
Any ADL or IADL	7,784	421	530	419	1,634	104	531	94	294	368	411	893	676	610	799
All 175%+ FPL	501,199	30,325	28,813	23,581	125,170	5,025	39,202	6,412	20,224	23,303	20,218	49,256	47,471	35,916	46,285
2+ ADLs	3,206	175	229	162	664	34	208	38	118	151	157	365	296	267	343
1+ ADLs	5,705	318	396	286	1,206	62	379	71	214	270	269	636	529	462	608
Any ADL or IADL	12,225	691	834	609	2,612	135	823	159	466	582	561	1,342	1,139	971	1,300
2016 Projected															
Nursing Facility ^{2,3}	2,881	95	437	150	514	-	194	-	114	29	216	340	352	180	260
Community ⁴	650,256	38,891	37,112	31,562	161,532	6,874	51,700	8,538	26,871	30,174	27,598	64,218	60,129	46,419	58,636
All <175% FPL	139,606	7,902	8,239	7,480	33,331	1,760	10,850	1,738	5,777	6,466	6,985	14,725	12,209	10,034	12,111
2+ ADLs	2,521	135	175	134	540	30	171	29	96	115	136	287	220	203	250
1+ ADLs	4,283	231	290	228	925	54	295	52	166	199	227	483	372	338	425
Any ADL or IADL	8,736	477	586	467	1,862	113	604	112	340	414	455	978	758	686	884
All 175%+ FPL	510,650	30,988	28,874	24,082	128,201	5,115	40,850	6,800	21,094	23,708	20,613	49,493	47,921	36,385	46,525
2+ ADLs	3,688	202	265	185	771	38	241	46	140	171	180	412	342	305	390
1+ ADLs	6,457	362	446	321	1,381	68	433	85	251	303	303	704	601	522	678
Any ADL or IADL	13,736	783	920	678	2,975	148	934	189	541	653	625	1,474	1,282	1,095	1,439

¹LTC needs are defined as requiring the help of another person to perform ADLs and/or IADLs. Excludes individuals with mental retardation or developmental disabilities.

²Represents average daily number of nursing facility residents in fiscal year, based on quarterly MDS data (includes Wake Robin but excludes Arbors and Mertens). Nursing facility residents not broken out by income or disability level because data are unavailable.

³Nursing facility "need" assumes that all individuals in nursing facilities in 2006 "needed" nursing facility care. Trend in nursing facility need over time is based on use trend assumption entered on ASSUMPTIONS sheet. All individuals in nursing homes are assumed to have 2+ ADLs.

⁴Community residents include individuals residing in non-institutional settings. This includes people living in their homes, as well as people living in residential care and congregate housing with supportive services.

Sources and Notes:

Estimates and projections of LTC need are modeled using data from the following sources: Vermont-specific data on broad disability and population characteristics from the 2000 Census Public Use Microdata Sample (PUMS); national-level information on specific activity limitations from the 1996 panel of the Survey of Income and Program Participation (SIPP); Vermont-specific information income data from the 1999-2001 Current Population Survey, March Supplement; county-level data on income and population characteristics from the 2000 Census; and assumptions about disability and institutionalization trends entered on ASSUMPTIONS sheet of this workbook.

Table 3

Estimated Number of People with LTC Needs¹ by County, 2006, 2011 proj, and 2016 proj.

Individuals Needing Assistance with 2+ ADLs

By Age Group and Income

Point in Time

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
2006															
Nursing Facility ^{2,3}	3,158	101	492	164	522	-	205	-	118	20	237	392	412	201	295
Community, Low Income (<175%FPL) ⁴	1,883	101	125	101	399	24	124	20	68	90	102	222	163	155	188
<65	672	37	39	34	171	8	48	7	27	30	33	73	60	48	57
<18	34	2	2	2	7	1	3	0	1	2	2	4	3	2	2
18-64	638	36	37	32	164	8	45	7	26	28	31	69	57	45	54
65+	1,211	63	86	66	229	16	77	12	41	60	70	149	103	107	131
65-74	314	16	23	16	55	5	22	5	13	16	17	36	29	26	34
75-84	339	18	25	21	61	5	24	4	12	17	18	42	27	28	39
85+	558	29	38	29	112	6	30	4	17	26	35	72	48	54	58
Community, 175%+ FPL ⁴	2,757	153	192	141	568	30	177	30	98	133	133	319	253	233	298
<65	692	42	39	32	179	7	52	8	28	32	27	68	67	49	63
<18	47	3	3	2	12	0	4	1	2	2	2	5	4	3	4
18-64	645	39	36	30	167	6	48	8	26	30	25	63	62	46	58
65+	2,065	110	153	109	389	23	124	22	71	101	106	251	187	184	235
65-74	472	25	36	22	85	6	31	7	19	24	22	53	48	40	54
75-84	881	47	67	52	160	11	58	10	30	44	42	107	75	74	105
85+	712	38	50	35	145	7	36	5	22	33	42	91	64	69	76

¹LTC Needs defined as requiring the help of another person to perform two or more Activities of Daily Living (ADLs), *excluding* individuals with mental retardation/developmental disabilities.

²Represents average daily number of nursing facility residents in fiscal year, based on quarterly MDS data (includes Wake Robin but excludes Arbors and Mertens). Nursing facility residents not broken out by income or disability level because data are unavailable.

³Nursing facility "need" assumes that all individuals in nursing facilities in 2006 "needed" nursing facility care. Trend in nursing facility need over time is based on use trend assumption entered on ASSUMPTIONS sheet. All individuals in nursing homes are assumed to have 2+ ADLs.

⁴Community residents include individuals residing in non-institutional settings. This includes people living in their homes, as well as people living in residential care and congregate housing with supportive services.

Sources and Notes:

Estimates and projections of LTC need are modeled using data from the following sources: Vermont-specific data on broad disability and population characteristics from the 2000 Census Public Use Microdata Sample (PUMS); national-level information on specific activity limitations from the 1996 panel of the Survey of Income and Program Participation (SIPP); Vermont-specific information income data from the 1999-2001 Current Population Survey, March Supplement; county-level data on income and population characteristics from the 2000 Census; and assumptions about disability and institutionalization trends entered on ASSUMPTIONS sheet of this workbook.

Table 3

**Estimated Number of People with LTC Needs¹ by County, 2006, 2011 proj, and 2016 proj.
Individuals Needing Assistance with 2+ ADLs
By Age Group and Income
Point in Time**

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
2011 Projected															
Nursing Facility ^{2,3}	2,995	96	459	157	514	-	198	-	114	30	224	362	375	188	278
Community, Low Income (<175%FPL) ⁴	2,194	117	150	117	466	27	147	24	82	102	119	255	191	178	219
<65	689	38	39	35	177	8	50	8	28	31	34	74	61	48	57
<18	32	2	2	2	6	1	3	0	1	2	2	4	3	2	2
18-64	657	37	37	33	171	8	48	7	27	29	31	70	58	46	55
65+	1,504	79	111	81	288	19	96	16	53	71	86	181	130	130	162
65-74	399	22	29	20	72	6	29	6	17	20	22	45	36	33	43
75-84	375	19	29	21	68	6	27	5	14	19	20	45	31	31	42
85+	730	38	54	40	148	8	41	6	23	32	44	92	63	66	77
Community, 175%+ FPL ⁴	3,206	175	229	162	664	34	208	38	118	151	157	365	296	267	343
<65	709	43	39	33	185	7	55	9	29	33	27	68	68	50	63
<18	45	3	2	2	11	0	4	1	2	2	2	4	4	3	4
18-64	664	40	37	31	174	6	51	8	27	31	25	64	64	47	59
65+	2,497	132	190	130	479	27	153	29	89	118	129	297	228	217	280
65-74	599	33	44	28	110	7	39	9	25	30	29	66	59	51	68
75-84	971	50	77	53	179	12	64	12	35	48	47	115	85	81	112
85+	928	49	69	49	189	8	50	7	29	40	53	116	84	85	101

¹LTC Needs defined as requiring the help of another person to perform two or more Activities of Daily Living (ADLs), *excluding* individuals with mental retardation/developmental disabilities.

²Represents average daily number of nursing facility residents in fiscal year, based on quarterly MDS data (includes Wake Robin but excludes Arbors and Mertens). Nursing facility residents not broken out by income or disability level because data are unavailable.

³Nursing facility "need" assumes that all individuals in nursing facilities in 2006 "needed" nursing facility care. Trend in nursing facility need over time is based on use trend assumption entered on ASSUMPTIONS sheet. All individuals in nursing homes are assumed to have 2+ ADLs.

⁴Community residents include individuals residing in non-institutional settings. This includes people living in their homes, as well as people living in residential care and congregate housing with supportive services.

Sources and Notes:

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Table 3

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Individuals Needing Assistance with 2+ ADLs
By Age Group and Income
Point in Time**

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
2016 Projected															
Nursing Facility ^{2,3}	2,881	95	437	150	514	-	194	-	114	29	216	340	352	180	260
Community, Low Income (<175%FPL) ⁴	2,521	135	175	134	540	30	171	29	96	115	136	287	220	203	250
<65	725	40	40	37	189	9	55	8	31	32	35	76	63	50	59
<18	34	2	2	2	7	1	3	0	1	2	2	4	3	2	2
18-64	691	38	38	35	183	8	52	8	29	31	33	72	60	47	57
65+	1,796	94	134	97	351	22	116	21	66	83	101	211	157	153	191
65-74	512	29	35	27	97	7	37	8	21	26	27	56	47	43	54
75-84	423	22	32	23	78	6	29	6	17	21	23	49	36	35	47
85+	861	44	67	47	176	9	50	7	28	36	51	106	75	75	91
Community, 175%+ FPL ⁴	3,688	202	265	185	771	38	241	46	140	171	180	412	342	305	390
<65	746	45	40	34	198	7	60	10	31	34	29	71	70	52	65
<18	47	3	2	2	12	0	4	1	2	2	2	5	4	3	4
18-64	699	43	38	32	186	7	56	9	29	32	27	66	66	48	61
65+	2,942	157	225	150	573	31	181	36	109	137	151	341	272	253	325
65-74	763	44	54	38	146	8	50	12	31	38	35	82	75	65	84
75-84	1,088	56	85	56	203	13	71	15	43	53	54	126	98	92	124
85+	1,091	56	86	57	225	10	61	9	35	46	61	133	98	96	117

¹LTC Needs defined as requiring the help of another person to perform two or more Activities of Daily Living (ADLs), *excluding* individuals with mental retardation/developmental disabilities.

²Represents average daily number of nursing facility residents in fiscal year, based on quarterly MDS data (includes Wake Robin but excludes Arbors and Mertens). Nursing facility residents not broken out by income or disability level because data are unavailable.

³Nursing facility "need" assumes that all individuals in nursing facilities in 2006 "needed" nursing facility care. Trend in nursing facility need over time is based on use trend assumption entered on ASSUMPTIONS sheet. All individuals in nursing homes are assumed to have 2+ ADLs.

⁴Community residents include individuals residing in non-institutional settings. This includes people living in their homes, as well as people living in residential care and congregate housing with supportive services.

Sources and Notes:

Estimates and projections of LTC need are modeled using data from the following sources: Vermont-specific data on broad disability and population characteristics from the 2000 Census Public Use Microdata Sample (PUMS); national-level information on specific activity limitations from the 1996 panel of the Survey of Income and Program Participation (SIPP); Vermont-specific information income data from the 1999-2001 Current Population Survey, March Supplement; county-level data on income and population characteristics from the 2000 Census; and assumptions about disability and institutionalization trends entered on ASSUMPTIONS sheet of this workbook.

Table 3a

**Percent Distribution of Community Residents with LTC Needs¹ by County, 2006, 2011 proj, and 2016 proj.
Individuals Needing Assistance with 2+ ADLs, by Age Group**

Persons of All Income Levels

Point in Time

	Vermont (100%)	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
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Age <18

2006	81	5.9%	6.0%	5.7%	22.5%	1.3%	8.8%	1.2%	4.0%	4.8%	5.4%	10.6%	8.8%	7.0%	8.1%
2011 proj.	76	5.9%	5.8%	5.8%	22.7%	1.3%	9.1%	1.2%	4.1%	4.7%	5.4%	10.5%	8.8%	6.9%	7.9%
2016 proj.	80	6.0%	5.7%	5.9%	22.5%	1.3%	9.2%	1.2%	4.1%	4.7%	5.5%	10.5%	8.7%	6.9%	7.7%

Age 18-64

2006	1,283	5.8%	5.7%	4.8%	25.8%	1.1%	7.2%	1.1%	4.0%	4.5%	4.3%	10.3%	9.3%	7.1%	8.8%
2011 proj.	1,322	5.8%	5.6%	4.8%	26.1%	1.1%	7.5%	1.2%	4.1%	4.5%	4.3%	10.1%	9.2%	7.0%	8.6%
2016 proj.	1,390	5.8%	5.5%	4.8%	26.5%	1.1%	7.7%	1.2%	4.2%	4.5%	4.3%	9.9%	9.1%	6.9%	8.4%

Age 18+

2006	4,559	5.5%	6.8%	5.2%	20.8%	1.2%	6.4%	1.1%	3.6%	4.8%	5.1%	11.7%	9.0%	8.4%	10.5%
2011 proj.	5,323	5.4%	7.0%	5.2%	20.9%	1.1%	6.5%	1.1%	3.7%	4.7%	5.1%	11.5%	9.0%	8.3%	10.5%
2016 proj.	6,129	5.4%	7.1%	5.1%	21.1%	1.1%	6.6%	1.2%	3.8%	4.6%	5.1%	11.3%	9.1%	8.2%	10.3%

Age 65+

2006	3,276	5.3%	7.3%	5.4%	18.8%	1.2%	6.1%	1.1%	3.4%	4.9%	5.4%	12.2%	8.9%	8.9%	11.2%
2011 proj.	4,001	5.3%	7.5%	5.3%	19.2%	1.2%	6.2%	1.1%	3.6%	4.7%	5.4%	11.9%	8.9%	8.7%	11.1%
2016 proj.	4,739	5.3%	7.6%	5.2%	19.5%	1.1%	6.3%	1.2%	3.7%	4.6%	5.3%	11.7%	9.1%	8.6%	10.9%

¹LTC Needs defined as requiring the help of another person to perform two or more Activities of Daily Living (ADLs), *excluding* individuals with mental retardation/developmental disabilities. Community residents include individuals residing in non-institutional settings. This includes people living in their homes, as well as people living in residential care and congregate housing with supportive services.

Sources and Notes:

Estimates and projections of LTC need are modeled using data from the following sources: Vermont-specific data on broad disability and population characteristics from the 2000 Census Public Use Microdata Sample (PUMS); national-level information on specific activity limitations from the 1996 panel of the Survey of Income and Program Participation (SIPP); Vermont-specific information income data from the 1999-2001 Current Population Survey, March Supplement; county-level data on income and population characteristics from the 2000 Census; and assumptions about disability and institutionalization trends entered on ASSUMPTIONS sheet of this workbook.

Table 3b

**Distribution of Community Residents with LTC Needs¹ by County, 2006, 2011 proj, and 2016 proj.
 Individuals Needing Assistance with 2+ ADLs, by Age Group
 Persons of All Income Levels
 Point in Time**

	Vermont	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor	
Age <18																
2006	81	5	5	5	18	1	7	1	3	4	4	9	7	6	7	
2011 proj.	76	5	4	4	17	1	7	1	3	4	4	8	7	5	6	
2016 proj.	80	5	5	5	18	1	7	1	3	4	4	8	7	6	6	
Age 18-64																
2006	1,283	75	73	62	331	14	93	15	51	58	55	133	120	92	113	
2011 proj.	1,322	77	74	64	345	14	99	16	54	60	57	134	122	93	114	
2016 proj.	1,390	81	76	67	369	15	108	17	58	63	60	138	126	96	117	
Age 18+																
2006	4,559	249	312	237	949	53	294	49	163	219	231	533	410	383	479	
2011 proj.	5,323	288	374	275	1,112	60	348	61	196	249	272	612	480	440	557	
2016 proj.	6,129	332	435	314	1,293	67	405	74	233	283	312	690	555	502	634	
Age 65+																
2006	3,276	174	239	176	618	39	201	34	112	161	176	400	290	291	366	
2011 proj.	4,001	211	301	211	767	46	249	45	142	189	215	478	358	347	443	
2016 proj.	4,739	251	359	247	924	53	297	57	175	220	252	552	429	406	516	

¹LTC Needs defined as requiring the help of another person to perform two or more Activities of Daily Living (ADLs), *excluding* individuals with mental retardation/developmental disabilities. Community residents include individuals residing in non-institutional settings. This includes people living in their homes, as well as people living in residential care and congregate housing with supportive services.

Sources and Notes:

Estimates and projections of LTC need are modeled using data from the following sources: Vermont-specific data on broad disability and population characteristics from the 2000 Census Public Use Microdata Sample (PUMS); national-level information on specific activity limitations from the 1996 panel of the Survey of Income and Program Participation (SIPP); Vermont-specific information income data from the 1999-2001 Current Population Survey, March Supplement; county-level data on income and population characteristics from the 2000 Census; and assumptions about disability and institutionalization trends entered on ASSUMPTIONS sheet of this workbook.

Actual and Projected Users of Long Term Care Services in Vermont by Program, 2006, 2011, and 2016¹

Selected Programs/Services, Point in Time

	FY 2006 Actual	FY 2011 Proj.	FY 2016 Proj.	Growth Rates	
				2006-2011	2011-2016
Nursing Facilities (All payers) ²	3,158	2,995	2,881	-5%	-4%
Enhanced Residential Care--Choices for Care	207	283	356	37%	26%
Residential Care--ACCS (Medicaid State Plan)	531	659	791	24%	20%
Residential Care -- Private Pay	968	1,208	1,455	25%	20%
Assisted Living (All payers)	245	346	434	41%	25%
Personal Care--Choices for Care	1,014	1,277	1,551	26%	21%
Respite/Companion--Choices for Care	677	850	1,030	26%	21%
Traumatic Brain Injury--Medicaid Waiver	54	55	58	3%	4%
Case Management--Choices for Care	1,240	1,577	1,923	27%	22%
Case Management--Older Americans Act	1,853	2,372	3,106	28%	31%
Attendant Services Program (ASP)	293	332	377	13%	14%
Adult Day (All payers)	659	837	1,028	27%	23%
Homemaker Services	763	967	1,180	27%	22%
Home Delivered Meals--VCIL (age < 60)	249	256	268	3%	5%
Mental Health and Aging	268	340	420	27%	23%

¹Individuals may use more than one service. Residents of Nursing Facilities, Residential Care-Private Pay and Assisted Living represent an average daily census. The FY 2006 number of nursing facility residents was derived by averaging quarterly MDS resident counts. The FY 2006 numbers of Residential Care-Private Pay and Assisted Living residents were derived from a point-in-time census count done in June 2006. User counts for all other services represent the average number of individuals with use during a month. The FY 2006 Medicaid program data are derived from EDS paid claims on date of service; other FY 2006 program data are derived from reported program use. Age distributions for Adult Day were extrapolated from EDS data; age and county distributions for Homemaker were extrapolated from SAMS data; both were applied to their respective provider service counts. FY 2005 Adult Day counts were cumulative. From FY 2006 forward, HASS is subsumed into the Homemaker Program, and Case Management-CFC includes Moderate Needs Group. Assisted Living counts include ACCS and ERC. Prior to FY 2006, ACCS counts included ERC. Respite includes Companion Services from FY 2005 forward. Mental Health & Aging counts were cumulative prior to FY 2006. Counts represent the user's current county of residence. Projections of use assume current use patterns by age, and nursing home and disability trends entered on ASSUMPTIONS sheet. Changes over time therefore are the result of demographic trends and the assumed trends in institutionalization and disability, but assume no other changes in LTC policy.

²Nursing Facility residents include Wake Robin but exclude Arbors and Mertens.

Table 5
Actual and Projected Use¹ of Long Term Care Services in Vermont by Program by County, 2006, 2011, and 2016
Selected Programs/Services
Point in Time

	Vermont ²	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
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FY 2006 Actual

Number of Users

Nursing Facilities (All payers) ³	3,158	101	492	164	522	0	205	0	118	20	237	392	412	201	295
Enhanced Residential Care--Choices for Care	207	19	5	0	34	0	36	0	1	15	8	26	23	9	31
Residential Care--ACCS (Medicaid State Plan)	531	8	17	28	55	18	54	2	22	16	54	111	108	16	22
Residential Care -- Private Pay	968	21	194	24	277	8	37	0	42	37	40	61	136	72	19
Assisted Living (All payers)	245	0	0	0	28	0	0	0	0	0	0	65	0	39	113
Personal Care--Choices for Care	1,014	78	46	70	212	13	90	17	41	51	51	97	73	60	115
Respite/Companion--Choices for Care	677	70	29	49	128	11	67	12	22	37	40	63	45	41	63
Traumatic Brain Injury--Medicaid Waiver	54	2	2	5	2	0	2	0	6	2	2	11	14	2	4
Case Management--Choices for Care	1,240	93	56	74	255	14	134	19	41	60	59	114	93	79	149
Case Management--Older Americans Act	1,853	74	167	117	270	23	127	18	58	61	115	231	140	219	233
Attendant Services Program (ASP)	293	9	15	10	47	0	18	7	13	11	10	77	35	22	19
Adult Day (All payers)	659	133	43	73	74	4	53	3	44	31	24	40	49	42	46
Homemaker Services	763	55	53	37	56	14	22	0	39	53	74	98	132	67	63
Home Delivered Meals--VCIL (age <60)	249	12	19	24	57	4	12	3	7	9	2	32	35	14	19
Mental Health and Aging ⁴	268	27	17	34	34	0	22	0	0	0	0	37	58	39	0

¹Individuals may use more than one service. Residents of Nursing Facilities, Residential Care-Private Pay and Assisted Living represent an average daily census. The FY 2006 number of nursing facility residents was derived by averaging quarterly MDS resident counts. The FY 2006 numbers of Residential Care-Private Pay and Assisted Living residents were derived from a point-in-time census count done in June 2006. User counts for all other services represent the average number of individuals with use during a month. The FY 2006 Medicaid program data are derived from EDS paid claims on date of service; other FY 2006 program data are derived from reported program use. Age distributions for Adult Day were extrapolated from EDS data; age and county distributions for Homemaker were extrapolated from SAMS data; both were applied to their respective provider service counts. FY 2005 Adult Day counts were cumulative. From FY 2006 forward, HASS is subsumed into the Homemaker Program, and Case Management-CFC includes Moderate Needs Group. Assisted Living counts include ACCS and ERC. Prior to FY 2006, ACCS counts included ERC. Respite includes Companion Services from FY 2005 forward. Mental Health & Aging counts were cumulative prior to FY 2006. Counts represent the user's current county of residence. Projections of use assume current use patterns by age, and nursing home and disability trends entered on ASSUMPTIONS sheet. Changes over time therefore are the result of demographic trends and the assumed trends in institutionalization and disability, but assume no other changes in LTC policy.

²County estimates may not sum to state total because the State provides some services to Vermont residents with mailing addresses outside of Vermont.

³Nursing facility residents include Wake Robin but exclude Arbors and Mertens.

⁴Some counties report Mental Health & Aging clients in groups of counties: Caledonia/Essex/Orleans are listed under Caledonia; Franklin/Grand Isle are listed under Franklin; Washington/Orange/Lamoille are listed under Washington; and Windham/Windsor are listed under Windham.

Table 5
Actual and Projected Use¹ of Long Term Care Services in Vermont by Program by County, 2006, 2011, and 2016
Selected Programs/Services
Point in Time

	Vermont ²	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
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FY 2011 Projected

Number of Users

Nursing Facilities (All payers) ³	2,995	96	459	157	514	0	198	0	114	30	224	362	375	188	278
Enhanced Residential Care--Choices for Care	283	26	8	0	47	0	51	0	1	19	11	35	32	12	41
Residential Care--ACCS (Medicaid State Plan)	659	10	21	34	70	19	71	3	26	18	67	139	130	21	28
Residential Care -- Private Pay	1,208	27	237	29	355	9	49	0	50	42	50	76	164	96	25
Assisted Living (All payers)	346	0	0	0	39	0	0	0	0	0	0	94	0	53	161
Personal Care--Choices for Care	1,277	98	62	87	263	16	116	21	54	62	64	120	94	74	145
Respite/Companion--Choices for Care	850	88	40	61	156	13	87	15	29	45	49	77	58	51	81
Traumatic Brain Injury--Medicaid Waiver	55	2	2	5	2	0	2	0	6	2	2	11	14	2	4
Case Management--Choices for Care	1,577	119	76	92	319	17	174	24	53	73	75	144	121	99	190
Case Management--Older Americans Act	2,372	96	219	145	359	27	168	25	76	75	143	292	183	266	297
Attendant Services Program (ASP)	332	10	16	11	52	0	20	8	16	12	10	90	41	24	21
Adult Day (All payers)	837	165	57	90	95	5	68	4	59	39	31	51	62	53	58
Homemaker Services	967	71	69	46	75	17	30	0	53	65	96	120	166	81	78
Home Delivered Meals--VCIL (age <60)	256	12	19	25	59	4	13	3	7	9	2	32	36	14	19
Mental Health and Aging ⁴	340	33	24	41	44	0	29	0	0	0	0	45	76	49	0

¹Individuals may use more than one service. Residents of Nursing Facilities, Residential Care-Private Pay and Assisted Living represent an average daily census. The FY 2006 number of nursing facility residents was derived by averaging quarterly MDS resident counts. The FY 2006 numbers of Residential Care-Private Pay and Assisted Living residents were derived from a point-in-time census count done in June 2006. User counts for all other services represent the average number of individuals with use during a month. The FY 2006 Medicaid program data are derived from EDS paid claims on date of service; other FY 2006 program data are derived from reported program use. Age distributions for Adult Day were extrapolated from EDS data; age and county distributions for Homemaker were extrapolated from SAMS data; both were applied to their respective provider service counts. FY 2005 Adult Day counts were cumulative. From FY 2006 forward, HASS is subsumed into the Homemaker Program, and Case Management-CFC includes Moderate Needs Group. Assisted Living counts include ACCS and ERC. Prior to FY 2006, ACCS counts included ERC. Respite includes Companion Services from FY 2005 forward. Mental Health & Aging counts were cumulative prior to FY 2006. Counts represent the user's current county of residence. Projections of use assume current use patterns by age, and nursing home and disability trends entered on ASSUMPTIONS sheet. Changes over time therefore are the result of demographic trends and the assumed trends in institutionalization and disability, but assume no other changes in LTC policy.

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Table 5
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Selected Programs/Services
Point in Time

Vermont ²	Addison	Bennington	Caledonia	Chittenden	Essex	Franklin	Grand Isle	Lamoille	Orange	Orleans	Rutland	Washington	Windham	Windsor
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FY 2016 Projected

Number of Users

Nursing Facilities (All payers) ³	2,881	95	437	150	514	0	194	0	114	29	216	340	352	180	260
Enhanced Residential Care--Choices for Care	356	33	11	0	60	0	66	0	1	23	14	43	40	15	51
Residential Care--ACCS (Medicaid State Plan)	791	13	25	40	87	21	89	3	31	21	81	167	154	26	35
Residential Care -- Private Pay	1,455	33	280	35	437	9	61	0	59	49	60	92	194	118	30
Assisted Living (All payers)	434	0	0	0	50	0	0	0	0	0	0	118	0	66	201
Personal Care--Choices for Care	1,551	120	78	106	320	18	143	25	67	75	77	143	116	88	175
Respite/Companion--Choices for Care	1,030	108	51	73	188	15	107	18	36	54	59	92	71	60	97
Traumatic Brain Injury--Medicaid Waiver	58	2	2	5	2	0	2	0	7	2	2	11	15	2	4
Case Management--Choices for Care	1,923	147	96	112	389	20	215	29	67	88	90	173	149	119	230
Case Management--Older Americans Act	3,106	129	284	192	494	32	216	32	101	99	190	377	235	346	377
Attendant Services Program (ASP)	377	11	18	12	59	0	24	9	19	13	11	104	48	27	23
Adult Day (All payers)	1,028	200	72	109	118	6	84	5	76	47	38	61	77	64	71
Homemaker Services	1,180	88	85	55	94	19	37	0	69	79	118	143	203	97	93
Home Delivered Meals--VCIL (age <60)	268	13	20	26	64	4	14	3	8	10	2	33	37	15	20
Mental Health and Aging ⁴	420	40	30	49	55	0	37	0	0	0	0	53	95	61	0

¹Individuals may use more than one service. Residents of Nursing Facilities, Residential Care-Private Pay and Assisted Living represent an average daily census. The FY 2006 number of nursing facility residents was derived by averaging quarterly MDS resident counts. The FY 2006 numbers of Residential Care-Private Pay and Assisted Living residents were derived from a point-in-time census count done in June 2006. User counts for all other services represent the average number of individuals with use during a month. The FY 2006 Medicaid program data are derived from EDS paid claims on date of service; other FY 2006 program data are derived from reported program use. Age distributions for Adult Day were extrapolated from EDS data; age and county distributions for Homemaker were extrapolated from SAMS data; both were applied to their respective provider service counts. FY 2005 Adult Day counts were cumulative. From FY 2006 forward, HASS is subsumed into the Homemaker Program, and Case Management-CFC includes Moderate Needs Group. Assisted Living counts include ACCS and ERC. Prior to FY 2006, ACCS counts included ERC. Respite includes Companion Services from FY 2005 forward. Mental Health & Aging counts were cumulative prior to FY 2006. Counts represent the user's current county of residence. Projections of use assume current use patterns by age, and nursing home and disability trends entered on ASSUMPTIONS sheet. Changes over time therefore are the result of demographic trends and the assumed trends in institutionalization and disability, but assume no other changes in LTC policy.

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