Kansas Health Statistics

Kansas Department of Health and Environment – Center for Health and Environmental Statistics – Vol. 1 No. 6 August 2000

Hospital Discharge Data Made Available to Health Care Data Governing Board

The Kansas Hospital Association, has made hospital discharge data for Kansas available to the Health Care Data Governing Board.

"This is a tremendous leap forward in our ability to further assess the incidence of disease in the Kansas population and to formulate health policies that can address the most critical health problems in the state," said Sandy Praeger, Senator and Chair of the



Health Care Data Governing Board.

Don Wilson, President of the Kansas Hospital Association said, "Providing these data is a good faith effort by Kansas hospitals to assure that public health officials have the information they need to protect and assure the health of Kansans. This is however, only the beginning. It will be important that we continue to acquire data from other health care settings that provide care."

Since its creation in 1993, the Health Care Data Governing Board has developed data submission, confidentiality and release policies that support the public health purpose of data provided to the state's health care database. Initial database development involved centralization and standardization of health care professional data from eight licensure boards encompassing 44 professions.

Additionally, the Board has recommended a series of 140 health status indicators to monitor the health of the state. Finally, summary level hospital discharge data was incorporated into the database. This latest data acquisition includes hospital discharge data, at the record level, that will provide more flexibility and usability for program managers and researchers with specific needs.

These data will be made available to those conducting analyses for public health program management and research through the Governing Board's approved data request process. For more information, please contact Rachel Lindbloom, Office of Health Care Information, CHES, at 785-296-8627.

Elizabeth W. Saadi, PhD Office of Health Care Information

County Health Profiles Go on Line

Two new web sites provide access to extensive data and health measures for every county in Kansas.

The KDHE Office of Local and Rural Health has posted the Kansas County Health Profiles to the Internet. The profiles, health data books for each of the 105 counties in Kansas, were distributed in hard copy to every local health department and community hospital in Kansas last February.

Each profile contains descriptors of health including population demographics, behaviors, physical environment, diseases, and access to health services. Because of the volume of information, reproducing the materials has proven

difficult and expensive for local communities. The materials are available at

public1.kdhe.state.ks.us/county_health/index.html.

The U.S. Department of Health and Human Services, Health Resources and Services Administration, has also released a Community Health Status Report for every county in the United States. Like the County Health Profile, these reports provide comparison data to other peer counties and to national statistics in order to increase the utility and interpretation of the data. Community Health Status Reports can be found at www.communityhealth.hrsa.gov.

Barb Gibson Office of Local and Rural Health

KIC Site in Beta Testing

The Center for Health and Environmental Statistics Interactive Web site, Kansas Information for Communities (KIC), is in the beta testing phase as this issue of *Kansas Health Statistics* (KHS) was being prepared. Conversion of Kansas data has been completed for births, deaths, and pregnancies. Once the testing is completed, the site will be incorporated into the KDHE main web site.

The Kansas interactive query site is modeled after one created by Missouri. One of the long term goals is to establish a Kansas City metro area interactive health data query web site. Other datasets will be added once the site is up and running. Individuals who subscribe to Kansas Health Statistics will be notified first when the site goes live. To receive this newsletter electronically, e-mail

Kansas.Health.Statistics@kdhe.state.ks.us and ask to be added to the mailing list.

Birth Medicaid Matching Shows Promise

Linking health data, especially births, holds great potential for public health officials. The additional knowledge gained provides valuable insight into both state and local program activities to reduce the disparity among various Kansas populations. While vital statistics data has long been considered the "gold standard" among health data, it lacks indicators on income to help determine disparity based on socio-economic factors. With that additional data, comparison of Medicaid, Food Stamp or WIC populations with the remaining population can provide valuable insight into disparities in prenatal care.

CHES' Office of Health
Care Information has
embarked on a study of
1999 births for which
Medicaid payment was
made. This effort involved
collaborating with the
State's Medicaid agency,
the Department of Social
and Rehabilitation
Services (SRS), to obtain
recipient data. The effort
also coincided with the
KDHE Bureau of Children,

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Youth, and Families' need to maintain and submit health status data for monitoring and program management purposes. While additional Medicaid data remains to be included, the *preliminary* findings indicate less than acceptable birth outcomes for Medicaid-related deliveries.

Kansas SRS staff provided CHES with three data files comprised of 11,747 female Medicaid recipients. The preliminary results are based on a match with 9,005 birth records (76.7%). Kansas SRS officials estimate up to one-third or about 12,700 Kansas births are Medicaid funded. Enhanced matching techniques will be used with the new data to identify other Medicaid births. CHES is still awaiting HMO encounter data to incorporate into the process of linking births and Medicaid status.

Greg Crawford Vital Statistics Data Analysis

Group Reports No Health Insurance Gains for Low-Income Children

The Center for Studying Health System Change, funded by the Robert Wood Johnson Foundation, reports recent trends in children's health insurance coverage shows no gains for low-income kids. The percentage of low-income children who have health insurance has not changed over the last few years, despite expanded public coverage through Medicaid and the State Children's Health Insurance Program (SCHIP).

The Center reports data from 1996-1997 and 1998-1999 show that while the proportion of low-income children with public coverage has increased, the percentage with private insurance coverage has decreased sharply. This, the center says, has resulted in no net change in the percentage who are uninsured.

The Center says possible factors that might explain the recent changes include increases in private insurance premiums, substitution of public for private coverage and changes in the characteristics of low income persons. The study did not determine conclusively the causes of the changes in coverage. For more information, visit www.hschange.org.

Issue Brief Center for Studying Health System Change

Infant Mortality Rates from Kansas' 1995-1998 Linked Birth/Death Files

Infant mortality rates for various infant and maternal characteristics have been calculated from Kansas' linked birth/death files for 1995-1998. In the linked data set information from the death certificate for each infant under one year of age in a particular calendar year is linked to information from the corresponding birth certificate. For analytical purposes, it is especially useful to combine information from the birth and death certificates to utilize many of the additional variables available from the birth certificate. While multiple risk factors may contribute to an individual infant death, it is the purpose of the report from which this article was taken to consider the basic relationship between each separate factor and infant mortality.

Birth weight and period of gestation are the two factors which have the largest impact on infant mortality rates. Infant mortality rates were much higher for low birth weight infants (less than 2,500 grams) than for infants with birth weights of 2,500 grams or more overall (Figure 1). The infant mortality rate for very low birth weight (less than 1,500 grams) infants was 270.1 per 1,000 live births, over 96 times the rate of 2.8 for infants with birth weights of 2,500 grams or more. The rate for

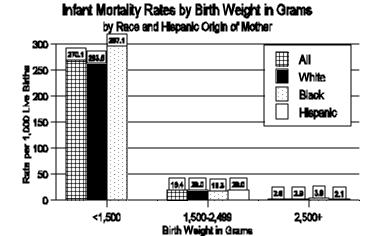


Figure 1

infants with birth weights of 1,500-2,499 grams was 19.4, almost 7 times the rate for infants with birth weights of 2,500 grams or more.

While 6.8 percent of all live births to Kansas residents during the 1995-1998 time period were born with low birth weight, 63.2 percent of the infant deaths from the linked files were low birth weight. It is obvious that infant deaths were associated with significantly lower birth weights than were resident live births. Similarly, only 8.0 percent of births occurred prior to 37 weeks of gestation, but 61.4 percent of infant deaths were of that gestational period.

Mortality rates were highest for very preterm infants (less than 32 weeks gestation) at 241.0, over 80 times the rate of 3.0 for infants with gestation of 37-41 weeks (Figure 2). Moderately preterm infants (gestation of 32-36 weeks) had a mortality rate

Infant Mortality Rate by Period of Gestation in Weeks

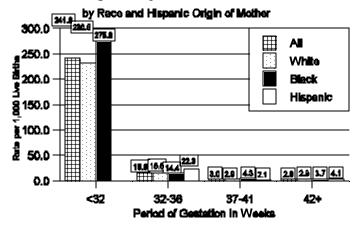


Figure 2

of 15.0, five times the rate of term births (37-41 weeks).

Infant mortality rates for very low birth weight and very preterm delivery were greatest for blacks, at 297.1 and 275.9 respectively, although the differences between those rates and the rates for whites were not statistically significant. Reliable rates for infants born to American Indian, and Asian and Pacific Islander mothers, and mothers of Hispanic origin could not be calculated because of the small number of such births.

Over 9 out of 10 infants with birth weight of less than 500 grams died within the first year of life; nearly all died within the first month. Mortality rates dropped dramatically as birth weight

increased, with about 92 out of 100 infants with birth weight of 1,000-1,249 grams surviving their first year. For more information, contact the Vital Statistics Data Analysis Section at 785-296-8627.

Karen Sommer & Joy Crevoiserat Vital Statistics Data Analysis

Health Care and Elections

Late summer means the beginning of the campaign season. Health care issues are likely to be on the front burner. Michael deCourcy Hinds of Public Agenda, writing in July's *American Demographics*, reviews the polls on health care concerns. Hinds notes that in various polls people repeatedly indicate health care should be a top priority of government, some saying it should be a higher priority than Social Security, taxes, and education. His other findings:

- ! health care issues will sway votes in November;
- protecting patient rights is more important to women, individuals with lower income, Democrats, and older Americans;
- ! government and insurance companies are picking up more of the health care tab;
- ! most people say they're satisfied with their health insurance plan;
- most Americans worry that cost-cutting measures reduce quality of care; and
- ! few people trust HMOs.

Data sources included the 1998 National Health Expenditures report, ABC News/Washington Post polls, Wirthlin Worldwide poll, and Princeton Survey Research/Kaiser poll.

Michael deCourcy Hinds, Public Agenda American Demographics

Carpal Tunnel Syndrome in the Workplace

A total of 17,247 injuries and illnesses that required recuperation away from work beyond the day of incident were reported in private industry workplaces in Kansas during 1998, according to a survey conducted by the Bureau of Labor Statistics, in cooperation with the KDHE, CHES, Office of Health Care Information, and private industry. Of the 1,541 illnesses that were reported in Kansas, Carpal Tunnel Syndrome (CTS) accounted for almost a third (28%), making it second only to hernia in the state. With a decreasing trend due mostly to employer and worker awareness, preventative strategies, and

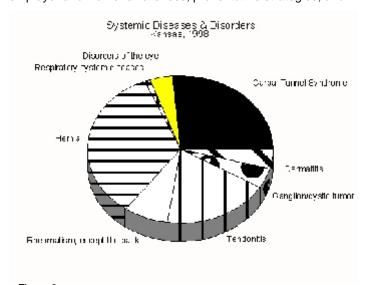


Figure 3
KANSAS HEALTH STATISTICS

workplace safety efforts, the 366 cases reported, along with an incident rate of 4.1, constitutes the lowest number on record for Kansas (Figure 3).

Over half of all CTS cases reported for Kansas in 1996, (55% or 203), occurred to women. The age group that had the highest frequency was workers between 35 to 44, with 143 cases, or 39% of the total. Most of the work force that suffered from Carpal Tunnel Syndrome (45%), had more than five years of experience on the job. However, 75 workers with one to five years of experience on their job accounted for 20% of the total.

Operators, fabricators, and laborers were the occupations that experienced over half of all CTS cases in 1998 (51% or 203). Technical, sales, and administrative support reported 113 cases (31%). Well over half (56%) of all CTS cases in Kansas were in the manufacturing industry, with 203 cases and the highest incidence rate, 9.4 per 10,000 workers. Another significant industry in Kansas was the service industry, accounting for 75 cases (20%) and an incidence rate of 3.3.

Kansas, compared to the nation as a whole, has experienced similar trends of a steady decrease in reported cases over the last six years (Figure 4). This is most likely due

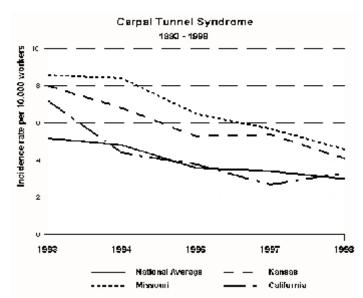


Figure 4

to employer and worker awareness of the illness and their combined efforts to minimize and remediate the problem in the workplace. The national trend for CTS over the last 6 years has been a decrease of 14,753 cases from 1993 to 1998.

In 1993, the United States sustained 41,019 cases of CTS with a rate of 5.2. The decline of both frequency and incidence has dropped steadily each year since (there is no data for 1995 in various states due to lack of funding that year, so that individual year was omitted from the analysis altogether). In 1998, the national figure for cases reported had dropped to 26,266, with an incidence rate of 3.0.

Kansas experienced an even larger decrease in frequency and incidence over that same six year period going from 599 cases, and an incidence rate 8.0 in 1993, to an all time low for Kansas in 1998 of 366 cases, and an incidence rate of 4.1. This was a drop of 39% over the six year period compared to the 36% drop nationally.

In neighboring Missouri the same trend has been occurring for the last 6 years. In 1993, there were 1,431 CTS cases reported, with an incidence rate in the manufacturing industry of 18.8, and an overall incidence rate of 8.6 for this illness. In comparison, Kansas in 1993 experienced 393 cases in the manufacturing industry, with a rate of 22.8, and an overall rate of 8.0. By 1998, in Missouri, the overall reported case count

dropped to 871. Their manufacturing industry incidence rate was down to 10.4, and their service industry incidence rate went from 6.8 in 1993 to 1.8 in 1998. The overall incidence rate dropped to 4.6 per 10,000 people in the work force. Overall, there was a 40% drop in reported cases, one percent greater than that reported for Kansas.

California, notably a high technology service based state, has also seen similar results for this illness in their workforce over the last 6 years. California service industry workers experienced 4,020 cases in 1993, with an incidence rate of 14.2. This compared to a Kansas incidence rate of 3.8 that year for the same industry. Overall, California reported 6,406 CTS illness cases in 1993, and an incidence rate of 7.2, which was 0.8% lower than Kansas that year. By 1998, California had seen a 47% decrease in their total count, dropping to 3,391 with an incidence rate of 3.3, again 0.8% lower than Kansas. This was largely due to the drop in the service industry cases in California, with 1,383 reported cases, and a 28% drop in the Service industry's incidence rate, declining to 4.0 per 10,000 workers

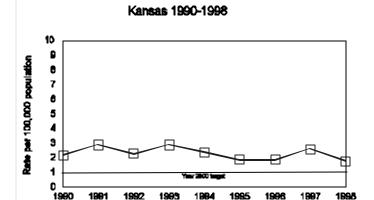
If you would like additional information on Kansas' statistics for occupational injuries or illnesses you may write to KDHE, Office of Health Care Information, Landon State Office Building, 900 SW Jackson, Suite 1002N, Topeka, KS 66612, call 785-296-1058, or e-mail Charles Sann at csann@kdhe.state.ks.us. If you would like additional information on other states across the nation you may e-mail the Bureau of Labor Statistics at www.bls.gov.

Charlie Sann Occupational Injury Surveilance

Cervical Cancer Current Status and Trends

(Editor's Note: This is the latest in a series of regular articles on Kansas' progress toward the Healthy People 2000 and Healthy Kansans 2000 goals. To request a copy of the Healthy Kansans 2000 Mid-Course Review, contact the Bureau of Health Promotion at 785-296-8126.)

Age Adjusted Death Rates for Cervical Cancer



Source: KDHE. Center for Health and Environmental Statistics Rates adjusted to 1940 standard population

Figure 5

Objective: Reduce the age-adjusted death rate for cervical cancer to 1.1/100.000 women

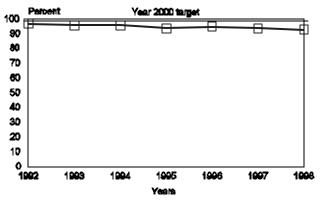
Years

Current status: 1.8/100,000 (1998)

Deaths due to cervical cancer have markedly decreased since 1935. A substantial part of this decline is believed to be due to the Pap smear, a clinical test used to detect non-invasive cancer cells and pre-cancerous cells on the cervix of the uterus¹.

Once identified, these abnormal cells can be destroyed or

Percentage of women aged 18 and older with a uterine cervix who have ever received a pap smear Kansas 1992-1998



Source: Kansas Behavioral Risk Factor Surveillance Bystem

Figure 6

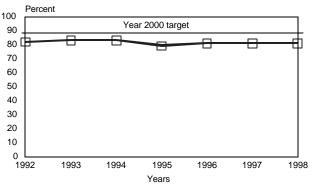
Objective: Increase to 98% the proportion of women aged 18 and older without a prior hysterectomy who have ever received a Pap test. **Current Status:** 93% (1998)

removed, possibly preventing the later development of invasive cancer (while pap smears can detect cancer cells which have become invasive, regular pap smears are intended to identify cervical cancers before they reach the invasive stage). To the extent that the Pap smear not only identifies cancer at an early and treatable stage, but also prevents the development of cancer by identifying pre-cancerous tissue, the test can be considered to be both primary and secondary prevention.

In Kansas since 1979, the age adjusted death rate due to cervical cancer has remained largely unchanged (1.9-3.5 deaths per 100,000 women)²(Figure 5). The deaths of the 30 to 50 women who die each year from cervical cancer are considered largely preventable.

A Pap smear and a pelvic exam should be performed annually in women who are, or have been, sexually active or

Percentage of women aged 18 and older with a Uterine Cervix who received a pap smear within the last 2 years Kansas 1992-1998



Source: Kansas Behavioral Risk Factor Surveillance Survey

Figure 7

Objective: Increase to at least 90% the proportion of women aged 18 and older without a prior hysterectomy who have received a Pap test within the preceding two years.

Current Status: 81% (1998)

who have reached age 18. Ninety-three percent of Kansas women aged 18 and older without a hysterectomy reported

having ever received a Pap smear (Figure 6).

After three or more normal exams, pap smears may be performed less frequently at the discretion of the physician. In Kansas, almost 83% of women aged 18 and older who had not had a hysterectomy reported having a Pap smear within the last two years³ (Figure 7).

The high frequency with which cancer cells and precancerous cells are found through Pap smears ensures death rates will rise without continued aggressive screening.

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- Behavioral Risk Factor Surveillance System (1998), Topeka, KS: Kansas Department of Health and Environment.

Denice Curtis, MPH & Stephen Pickard, MD KDHE Bureau of Health Promotion

Summer Popular for Births

(Editor's Note: This is the latest in a series of several articles on Kansas birth trends reviewed by the Center for Health and Environmental Statistics.)

Nationally, birth rates have been highest in July, August, and September, and lowest in January, November, and December. Birth rates in Kansas for 1995-1998 showed a similar pattern, ranging from a low of 13.2 births per 1,000 population in January 1996 to a high of 15.7 in September 1998. Nationally, monthly birth rates in 1989 through 1997 were slightly higher ranging from 14.0 in January 1997 to 17.6 in August 1990.

Number of Births and Birth Rates* by Month of Occurrence, Kansas, 1994-1998

	1995		1996		1997		1998	
	Number	Rate	Number	Rate	Number	Rate	Number	Rate
Total Births	37,087	14.5	36,524	14.2	37,191	14.3	38,372	14.6
January	3,009	13.8	2,882	13.2	3,048	13.8	3,106	13.9
February	2,780	14.1	2,828	13.8	2,835	14.2	3,006	14.9
March	3,140	14.4	3,062	14.0	3,007	13.6	3,209	14.4
April	3,064	14.5	2,953	14.0	2,866	13.4	3,092	14.3
May	3,257	14.9	3,025	13.8	3,172	14.4	3,136	14.0
June	3,149	14.9	2,977	14.1	3,124	14.6	3,185	14.7
July	3,241	14.9	3,286	15.0	3,332	15.1	3,425	15.3
August	3,261	15.0	3,203	14.7	3,280	14.9	3,318	14.9
September	3,157	15.0	3,265	15.4	3,219	15.1	3,397	15.7
October	3,108	14.3	3,084	14.1	3,181	14.4	3,241	14.5
November	2,941	13.9	2,937	13.9	2,976	14.0	2,953	13.7
December	2,980	13.7	3,022	13.8	3,151	14.3	3,304	14.8

Table 1

Kansas remains below the national figures in the percent of births delivered by cesarean section. From 1995 to 1998 the percent of cesarean births decreased from 17.9 to 16.5 percent, with most of the decrease in primary, rather than repeat, cesarean sections. By comparison, births by cesarean section nationwide declined from 22.8 percent of births in 1989 to 20.8 percent in 1997. Of births to women who had previously delivered by cesarean section, slightly more than three-fourths (75.2 percent) had repeat cesareans in Kansas, 1995-1998.

A full summary is available at www.state.ks.us/ches/.

Joy Crevoiserat

National Injury Query Web Site Started

The National Center for Injury Prevention and Control has established an interactive Web-based injury mortality data site. WISQARSTM, stands for Web-based Injury Statistics Query and Reporting System. Located at www.cdc.gov/ncipc/wisqars, it's designed to provide number of deaths, crude death rates, age adjusted death rates by age, sex, race, state and geographic region. Injury mortality data can be requested by standard external cause of injury groupings, like homicide, motor vehicle traffic, and falls, or by specific intent of injury categories.

Injury Control Update National Center for Injury Prevention and Control

Health Resources Data Directory Updated

The Kansas Health Data Resources Directory is an updated compilation of a survey developed by the Health Care Data Governing Board (HCDGB), Technical Task Force, and the Kansas Center for Health and Environmental Statistics, to catalog the health data resources that exist in Kansas. The purpose of Kansas Health Data Resources is to help policymakers, program managers, providers, and the public locate health information collected in Kansas about Kansans.

While Kansas health care data is collected throughout the state, Kansas Health Data Resources centralizes and serves as a "pointer" and provides information about what data is available, where the data is located and who may be contacted about the data.

The most recent update to the Kansas Health Data Resource Directory was completed in May 2000. The update involved reaching previous contact persons and making updates with the current phone number and the contents of the data source. Approximately 130 health data resource persons were called to update the current information.

This information is located on the HCDGB website at www.ink.org/public/hcdgb/kcdresources.html. Please contact Governing Board staff at 785-368-7316 should you have suggestions for updates or links for this database.

Rachel Lindbloom Health Care Data Analysis

Medicaid Managed Care Coordination

Mathematica Policy Research, Inc. examined five states on the potential for care coordination, an innovative approach to comprehensive care for patients with disabilities and special needs under Medicaid managed care. Their researchers found that care coordination programs take time to develop but can be put in place even after a state has implemented Medicaid managed care. They also noted that for the Medicaid managed care population, care coordination must be broader than simply expanding case management to include referrals for social services. Mathematica reports creative problem solving is a trait care coordinators must cultivate to serve this special population.

Mathematica conducted the study noting it's a timely issue because states are enrolling increasing numbers of these individuals into Medicaid management care. This comes as states devise new care coordination approaches to ensure that psychosocial and medical needs are met. Copies of the policy brief are available at the Mathematica website,

www.mathematica-mpr.com.

Mathematica Policy Research, Inc.

States Surveyed on Medical Error and

^{*} Rates on an annual basis per 1,000 population for specified month.

Adverse Event Reporting

In *To Err is Human*, the Institute of Medicine reported on the high number of medical errors and adverse events that occur in the U.S. health care system each year. As a follow up, the National Academy for State Health Policy surveyed states on how they were addressing the issue. The academy details its findings in a copyrighted report, *State Reporting of Medical Errors and Adverse Events: Results of a 50-State Survey*.

The academy found among the 50 states a lack of standard definitions for medical errors and adverse events. Only 15 states require hospitals to report adverse events. Six states have voluntary reporting of medical errors or adverse events.

Kansas is one of the 15 states with a mandatory reporting law. Hospitals are the only entities required to report, with no reporting requirement for labs, home health agencies, pharmacies, individual health professionals and outpatient mental health centers. Long term care facilities must report adverse events under nursing home licensing requirements.

The survey noted Kansas requires adverse events to be reported within 90 days. For 1997, the most recent year available, 448 adverse events were reported. Reports from events are protected from legal discovery at the time of filing and during investigation. Kansas adverse event data is used to identify trends, assure corrective action, train and educate facility staff, and for public reports.

The adverse event reporting system is maintained by the KDHE Bureau of Health Facilities.

State Reporting of Medical Errors and Adverse Events: Results of a 50-State Survey National Academy for State Health Policy

Health Care Reform Committee Issues

Over the next few months the Health Care Reform Legislative Oversight Committee will be meeting on a number of topics. Among the issues the committee would be considering are:

- ! Complementary/alternative health care
- ! Medicaid drug program
- ! Minority health
- ! Local health departments
- ! Water quality
- ! Health professional shortages in designated areas
- ! The Behavioral Sciences Regulatory Board
- ! Dental health
- ! Credentialing background checks
- ! Medical records/health data issues/confidentiality

The committee's last meeting was August 2. The interim committees' overall schedules can be found at skyways.lib.ks.us/ksleg/KLRD/klrd.html by clicking on "Interim" in the left-hand column. Weekly committee schedules are updated every Thursday and can be found at skyways.lib.ks.us/government/las/schedule.html

Correction

Layout of the 1999 county population numbers in tables contained in the May issue of Kansas Health Statistics resulted in the totals for three counties being reversed. The correct populations are: Marion, 13,544; Marshall, 10,908; and McPherson County 28,815.

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