85 and older (19.7 percent). Taking into account the size of the underlying population of each age group, adults age 85 and older had the greatest inpatient discharge rate (4,359.5/10,000), followed by those age 75-84 (3,002.4/10,000), and finally adults age 65 - 74 (1,939.8/10,000). Unlike ER discharges in which either ambiguous symptoms or acute injury accounted for the largest number of discharges, the single highest first-listed principal diagnosis for inpatient discharges were diseases of specific body systems, including the circulatory (n = 57,032), respiratory (n = 57,032), digestive (n = 24,626), and musculoskeletal (n = 21,039) systems.

A number of inpatient discharge rates were drastically greater for the oldest Arizonans compared to those ages 65-74. For the first-listed diagnosis of all fractures, the rate for the oldest old (206.6/10,000) was 829 percent greater than the rate for the youngest old (19.6/10,000). Inpatient discharges for diseases of the genitourinary system were 216 percent greater for Arizonans age 85 and older (321.9/10,000) than for Arizonans ages 65-74 (102.0/10,000). For disease of the circulatory system including heart disease, the inpatient discharge rate of the oldest Arizonans (510.2/10,000) was 151 percent higher than was the inpatient discharge rate of adults ages 65 – 74 (203.0/10,000). Finally, inpatient hospitalizations for pneumonia were 255 percent greater for Arizona's oldest old (214.4/10,000) as compared to Arizona's youngest old (60.4/10,000).

4.4 Conclusion

Analysis of demographic characteristics and first-listed diagnoses on ER and inpatient HDD data provides a useful snapshot of the impact of aging on those utilizing the healthcare system in Arizona. According to the HDD data, the demographic characteristics of aging Arizonans being discharged from hospitals becomes less diverse with age, meaning that adults in older age groups were more likely to be White non-Hispanic and female. These results reflect that minority groups have worse health and experience mortality earlier in life than White non-Hispanics, and that female life expectancy tends to be greater than male life expectancy. The fact that females tend to live longer than males helps explain the fact that the number of hospital discharges to widowed Arizonans increases with age. Another fact associated with the increased rate of inpatient and ER discharges among the oldest Arizonans is that morbidity rates increase in the latest years of life, which are disproportionately experienced by White non-Hispanic females. These Arizonans experience some of the most severe morbidities associated with aging and chronic disease and warrant increased attention when developing future policy concerning health and aging.

Examining first-listed diagnosis on HDD ER and inpatient discharges gives us information on what specific morbidities are being experienced by Arizona's aging population. Among older Arizonans, the overall counts of ER and inpatient discharges were higher for adults in the youngest old (ages 65 – 74), but the rate of discharges increased for the oldest Arizonans (age 85 and older), and in some cases, this increase was substantial. The overall rate of ER discharges was more than 100 percent higher for Arizonans in the oldest versus the youngest age group, and this held true for both ER and inpatient discharges. Specific morbidities were especially prevalent among Arizona's oldest adults, with both ER and inpatient discharges reflecting higher rates of fractures and many chronic diseases including those of the circulatory and genitourinary