



Overview of Iowa Public Pension Systems

ISSUE

This **Issue Review** provides basic comparative information between the three public pension systems for state, county, municipal, and school employees that are administered by the state and one pension system for city police and fire employees administered by an independent Board of Trustees. The systems include: the Iowa Public Employees Retirement System (IPERS), the Municipal Fire and Police Retirement System of Iowa (MFPRSI), the Peace Officers' Accident, Disability and Retirement System (PORS), and the Judicial Retirement System. This **Issue Review** will examine the membership, benefit provisions, contribution rates, actuarial assumptions, and financial condition of each of the systems. Definitions of some of the more common actuarial terms used in pension fund administration are also provided in a **Fiscal Topic** titled "[Glossary of Actuarial Terms](#)."

This **Issue Review** does not include information regarding the Teachers Insurance and Annuity Association – College Retirement Equities Fund (TIAA-CREF), the pension system covering many Board of Regents employees.

AFFECTED AGENCIES

Iowa Public Employees Retirement System (IPERS)
Municipal Fire and Police Retirement System of Iowa (MFPRSI)
Peace Officers' Accident, Disability and Retirement System (PORS)
Judicial Retirement System

CODE AUTHORITY

Iowa Code chapter [97A](#)
Iowa Code chapter [97B](#)
Iowa Code chapter [411](#)
Iowa Code chapter [602, Article 9, Part 1](#)

BACKGROUND

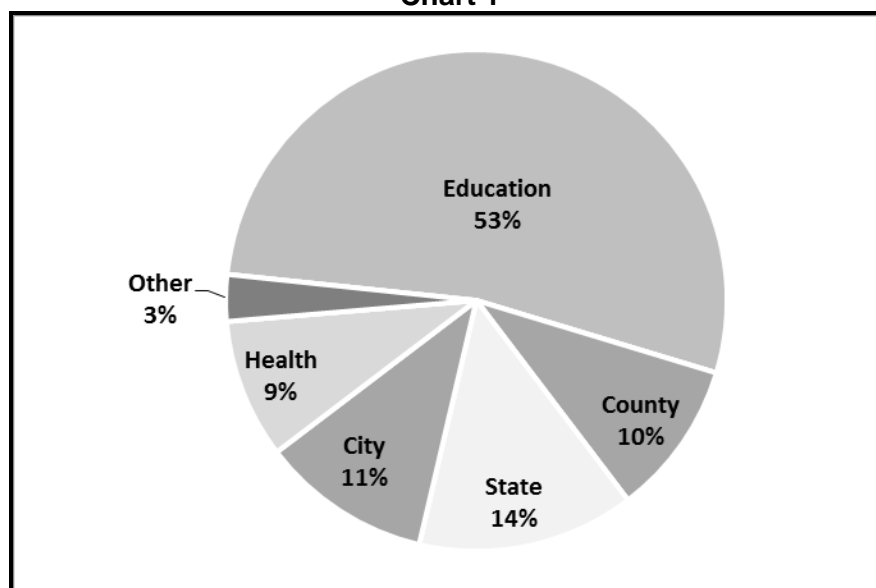
Iowa has four public pension systems covering employees of state government, county and municipal government, and public school employees. As of the 2012 valuations, the four systems had nearly 170,000 active employee members and were providing retirement benefits for more than 106,000 retired public officials. All four systems are defined benefit plans.¹

¹ An employer-sponsored retirement plan in which an employer/sponsor promises a specified monthly benefit on retirement that is predetermined by a formula based on the employee's earnings history, length of service, and age rather than depending directly on individual investment returns. It is 'defined' in the sense that the benefit formula is defined and known in advance. The investment risk is borne by the plan sponsor.

The governance of all four systems begins with the plan sponsors, the General Assembly and the Governor. By statute, they set the membership of each system, provisions for the determination of contribution rates for employers and employees, and benefit provisions of each system. More information for each system is provided below along with a description of the internal governance of each system.

IPERS² – Established on July 4, 1953, to replace the Iowa Old-Age and Survivors' Insurance System, IPERS is the largest of the four systems providing services and benefits to approximately 266,000 active and retired members of about 2,200 covered employers. Employees of the public education system comprise the largest segment of the IPERS membership, followed by state employees, city employees, county employees, and public health employees. The working membership by employer group is reflected in **Chart 1**.

Chart 1



Source: IPERS – [A Legislator's Guide to Iowa Public Employees' Retirement System](#)

There are three “groups” of members that are served by IPERS. The *regular group* includes most state, county, municipal, and public school system employees. *Special services group 1* consists of county sheriffs and deputies and *special services group 2* includes peace officer employees of the Departments of Natural Resources and Transportation, correctional officers, police and firefighters not covered by Iowa Code chapters [400](#), [410](#), or [411](#), county jailers, and emergency medical service providers.

The IPERS Investment Board is comprised of 11 members, seven voting and four nonvoting, and establishes the investment policy and oversees the actuarial analysis of the System. Six members are appointed by the Governor, three are public members and three are members of the System. The seventh voting member is the State Treasurer. The four nonvoting members are two state Representatives and two state Senators. The Benefits Advisory Committee (BAC)³ is comprised of nine voting members, eight of whom are constituents of the system representing employers, active employees, and retired employees, and one public member. The BAC was established to counsel IPERS and the General Assembly on benefits and services. IPERS is an independent state government agency administering the plan.

² For more information see the *Fiscal Topic* [Iowa Public Employees' Retirement System](#) and the [IPERS 2013 valuation report](#).

³ See Iowa Code [§97B.8B](#).

Regular provision members contribute 5.93% of covered wages and employers contribute 8.93% for FY 2014.⁴ Regular IPERS has a multiplier of 2.0% for each year of service up to 30 years with an additional 1.0% for each of no more than five additional years. The maximum benefit available is 65.0% of the average final compensation (AFC) with 35 years of service. The AFC is based on the highest five years of earnings. Normal retirement is at age 65, age 62 with 20 years of service, or rule of 88 (age + years of service = 88). Early retirement penalties of 0.5% apply for each month the member's retirement precedes the normal retirement date for the member for service earned prior to July 2012. For members retired prior to July 1, 1990, a noncompounding cost of living adjustment (COLA), or dividend, based on the Consumer Price Index (CPI) is provided only if the system is fully funded, and is limited to no more than 3.0%.⁵ For members retired on or after July 1, 1990, a favorable experience dividend has been available, payable from a reserve account seeded with just over \$600 million from the IPERS Trust Fund.⁶ This benefit provision will cease after the January 1, 2014, dividend due to the funded status and not a repeal of the applicable law.

Retiring members may select from six irrevocable payment options. They are:

- **Life annuity with a designated lump sum** – Provides a lifetime monthly benefit with a designated lump sum payable to a beneficiary not to exceed the member's total contributions plus interest.
- **Life annuity with a variable decreasing lump sum** – Provides a lifetime monthly benefit with a death benefit equal to the difference between monthly benefits received and total contributions plus interest.
- **Single life annuity** – Provides a lifetime monthly benefit with no survivor benefit.
- **Joint and survivor annuity** – Provides a lifetime monthly benefit plus a death benefit equal to 25.0%, 50.0%, 75.0%, or 100.0% of the member's monthly benefit. Certain restrictions apply.
- **120-month term certain annuity** – Provides a guaranteed monthly benefit for the member for 120 months. If the member dies prior to receiving 120 payments the remaining payments are made to a beneficiary.
- **Joint and survivor pop-up annuity** – Provides a monthly benefit for the life of the member plus a death benefit equal to 25.0%, 50.0%, 75.0%, or 100.0%. If the beneficiary predeceases the member; the monthly benefit is increased to what it would have been under the life annuity with a variable decreasing lump sum.

If a member terminates service prior to the seven-year vesting period, the member is entitled to withdraw the member's contributions plus interest, or roll the amount to another qualified plan. If a vested member terminates service prior to the normal retirement age, the member may withdraw, or receive a deferred benefit at normal retirement age.

As of the June 30, 2012, actuarial valuation, the funded ratio for IPERS regular members was 79.2% and the unfunded actuarial liability (UAL) for regular members was \$5,806 million. IPERS is presently amortizing the UAL using a 30-year open, level percent of pay basis.⁷

The plan for **Sheriffs and Deputies** is administered by IPERS and members contribute 9.88% of covered wages and employers contribute 9.88% for FY 2014. The Sheriffs and Deputies multiplier is on a sliding scale depending on the years of covered employment and a maximum

⁴ Pursuant to Iowa Code section [97B.11](#) IPERS is required to set contribution rates each year that are equal to the required contribution rate. However, the rate set by the system cannot vary by more than one percentage point from the prior fiscal year.

⁵ See [Iowa Code §97B.49F](#).

⁶ For more information on the dividend payments see the *Issue Review* – [IPERS Retirement Dividend Payments](#).

⁷ Beginning with the June 30, 2014, actuarial valuation, IPERS will change to a 30-year closed, level percent of pay basis.

benefit of 72.0% of the AFC with 30 years of service. Normal retirement age is 50 with at least 22 years of covered service. The AFC is based on the highest three years of earnings. No early retirement penalties apply to Sheriffs and Deputies covered employment. Retiring members may select from the same six irrevocable payment options available to regular members. Members are also eligible to receive level payment options where they receive higher IPERS benefits before age 62 and then reduced IPERS benefits after age 62 to provide nearly equal monthly income before and after they become eligible for Social Security benefits.

If a member terminates service prior to the four-year vesting period the member is entitled to withdraw the member's contributions plus interest. If vested, members are entitled to receive a portion of the employer contributions calculated by dividing the years of service by 22, or the member may roll the amount to another qualified plan. Upon termination of employment, members may, in lieu of cashing out of IPERS, leave their investment with IPERS to draw a retirement benefit when eligible.

As of the June 30, 2012, actuarial valuation, the funded ratio for IPERS Sheriffs and Deputies was 88.7% and the UAL was \$57 million. IPERS is presently amortizing the UAL using a 30-year closed level percent of pay basis.

The plan for the [Protection occupations](#) is administered by IPERS and members contribute 6.76% of covered wages and employers contribute 10.14% for FY 2014. The Protection Occupation multiplier is on a sliding scale depending on the years of covered employment and a maximum benefit of 72.0% of the AFC with 30 years of service. Normal retirement age is 55 with at least 22 years of covered service. The AFC is based on the highest three years earnings. No early retirement penalties apply to special service covered employment. Retiring members may select from the same six irrevocable payment options available to regular members. Members are also eligible to receive level payment options where they receive higher IPERS benefits before age 62 and then reduced IPERS benefits after age 62 to provide nearly equal monthly income before and after they become eligible for Social Security benefits.

If a member terminates service prior to the four-year vesting period the member is entitled to withdraw the member's contributions plus interest. If vested, the member is entitled to receive a portion of the employer contributions calculated by dividing the years of service by 22, or the member may roll the amount to another qualified plan.

As of the June 30, 2012, actuarial valuation, the funded ratio for IPERS special services group 2 was 95.1% and the UAL was \$53.0 million. IPERS is presently amortizing the UAL using a 30-year closed, level percent of pay basis.

[MFPRSI](#)⁸ – Established by the 1990 General Assembly,⁹ MFPRSI combined 87 separate fire and police retirement systems from local jurisdictions into the statewide system. Effective January 1, 1992, the separate systems ceased to exist and the respective entities were required to transfer assets equal to their accrued liabilities to MFPRSI.

The MFPRSI Board of Trustees is comprised of nine voting members and four nonvoting legislators, two from the Senate, and two from the House. The nine voting members include four active and retired fire and police members and four city representatives appointed by police and fire associations and the Iowa League of Cities. One private citizen member is selected by the eight appointed trustees. The Board is authorized to make investments, pay benefits, set contribution rates, hire staff and consultants, and perform all functions required in the administration of the System. The System is a distinct entity separate from state government

⁸ For more information see the MFPRSI [2012 valuation report](#).

⁹ [1990 Iowa Acts ch. 1240](#).

and provides services and benefits to 8,000 active members and retired fire and/or police employees from 49 cities with populations of 8,000 or more prior to the federal census conducted in 1990.

The MFPRSI members contribute 9.4% of covered wages and employers contribute 30.12%.¹⁰ MFPRSI has a multiplier of 3.0% for each year of service up to 22 years with an additional 2.0% for each of no more than eight additional years. The maximum benefit available is 82.0% of AFC. The AFC is based on the highest three years of earnings. Normal retirement is at age 55 with 22 years of service. A guaranteed COLA of 1.5% is provided each July 1 and an additional fixed amount is provided to retired members based on the length of time the member has been retired.¹¹

Retiring members may select from four irrevocable payment options. They are:

- **Single life annuity with a designated lump sum** – Provides a monthly benefit for the life of the member with a designated lump sum payable to a beneficiary when the member dies.
- **Single life annuity** – Provides a monthly benefit for the life of the member with no survivor benefit.
- **Joint and survivor annuity** – Provides a monthly benefit for the life of the member plus a death benefit equal to 50.0%, 75.0%, or 100.0% of the member's monthly benefit. The basic benefit is a joint and 50.0% survivor annuity.
- **Joint and survivor pop-up annuity** – Provides a monthly benefit for the life of the member plus a death benefit equal to 75.0% or 100.0%. If the beneficiary predeceases the member the monthly benefit is increased to what it would have been under the basic benefit.

If a member terminates service prior to the four-year vesting period the member is entitled to withdraw the member's contributions plus interest, or roll the amount to another qualified plan. The MFPRSI and the PORS share portability between the two systems that allows the present value of accrued benefits and service to be transferred between the two systems should a vested member of either system terminate service and become an active member of the other system.

The MFPRSI also provides a Deferred Retirement Option Plan (DROP) allowing a member to delay retirement and continue working for up to five years with a portion of the retirement allowance set aside in a separate account.¹²

As of the July 1, 2012, actuarial valuation, the funded ratio for the MFPRSI was 72.0% and the UAL was \$655.2 million. The MFPRSI is presently amortizing the UAL using a 25-year open, level dollar basis.

PORS¹³ – Created on July 4, 1949, PORS is one of two systems that provide benefits to employees and retirees of a single state agency. The PORS provides services and benefits to approximately 1,200 active members and retired peace officer employees of the Iowa Department of Public Safety (DPS).

The PORS Board of Trustees is made up of five voting members. The Commissioner of the DPS serves as the chairperson, the State Treasurer is a statutory member of the Board, one trustee is a retired member elected by peers, one trustee is an active employee elected by

¹⁰ Pursuant to Iowa Code section [411.11](#), the employer contribution rate is adjusted annually to the required contribution as determined by the System Actuary.

¹¹ For information comparing MFPRSI and PORS COLAs, other benefits, and contributions see the *Issue Review* [Peace Officers' Retirement, Accident and Disability System and Municipal Fire and Police Retirement System](#).

¹² For more information on the MFPRSI DROP plan refer to the *Fiscal Topic* paper – [411 System Deferred Retirement Option Plan](#).

¹³ See the *Fiscal Topic* [Peace Officers' Retirement Accident and Disability System \(PORS\)](#) and the PORS [2012 valuation report](#).

peers, and one member is appointed by the Governor. The Board sets the investment policy, oversees the actuarial services for the System, and with the assistance of staff advises the Governor and the General Assembly with regard to benefits and contribution rates. The PORS is managed by one full-time and one part-time staff in the Administrative Services Division of the DPS as required in Iowa Code section [97A.5](#).

PORS members contribute 10.85%¹⁴ of covered wages and the state contributes 29.0%¹⁵ plus an additional appropriation of \$5.0 million beginning July 1, 2013,¹⁶ and continuing until the PORS funded status is 85.0%. The PORS has a multiplier of 2.75% for each year of service up to 32 years. The maximum benefit available is 88.0% of AFC and is based on the highest three years earnings. Normal retirement is at age 55 with 22 years of service. The PORS does include an early retirement provision at the age of 50 and penalties apply based on the number of months retirement precedes the age of 55. A COLA based on the increases received by active members at the same rank and position on the salary scale is provided each July 1 and January 1, plus an additional fixed amount is provided to retired members based on the length of time the member has been retired.

Retiring members may select from four irrevocable payment options. They are:

- **Life annuity with a designated lump sum** – Provides a monthly benefit for the life of the member with a designated lump sum payable to a beneficiary.
- **Single life annuity** – Provides a monthly benefit for the life of the member with no survivor benefit.
- **Joint and survivor annuity** – Provides a monthly benefit for the life of the member plus a death benefit equal to 50.0%, 75.0%, or 100.0% of the member's monthly benefit. The basic benefit is a joint and 50.0% survivor annuity.
- **Life annuity with five-years or 10-years certain** – provides a guaranteed monthly benefit for the member for 60 or 120 months. If the member dies prior to receiving 60 or 120 payments the remaining payments are made to a beneficiary.

If a member terminates service prior to the four-year vesting period the member is entitled to withdraw the member's contributions plus interest, or roll the amount to another qualified plan. The PORS and the MFPRSI share portability between the two systems that allows the present value of accrued benefits and service to be transferred between the two systems should a vested member of either system terminate service and become an active member of the other system. If a vested member terminates service prior to the normal retirement age, the member may withdraw, or receive a deferred benefit at normal retirement age.

As of the July 1, 2012, actuarial valuation, the funded ratio for the PORS was 61.0% and the UAL was \$187.2 million. The PORS is presently amortizing the UAL using a 30-year closed (established in 2008) level percent of pay basis.

Judicial Retirement System¹⁷ – Created on May 12, 1949, this System provides services and benefits to 386 active members and retired judges of the state courts. Membership includes Supreme Court Justices, Court of Appeals Judges, District Court Judges, District Associate Judges, Associate Probate Judges, and Associate Juvenile Judges. Magistrates are covered

¹⁴ Member contributions increase by 0.5% until reaching 11.35% effective July 1, 2014, pursuant to Iowa Code section [97A.8\(1\)\(d\)\(8\)](#).

¹⁵ The state contribution rate is scheduled to increase by 2.0% each year until reaching a maximum contribution rate of 37.0% effective July 1, 2017, unless the normal contribution rate is less, pursuant to Iowa Code section [97A.8\(1\)\(b\)\(2\)](#).

¹⁶ [2010 Iowa Acts ch. 1167, §13](#).

¹⁷ For more information see the *Fiscal Topic* [Judicial Retirement System](#) and the Judicial Retirement System [2013 valuation report](#).

by the Iowa Public Employees' Retirement System (IPERS). The State Court Administrator is granted the authority to oversee the System in Iowa Code section [602.9102](#).

Judicial Retirement System active members contribute 9.35% of covered wages and the state contributes 30.6% during 2014. Judicial Retirement has a multiplier of 3.25% for each year of service up to 20 years. The maximum benefit available is 65.0% of AFC and is based on the highest three years earnings. Normal retirement is at age 65, or 50 with 20 years of service. There is no provision for early retirement for judges.

Judges become vested in the System after four years of covered service. Retiring judges receive an annuity for the life of the judge with 50.0% of that amount payable to an eligible surviving spouse with payments totaling at least the amount of the judge's contributions. A member terminating service prior to retirement is entitled to withdraw the member's contributions plus interest, or roll the amount to another qualified system.

As of the July 1, 2012, actuarial valuation, the funded ratio for the Judicial Retirement System was 68.9% and the UAL was \$53.0 million. The Judicial Retirement System is presently amortizing the UAL using a 25-year closed (established in 2007) level dollar basis.

SYSTEM INFORMATION

A comparison of some basic information for each of Iowa's public pension systems is provided in **Table 1** and **Table 2**. All data is as of the 2012 actuarial valuation.

Table 1

System	IPERS Regular*	IPERS Sheriffs & Deputies	IPERS Protection Occupations	MFPRSI	PORS	Judicial
Active Membership	155,800	1,530	6,870	3,888	618	192
Retired Members	99,324	671	1,682	3,816	541	186
Covered Payroll (in millions)	\$6,510.5	\$95.2	\$322.1	\$258.5	\$43.9	\$25.8
Annual Benefits Paid (in millions)	\$1,392.0	\$18.7	\$387.0	\$126.2	\$23.3	\$9.2
Average Active Member Annual Salary	\$41,820	\$62,996	\$46,732	\$66,491	\$71,040	\$134,167
Average Retired Member Annual Benefit	\$14,136	\$28,284	\$22,286	\$33,084	\$43,402	\$49,561

* IPERS covered employment includes permanent part-time employees which has an unknown impact on average active and retired annual salary and benefit data.

Earnings covered by the MFPRSI and PORS are exempt from Social Security coverage. For members of these systems the earnings while employed by the DPS or a covered city are exempt from the Social Security tax of 6.2% paid on earned income up to the covered wage base of \$113,700 for tax year 2013. Members of PORS and MFPRSI are eligible for a reduced Social Security benefit under the [Windfall Elimination Provision](#) (WEP) of the Social Security Act if they have 40 quarters of qualified employment outside of their PORS and MFPRSI covered employment. The calculations are complicated and vary depending on each individual's social security covered wages and if the pension received is based on work covered, or not covered by social security. Therefore, the implications are not thoroughly explored in this **Issue Review**. Estimates of the effect of the WEP can be obtained using online calculators available on the Social Security website <http://www.socialsecurity.gov/retire2/anyPiaWepjs04.htm>.

Table 2

System	IPERS Regular	IPERS Sheriffs & Deputies	IPERS Protection Occupations	MFPRSI	PORS	Judicial
Vesting Period	7 Years	4 Years	4 Years	4 Years	4 Years	4 Years
Benefit Based On Average	High 5	High 3	High 3	High 3	High 3	High 3
Maximum Service Retirement Benefit/ Years of Service	65%/35	72%/30	72%/30	82%/30	88%/32	65%/20
Cost of Living Adjustment	Yes*	Yes*	Yes*	Yes	Yes	No

* Not guaranteed and are dividends that are not added to the prior monthly benefit and is dependent upon retirement date and funded status.

BENEFIT COMPARISON

For purposes of comparison, **Table 3** provides an estimated benefit calculation for each of the systems, the same assumptions for years of service, wages earned, and age at retirement, in this case age 56.¹⁸ Social Security benefits were also calculated using the online calculators available on the Social Security Administration's website to provide a better indication of the postretirement income available to all members. For the PORS and MFPRSI two estimates are provided, one assuming that the member does continue working in Social Security covered employment after retirement from career employment, and the other assuming the member does not continue working postretirement. To maintain comparability, the same post retirement social security covered wages are assumed for all IPERS members and included in the estimated Social Security benefit. No COLA for Social Security is assumed.

For PORS the pension is assumed to grow at the 15-year average COLA increase of 1.6%. For the MFPRSI member the pension is assumed to grow at the statutory 1.5% plus the fixed escalation amount.

Table 3

Iowa Public Pension System Benefit Comparison							
Pension System	Rate @ 32 YOS	Average Final Comp.	Annual Pension Benefit	Estimated Social Security Benefit	Total Post Retirement Benefit	Benefit Received by Age 62 **	Benefit Received by Age 70
IPERS Regular *	62.0%	\$ 51,705	\$ 32,057	\$ 23,904	\$ 55,961	\$ 192,342	\$ 640,030
IPERS Special Service	75.0%	53,435	40,076	23,904	63,980	240,456	752,296
PORS w/out WEP	88.0%	53,435	47,023		47,023	294,744	735,615
PORS w/ WEP	88.0%	53,435	47,023	8,844	55,867	294,744	871,648
MFPRSI w/out WEP	82.0%	53,435	43,817		43,817	275,715	696,995
MFPRSI w/ WEP	82.0%	53,435	43,817	8,844	52,661	275,715	834,566
Judicial Retirement	65.0%	53,435	34,733	23,904	58,637	208,398	677,494

* Using High-5
** Social Security benefits are not available until age 62. The "Benefit Received by Age 62" represents pension benefits only.
*** YOS = Years of Service. WEP = Windfall Elimination Provision.

ACTUARIAL ASSUMPTIONS AND EXPERIENCE

The actuarial assumptions used by each of the systems are set by the Boards of Trustees with the input and advice of the actuarial firm contracted by the systems. Assumptions are reviewed

¹⁸ Social Security benefits are available at age 62 with a benefit reduced by as much as 25%. Full retirement age is on a sliding scale between ages 66 and 67 depending on year of birth. See page 6 of the Social Security Administration's Retirement Benefits publication [EN-05-10035](#).

every four to five years by the system actuary who conducts an experience study examining the actuarial methods and assumptions and how the experience of the system compares to those methods and assumptions. Economic assumptions such as inflation, wage growth, and investment return are examined as well as the demographic assumptions of mortality, retirement and disability rates, terminations and salary increases, among others. A comparison of several basic actuarial assumptions, plan provisions, and metrics for each of the systems is provided in **Table 4**. All data is as of the June 30, 2012, actuarial valuation.

Table 4

System	IPERS Regular	IPERS Sheriffs & Deputies	IPERS Protection Occupations	MFPRSI	PORS	Judicial
Employee Contribution (% of covered wages)*	5.95%	9.88%	6.76%	9.40%	10.85%	9.35%
Employer Contribution (% of covered wages)*	8.93%	9.88%	10.14%	30.12%	29.00%	30.60%
Actuarial Cost Method	Entry Age Normal	Entry Age Normal	Entry Age Normal	Entry Age Normal	Entry Age Normal	Entry Age Normal
Mortality Table	RP 2000	RP 2000	RP 2000	Weighted**	RP 2000	RP 2000
% Investment return	7.50%	7.50%	7.50%	7.50%	8.00%	7.50%
Normal Cost	10.17%	16.62%	16.04%	18.37%	26.22%	22.03%
Smoothing Period	4 Years	4 Years	4 Years	5 Years	4 Years	4 Years
Amortization Period	30-Year Open***	30-Year Closed	30-Year Closed	25-Year Open	30-Year Closed	25-Year Closed
Amortization Method	Percent of Payroll	Percent of Payroll	Percent of Payroll	Level Dollar	Percent of Payroll	Level Dollar
Funded Ratio	79.20%	88.70%	95.10%	74.00%	61.00%	68.89%
Unfunded Actuarial Accrued Liability – UAAL (in millions)	\$5,805.83	\$56.78	\$53.49	\$655.24	\$187.25	\$52.96
UAAL Per Capita Active	\$37,264	\$37,111	\$7,786	\$168,529	\$302,994	\$275,833
* FY 2014 contribution rate						
** Four-twelfths 1971 Group Annuity Mortality Table and eight-twelfths 1994 Group Annuity Mortality Table						
*** Changes to a 30-year closed period effective 6/30/2014						

One actuarial assumption having a critical impact on the condition of the funds is the investment return. For the three largest of Iowa's public systems, the investment return is expected to exceed 60.0% of the income to the fund. An artificially high assumed return can make the funded status appear much better than it may be. However, continued failure to meet the assumed return could quickly result in an unhealthy pension fund. Over the last 30 years the average market investment return for each of the systems has met the actuarial assumption for earnings. Even with the market downturns in 2000 and 2008, each of the systems have experienced returns averaging near the assumed rate. Data for the 10-year and 30-year average investment returns as of the 2012 actuarial valuation for each of the systems is reflected in **Table 5**.

Table 5

System	Assumed Return	10-Year Average	30-Year Average
IPERS	7.50%	7.84%	11.06%
MFPRSI *	7.50%	7.89%	9.60%
PORS	8.00%	7.12%	10.59%
Judicial **	7.50%	5.52%	7.64%

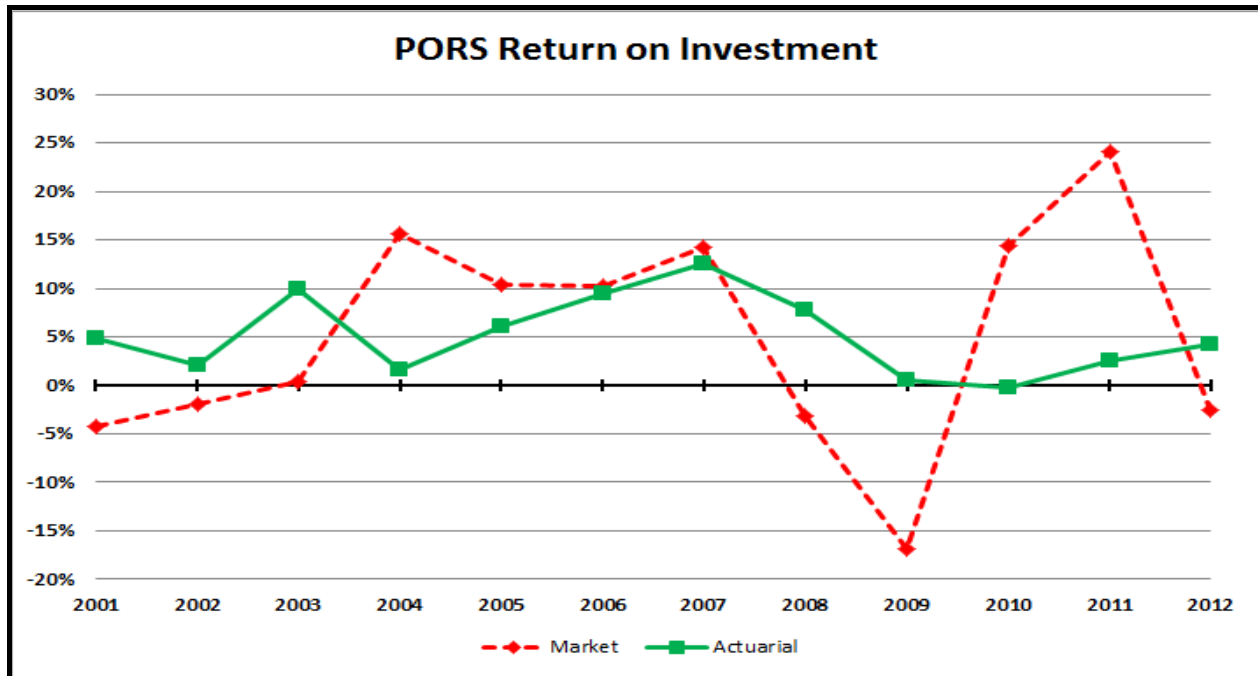
* Since inception on January 1, 1992

** Data prior to 1986 not available

Most retirement systems use a smoothed investment return over a period of four to five years for the determination of asset value thereby removing the volatility inherent in utilizing the

market investment return.¹⁹ The peaks and valleys caused by extraordinary gains and losses are lessened due to the deferred recognition of those gains and losses. As an example, PORS recognizes 25.0% of a gain or loss from each year over a four-year period. **Chart 2** reflects the investment return for the PORS comparing return on market value and actuarial value (smoothed). The effect of smoothing is apparent in the actuarial investment return line which does not have the extreme swings that appear in the market investment return line because investment gains and losses are spread over a four-year period. This plays a critical role in the determination of contribution rates.

Chart 2



Most retirement plans are funded with the intent of accumulating assets over an employee's working career that will be sufficient, with investment earnings, to pay the benefit after they retire. As a result, the ultimate cost of the benefits is allocated to each year of service for all members. If a plan has a funded ratio of 100.0%, it means the current asset value is equal to the amount of costs allocated to past service, i.e. the system is exactly in sync with their funding plan. This typically is not the case, as actual experience frequently varies from that anticipated by the actuarial assumptions. For example, if the investment return assumption is not met, as has been the case over several years of the last decade, and absent some other mitigating factor the plan's funded ratio will decline. To the extent the System's actuarial liability exceeds the actuarial value of assets, an unfunded actuarial liability (UAL) exists and additional contributions are necessary to fund the UAL over time.

When an unfunded actuarial liability exists, the amount will only decline if the contributions and the interest on the UAL to the system are more than the ongoing cost (normal cost). If contributions are less than this amount the unfunded actuarial liability will grow at the assumed investment return rate even if all actuarial assumptions are met. For example, an unfunded actuarial liability of \$1,000,000 will grow \$75,000 over a year's time if the assumed rate of return is 7.5% and no contributions are made to reduce the UAL. The UAL is amortized, or paid off,

¹⁹ According to page 4 of a Morningstar, Inc. study of public pension plans entitled "[The State of State Pension Plans, A Deep Dive into Shortfalls and Surpluses.](#)"

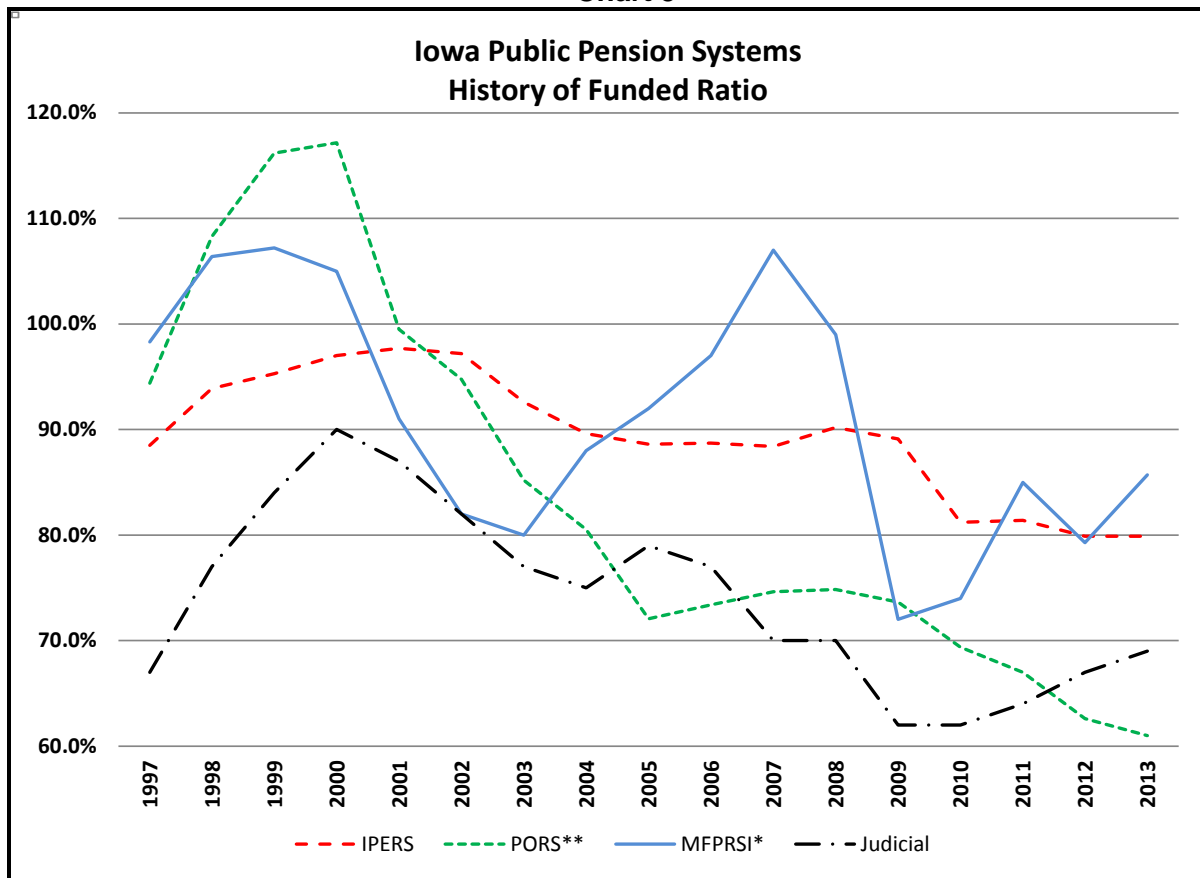
over a long period of time to accumulate the assets needed to cover the shortfall between the portion of the projected liabilities attributable to past service and the current value of assets. The Governmental Accounting Standards Board (GASB) statement 25 currently limits this period to a maximum of 30 years.

Systems use either a closed or open period of time. A closed period requires the liability to be paid off by a date certain, similar to a residential loan. An open period resets the amortization period every year. A closed period will result in a larger actuarial contribution rate and will more quickly improve a system’s funded ratio.

When an unfunded actuarial liability exists, the required contribution rates must be higher in order to fund both the cost of the current year of service for active employees and a portion of the shortfall between the actuarial liability and the actuarial assets (UAL amortization payment). If the required contribution rate is funded and all other economic and demographic variables meet expectations, the system will reach a funded ratio of 100.0% at the end of the amortization period.

A history of funded ratios for each of the public pension systems is provided in **Chart 3**.

Chart 3



*Based on market value of plan assets rather than actuarial value

**Smoothing method implemented July 1, 2001

Because MFPRSI funded ratios are based on market value of plan assets the volatility of the markets is reflected in the blue line. The spike in funded ratio for 2008 recognizes all of the investment gain for that year, reported at 18.9% on a market basis. The other Systems reported funded status on an actuarial value and had not recognized 100% of the gains from 2004-2006.

COMPARISON OF CONTIGUOUS STATES

It is difficult to compare plans from state-to-state due to differences in plan design (defined benefit, defined contribution, or hybrid plans, and postretirement COLA provisions), extremes in plan membership (state only or state, local, and education), contribution structure (single-employer or multi-employer), actuarial assumptions used by the plans (investment return, amortization method). The comparisons provided in this *Issue Review* are intended to provide basic information with regard to plan design, funding strategies, and actuarial assumptions.

General Retirement Systems (plans similar to IPERS) – Of the seven states sharing a border with Iowa, six offer defined benefit plans and one (Nebraska) offers a cash balance plan (see **Attachment A** for more information). Four plans that have comparable membership to IPERS have more than one tier of membership. The tiers are generally based on employment date or retirement system eligibility date and have differing benefit structures and/or contribution rates.²⁰

The average employer contribution rate is 13.19% of covered wages and the average employee contribution is 5.26%. The average funded ratio of the seven systems is 74.79% with a high of 99.8% (Wisconsin) and a low of 34.7% (Illinois). The average return on investment assumption is 7.78% with a high of 8.5% (Missouri) and a low of 7.2% (Wisconsin). The Missouri system requires no contribution from covered employees except for those hired on or after January 1, 2011, and 1.13% of the \$25.5 billion Missouri budget is expended on pension system contributions. The South Dakota plan provides a benefit equal to 100.0% of the average high three years of earnings reduced by post retirement earned income and primary Social Security.

Four of the plans provide benefits for state employees only, while the remaining three provide benefits to county, municipal, and/or school employees. Plan provisions for five of the systems include a postretirement COLA to augment the initial pension calculated at retirement. The average annual benefit for retired members of the seven systems was \$15,881 for 2012 and the average active member salary was \$46,665.

A comparison of basic plan provisions for IPERS and the general pension systems of the seven surrounding states can be found in **Attachment A**. A table showing some of the actuarial assumptions, contribution rates and memberships of IPERS and the seven surrounding states can be found in **Attachment D**.

Public Safety Retirement Systems (plans similar to PORS, MFPRSI and IPERS special service groups) – All seven contiguous states provide a greater benefit for public safety employees than is provided for general retirement system members. The benefit maximums range from a low of 75.0% to a high that is greater than 100.0% of the average final compensation. Plan membership ranges from state and local law enforcement and the inclusion of fire fighters to membership involving the State Patrol only.

The average employer contribution rate is 22.7% of covered wages for the six systems for which data was available. The highest contribution rate reported was 55.23% for Missouri Department of Transportation and State Patrol and the lowest reported was 8.0% (South Dakota). The average employee contribution is 9.44%, the highest of which was Nebraska at 19.0% and the

²⁰ See page 184 of the Legislative Services Agency [2012 Iowa Factbook](#) for comparative information for Iowa and the seven contiguous states.

lowest was Missouri at 4.0%. Missouri required no employee contribution until January 1, 2011, for new hires. The average funded ratio of the bordering states systems is 68.69% with a high of 99.9% (Wisconsin) and a low of 34.7% (Illinois). The average investment return assumption is 7.64% with a high of 8.25% (Missouri) and a low of 7.20% (Wisconsin). A member retiring from the Minnesota State Patrol system with 35 years of service receives a benefit equal to 105.0% of average final compensation.

Four of the public safety plans provide benefits to state employees only, with two providing benefits only to State Patrol employees. Plan provisions for five of the systems include a postretirement COLA to augment the initial pension calculated at retirement. For the six systems for which data was available, the average annual retired member benefit was \$44,504 in 2012. The average active salary for the same period was \$66,504.

A comparison of basic plan provisions for the systems of the seven surrounding states that are similar to PORS and MFPRSI can be found in **Attachment B**. A table showing some of the actuarial assumptions, contribution rates, and memberships for the public safety programs of IPERS, PORS, MFPRSI, and the seven surrounding states can be found in **Attachment D**.

Judicial Retirement Systems – Five of Iowa's neighboring states have a separate retirement system for members of the state judiciary and all provide a different benefit structure than are provided for the general retirement system members. Benefit maximums range from a low of 65.0% of average final compensation to a high of 100.0%.

The average employer contribution is 27.5% of covered wages for the five bordering states with separate judicial systems. The highest employer contribution is 59.7% (Missouri) and the lowest is 7.7% (Nebraska). The average employee contribution rate is 7.2% with a high of 12.1% (Minnesota) and a low of 0.0% (Missouri). The average funded ratio of the five states is 50.3%, the highest being 89.0% (Nebraska) and the lowest was 24.7% (Missouri).

Among the states for which data was available, the average annual active member salary was \$121,405 and the average annual benefit for a retired member was \$59,869. Four of the five state plans include a post-retirement COLA provision.

A comparison of basic plan provisions for those systems of the seven surrounding states that are similar to Iowa Judicial Retirement can be found in **Attachment C**. A table showing some of the actuarial assumptions, contribution rates and memberships for the judicial retirement programs for Iowa and five of the seven surrounding states can be found in **Attachment D**.

BUDGET IMPACT

Public entity contributions to public pension systems, excluding contributions for Board of Regents employees to the Teachers Insurance and Annuity Association – College Retirement Equities Fund (TIAA-CREF), are depicted in **Table 6**.

Table 6

Pension System	FY 2012 Public Contributions *	FY 2012 Employee Contributions *	FY2012 Benefits Paid *
IPERS	\$ 8.4	\$ 366.4	\$ 1,549.2
MFPRSI	61.9	23.4	132.6
PORS	10.7	4.3	23.3
Judicial	8.2	2.5	9.7
Total	\$ 663.4	\$ 396.6	\$ 1,714.8

*Amounts are in millions

Data is not readily available to ascertain the portion of benefits paid to members whose state of permanent residence is still Iowa for all four systems. However, IPERS reports 88.0% of all

benefits are paid to lowans. If the same holds true for the other three, the four public pension systems potentially pump over \$1.5 billion dollars into Iowa's economy each year.

A comprehensive policy review of this subject is available in the Legislative Service Agency's [Legislative Guide to Iowa Public Retirement Systems](#).

STAFF CONTACTS: David Heuton (515-725-0509) david.heuton@legis.iowa.gov
Jennifer Acton (515-281-7846) jennifer.acton@legis.iowa.gov

Other State Pension Systems similar to IPERS general group

Illinois – The State Employee’s Retirement System (SERS) was created January 1, 1944, and is a defined benefit plan. Unused and unpaid sick leave may be used to meet service eligibility requirements as additional service credit. Paid sick and vacation time may be used to meet service eligibility requirements if contributions are made to the system on those payments. However, these payments do not change the average final compensation. Employees covered by Social Security contribute 4.0% and those exempt from Social Security contribute 8.0%. The state matches 38.4% on a covered wage ceiling currently set at \$106,800. The ceiling is increased annually by 3.0% or half of the Consumer Price Index (CPI), whichever is less.

The SERS has a multiplier of 1.67% of covered wages for each year of service for social Security covered employees and 2.2% for non-covered employees. The maximum benefit is 75.0% of the average high eight years of earnings for both groups. Normal retirement age with an unreduced benefit is 60 with eight years of service, or when the member meets the Rule of 85, where the age and years of service are equal to or greater than 85. For those retiring before normal retirement age the pension benefit is reduced by one-half of 1.0% for each month under age 60. The SERS provides for a compounding COLA each January 1 after the first full year of retirement for retired members age 60 and older. The COLA is equal to 3.0% or one-half of the CPI for the prior year, whichever is less.

Members terminating employment are entitled to the employee contributions only and is not entitled to the state contribution or any interest accumulated on the employee’s or the state’s contributions. Members are not eligible to receive a pension from SERS if they have fewer than 10 years of covered service.

Retiring members may select from two irrevocable payment options. They are:

- **Reversionary Annuity** – A member may elect to receive a smaller pension during his lifetime in order to provide a spouse or a designated dependent with a lifetime income. That payment would be in addition to any other benefit payable by the System.
- **Level Income** – A member who contributes to Social Security as a state employee may elect to have his pension payments increased before Social Security normal retirement age and reduced thereafter. To be eligible for this election the member must have established eligibility for a Social Security pension.

Of the seven contiguous states, Illinois’ SERS has the lowest funded percentage at 34.68% as of the [July 1, 2012, actuarial valuation](#), and the Unfunded Actuarial Liability (UAL) based on the actuarial value of assets was \$21,613.9 million. The SERS is presently amortizing the UAL using a 30-year open period on a level percent of projected capped pay basis. Actual annual employee and employer contributions to the system during FY 2012 totaled \$1.65 billion. During FY 2010, pursuant to Illinois Public Act 96-0043, the State infused a total of \$723.7 million into the SERS from a general obligation bond issuance. Debt service contributions on the bond issue are approximately 1.8% through FY 2023.

Kansas – The Kansas Public Employees Retirement System (KPERS) was created in 1962 as a defined benefit plan and provides pension benefits to all state, public school district, and county employees and most municipal employees. The KPERS includes two tiers of membership, those beginning covered employment prior to July 1, 2009, are Tier 1 members and those beginning covered employment on, or after July 1, 2009, are Tier 2 members. Tier 1 members contribute 4.0% of covered wages (increasing to 5.0% in 2014 and 6.0% in 2015) and Tier 2 members contribute 6.0%. The employer contributes 12.37% of covered wages regardless of the employee’s contribution.

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The KPERS has a multiplier of 1.75% for years of service prior to January 1, 2014, and 1.85% per year of covered service after December 31, 2013. Average final compensation is based on the highest five years of earnings, but they are not required to be consecutive years. The plan contains no provision for post-retirement COLAs.

Employees vest with five years of credited service. Normal retirement age from the KPERS is 65 with five years of service or 60 with 30 years of credited service. Members with at least 30 years of service may retire before age 60 with a reduced pension. A Rule of 85 is available to Tier 1 members. Members may select from the following benefit payment options:

- **Straight Life Annuity** – The standard benefit paying a monthly pension for the life of the member.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, 75.0%, or 100.0% of the member benefit for the remainder of the spouse's life.
- **Life Income, 5-Year, 10-year or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 60, 120 or 180 months in benefits the death benefit payable is equal to the remaining monthly payments.
- **Lump Sum Payment** – A lump sum at retirement that must be paid in 10.0% increments and can be no more than 50.0% of the actuarial present value of the standard benefit straight life annuity.

If a member terminates employment other than by retirement they are entitled to employee contributions plus interest at a guaranteed rate of 8.0% if hired before July 1, 1993 and 4.0% if hired on, or after July 1, 1993. Terminating employees that withdraw contributions forfeit all rights under the system and are not entitled to any of the employer contributions.

As of the [December 31, 2012, actuarial valuation](#), the KPERS funded percentage was 55.0% and the UAL was \$9,357.5 million. The KPERS is presently amortizing the UAL using a 40-year closed period (established in 1993), on a level percent of pay basis. In FY 2014, Sub HB 2333 begins directing revenue from the Expanded Lottery Act Revenues Fund to help pay down the KPERS unfunded liability. Expanded Lottery Funds include net gaming revenues collected from state-owned casinos and electronic gaming machines at pari-mutuel racetracks. Legislative estimates place the estimated amount to be approximately \$40.0 million. In addition, if the State of Kansas sells surplus real estate, 80.0% of the proceeds must be used to reduce the unfunded liability of KPERS until the funded ratio of 80.0% is achieved. No estimate of the potential proceeds generated by this measure is presently available.

Beginning January 1, 2015, a new cash balance retirement plan will go into effect for new employees. A "cash balance" plan is a type of defined benefit plan that includes some elements of a defined contribution plan and shares risk between employer and employee. Each member makes contributions equal to 6.0% of covered wages. Employees will earn pay credits quarterly based on years of service. Pay credits represent dollars and are tracked in the member's account along with their contributions. The account balance earns a guaranteed 5.25% interest annually and possibly additional interest based on KPERS' investment returns and funding status. At retirement, the account balance is annuitized to create a guaranteed lifetime monthly benefit. The cash balance plan will have survivor and partial lump-sum payment options. Members can also use part of the account balance to fund future compounding COLAs.

[Minnesota](#) – The Minnesota State Retirement System (MSRS) was established in 1929 as a defined benefit plan. Employees contribute 5.0% of covered wages that is matched by an employer contribution of 5.0%. For members starting covered employment on or after July 1,

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1989, normal retirement age is 66 and retirement before age 66 results in a pension reduced by as much as 46.29% at age 55. The benefit is a level formula based on the average high five consecutive years salary times a multiplier of 1.7% per year of covered service with a maximum benefit of 68.0% (40 years of service).

A Rule of 90 (combined age and years of service) providing an unreduced pension at any age is available for members beginning covered employment prior to July 1, 1989. Two methods are available for calculating a retirement benefit for employees in this group. The level formula as described above is available and a "Step" formula that employs two multipliers. A multiplier of 1.2% is applied to the first 10 years and a multiplier of 1.7% to those years of service in excess of 10. The benefit to the Step formula is a reduced early retirement reduction allowing retirement as early as age 50 with a reduction factor of 36.0%.

Retiring members may select from several irrevocable payment options. They are:

- **Single Life Benefit** – Monthly payments for the life of the member with a refund of any unpaid balance of the member's account paid to the beneficiary.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, 75.0%, or 100.0% of the member benefit for the remainder of the spouse's life.
- **Life Income, 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 180 months in benefits the death benefit payable is equal to the remaining monthly payments and may be made to more than one surviving beneficiary.

An annual postretirement benefit increase of 2.0% of the member's monthly benefit is provided for the life of the pensioner and beneficiary.

Members terminating service after the five-year vesting period may choose to leave contributions in the fund and request a deferred benefit that grows at a rate of 2.5% or 3.0% per year, depending on date of hire, until the member begins receiving a benefit. Members requesting a refund are entitled to the employee contributions plus guaranteed interest of 6.0%. The terminating member is not entitled to any of the employer contribution or accumulated interest on employer contributions.

As of the [July 1, 2012, actuarial valuation](#), the funded percentage of the system was 82.7% and the UAL was \$1,920.9 million. The MSRS is presently amortizing the UAL using a 30-year closed period (established in 2009) on a level percent of pay basis.

Missouri – Created in 1955 by Chapter 104 of the Missouri Revised Statutes, the Missouri State Employee's Retirement System (MOSERS) is a defined benefit plan providing benefits to state employees. Employees beginning covered service after July 1, 2011, contribute 4.0% of pay and the State contributes 16.98% of pay. Employees establishing membership prior to July 1, 2011, make no contributions toward their retirement benefit. Members that terminate service before the required vesting period of 10 years are entitled to a refund of employee contributions plus accumulated interest. Once an employee becomes eligible for a retirement benefit they may not request a refund of contributions.

Retirement eligibility begins at age 67 with 10 years of service or when the member's age and years of service total 90. If neither condition is met, an early retirement reduction factor of 0.5% is applied for each month prior to age 67. The MOSERS includes a monthly minimum base benefit of \$15 per year of service. A member with 25 years of service is guaranteed at least \$375 per month (25 x 15 = 375). The MOSERS also includes a "temporary benefit formula" providing a benefit to supplement other income until the retired member reaches the age of 62.

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The formula for the temporary benefit is 0.8% x years of service x average final pay. To receive the temporary benefit the member must retire under the Rule of 90 provisions.

Retiring members may select from several irrevocable payment options. They are:

- **Single Life Benefit** – Monthly payments for the life of the member with a refund to the beneficiary of any unpaid balance in the member's account.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, or 100.0% of the member benefit for the remainder of the spouse's life.
- **Life Income, 10-year or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 120 months, or 180 months in benefits (depending on the options selected), the death benefit payable is equal to the remaining monthly payments and may be made to any surviving beneficiary.

The System provides a postretirement COLA equal to 80.0% of the CPI, but no more than 5.0% of the monthly benefits are provided every year on the anniversary of retirement. Should a member terminate employment prior to the 10 years required for vesting the member is entitled to the employee's contributions plus accumulated interest on the employee's contributions. The member forfeits all benefits under MOSERS and is not entitled to any of the employer contributions.

As of the [June 30, 2012, actuarial valuation](#), the funded percentage of the MOSERS was 73.16% and the UAL was \$2,896.5 million. The MOSERS is presently amortizing the UAL using a 30-year open period on a level percent of pay basis.

Nebraska – The Nebraska Public Employee's Retirement Systems (NPERS) was established as a defined contribution plan in 1964. A cash balance benefit was added in 2002 and employees beginning employment after January 1, 2003, have been automatically enrolled in the plan. Employees contribute 4.8% of covered compensation and the state contribution is 7.49% of covered wages. If a member terminates employment after vesting, they are entitled to both employee and employer contributions, plus interest. Cash balance participants are guaranteed a rate of return equal to the federal mid-term rate¹ as published by the Internal Revenue Service plus 1.5%, but in no case less than 5.0%.

Members who had been in the defined contribution plan had the option to transfer to the cash balance option in 2003, 2008, and 2013. There is no guaranteed rate of return for the defined contribution plan and members make their own investment decisions for both employee and employer contributions. The members of the defined contribution plan assume all of the risk and receive all of the benefit from that investment risk.

Payment options at retirement for both the defined contribution plan and the cash balance plan include deferral of payments until a later date (no later than age 70½), a monthly annuity, rollover distribution to another qualified plan, a lump sum distribution, or a combination of any of the above. The defined contribution plan has an additional option of systematic withdrawal (quarterly, semi-annual or annual distributions). All payment options have the same actuarial value as that of an immediate lump sum payment at retirement.

If an annuity is purchased, the member must specify whether or not a COLA is desired. If the COLA option is selected, the COLA is a 2.5% compounding increase to the annuity each year. Annuities may be purchased in several forms. They are:

- **Life Only Annuity** – Monthly payments for the life of the member with no refund or death benefit.
- **Modified Cash Refund Annuity** – Monthly payments for the life of the member with a death benefit paid to any beneficiary equal to the difference between the amount received by the member and the amount required to purchase the annuity.

¹ The federal mid-term rate is based on the average market yield during the calendar month of the determination on outstanding marketable obligations of the United States with maturities of at least three, but no more than nine years.

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- **Period Certain and Continuous Annuity** – Monthly payments for the life of the member. If the member dies before receiving the designated period of 60, 120, or 180 months the death benefit payable is equal to the remaining monthly payments and may be made to any beneficiary.
- **Joint and Survivor Annuity** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, 75.0%, or 100.0% of the member benefit for the remainder of the spouse's life.
- **Non-Spousal Joint and Survivor Annuity** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the beneficiary equal to 50.0% of the member benefit for the remainder of the beneficiary's life. The beneficiary cannot be the spouse or an alternate payee.
- **Designated Period Annuity** – Monthly payments to the member for a designated period of 60, 120, 180, or 240 months. Monthly payments cease at the end of the designated period and no lifetime benefit is guaranteed. If a member dies before the designated period the remaining monthly payments are made to the beneficiary or estate.

As of the [January 1, 2013, actuarial valuation](#), the funded percentage of the Cash Balance Plan was 93.6% and the UAL was \$68.5 million. The NSER is presently amortizing the UAL using a 25-year closed period (established in 2007) on a level dollar basis.

South Dakota – The South Dakota Retirement System (SDRS) was created July 1, 1974, as a defined benefit plan. Members contribute 6.0% of all wages and the employer matches with 6.0% of all wages. Statutes include language to prevent spiking income levels as employees approach retirement eligibility in order to prevent a windfall benefit.

Average final compensation is based on the highest 12 consecutive quarters during the last 40 quarters of covered employment. Benefits are calculated using two formulas and the member is entitled to the higher of the two benefit calculations. The standard benefit formula includes a multiplier of 1.7% for years of service before July 1, 2008, and a multiplier of 1.55% for years of service on or after July 1, 2008. The alternative formula includes a multiplier of 2.4% for years of service before July 1, 2008, and a multiplier of 2.25% for years of service on or after July 1, 2008. However, under the alternative formula the member's pension benefit is reduced by 80.0% of primary Social Security. The alternative formula is funded through an additional employer contribution of 6.2% on earnings in excess of the maximum taxable amount for Social Security in any calendar year.

Benefit payment options are limited to:

- **Joint and Survivor Annuity** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 60.0% of the member benefit for the remainder of the spouse's life.
- **Level Income Payment** – For members electing early retirement, an option is available to have pension payments increased before Social Security normal retirement age and reduced thereafter (between ages 55 and 62).

A postretirement COLA indexed to the CPI and the market value of the fund is provided annually at a minimum of 2.1%, but not more than 3.1%. A compounding COLA is provided only if the member has been retired for at least the previous fiscal year period. If a member terminates employment after three, but prior to 10 years of creditable service, the member is entitled to the employee's contributions plus interest and 85.0% of the employer contributions plus interest. A member withdrawing contributions forfeits all benefits under SDRS.

A member terminating employment prior to having three years of credited service is entitled to withdraw the member's contributions plus interest and 50.0% of the employer's contribution plus interest. Vested members terminating prior to retirement are entitled to employee contributions plus interest and 85.0% of the employer contributions plus accumulated interest, or a lifetime monthly benefit.

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As of the [June 30, 2012, consolidated annual financial report](#), the funded percentage of the SDRS was 92.6% and the UAL was \$625.0 million. The SDRS is presently amortizing the UAL using a 30-year closed period (established in 2011) on a level percent of pay basis.

Wisconsin – The Wisconsin Retirement System (WRS) was created in 1981 by the merger of the Wisconsin retirement fund, the state teachers' retirement system, the Milwaukee teachers' retirement fund, and several other public retirement and disability programs. The employee contribution rates are set at 7.0% of covered wages and are matched with an equal amount provided by the employer.

The plan is designed to provide career public employees, those with more than 25 years of service, with a benefit between 50.0% and 70.0% of preretirement earnings. The WRS includes two benefit payment calculations that are made for each member when they apply for pension benefits. The first calculation, the "formula method" is a defined benefit calculation based on average final compensation, years of service, and multipliers. The multiplier is set at 1.6% of the average high three years earnings.

The second calculation is the "money purchase method" and is a defined contribution calculation that guarantees an annuity that can be provided by the member's required contributions plus the employer's match. A retiring member is entitled to the greater of the two determinations.

Minimum retirement age is 55 with a normal retirement age of 65. There is no postretirement COLA provision. Retiring members may select from several irrevocable payment options. They are:

- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 75.0% or 100.0% of the member benefit for the remainder of the spouse's life.
- **Joint and Survivor Benefit** – an annuity reduced 25.0% upon the death of either the member or the beneficiary's death.
- **Joint and 100.0% Survivorship Annuity** – monthly payments for a guaranteed 180 months with a 100.0% survivorship annuity for a beneficiary for the balance of 180 months should the member pre-decease the beneficiary.
- **Life Annuity, Five-Year or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 60 months, or 180 months in benefits (depending on the options selected), the death benefit payable is equal to the remaining monthly payments and may be made to any surviving beneficiary.

A member terminating service prior to the required 5-year vesting period is entitled to withdraw the member's contributions plus interest. There is no entitlement to any portion of employer contributions or interest. A vested member that terminates employment is entitled to a pension at the age of 65 or at age 55 with a reduced benefit.

As of the [December 31, 2012, actuarial valuation](#) report, the funded percentage of the WRS was 99.9% and the UAL was \$1,612.3 million. The WRS is presently amortizing the UAL using a variable open period to stabilize contribution rates (25-year open period for 2012) on a level percent of pay basis.

Other State Public Safety Pension Systems (similar to MFPRIS and PORS)

Illinois – The State Employee’s Retirement System (SERS) was created January 1, 1944, and is a defined benefit plan. Unused and unpaid sick leave may be used to meet service eligibility requirements as additional service credit. Paid sick and vacation time may be used to meet service eligibility requirements if contributions are made to the system on those payments. However, these payments do not change the average final compensation. The AFC is calculated one of three ways; the average of the highest 48 consecutive months over the last 120 months, the average of the last 48 months of service, or the final rate of pay (not exceeding 115.0% of the average of the last 24 months pay), and includes overtime. Employees covered by Social Security contribute 8.5% and those who are exempt from Social Security contribute 12.5%. The state matches at 38.44% on a covered wage ceiling currently set at \$106,800. The ceiling is increased by 3.0% or half of the Consumer Price Index (CPI), whichever is less.

The SERS has a multiplier of 2.5% of covered wages for each year of service for covered employees and 3.0% for non-covered. The maximum benefit is 80.0% of the AFC for both groups. Normal retirement age with an unreduced benefit is 50 with 25 years of service or age 55 with 20 years of service. SERS provides for a compounding COLA each January 1 after the first full year of retirement for retired members age 55 and older equaling 3.0%. The 80.0% maximum benefit limitation does not apply to postretirement increases.

A member terminating employment is entitled to the employee contributions only and is not entitled to the state contribution or any interest accumulated on the employee’s or the state’s contributions. Members are not eligible to receive a pension from SERS if they have fewer than 8 years of covered service.

Retiring members may select from two irrevocable payment options. They are:

- **Reversionary Annuity** – A member may elect to receive a smaller pension during his lifetime in order to provide a spouse or a designated dependent with a lifetime income. That payment would be in addition to any other benefit payable by the System.
- **Level Income** – A member who contributes to Social Security as a state employee may elect to have his pension payments increased before Social Security normal retirement age and reduced thereafter. To be eligible for this election the member must have established eligibility for a Social Security pension.

For funded status, unfunded actuarial liability, and amortization method see the SERS general retirement summary in **Attachment A**.

Kansas – The Kansas Police and Fireman’s Retirement System (KP&F) is a defined benefit plan created in 1966 and governed under the umbrella of KPERS. The KP&F represents approximately 7,150 police and fire fighter employees of 94 state and local employers. As is the case with KPERS, there are two tiers of membership in the KP&F, those members employed before July 1, 1989 (Tier 1), and those employed on or after July 1, 1989 (Tier 2).

Members contribute 7.15% of gross earnings. Employer contributions vary from employer to employer with a high of 28.3%, to a low of 19.9%, the contribution rate for the majority of employers.

The KP&F has a multiplier of 2.5% per year of service and a maximum benefit of 90.0% of the AFC based on the highest three of the last five years of reported earnings, but they need not be consecutive years. The plan contains no provision for a postretirement COLA. The AFC for

Attachment B

Tier 1 employees includes extra pay such as vacation and sick leave paid at retirement and the AFC for Tier 2 employees does not.

Tier 1 members vest with 20 years of credited service and Tier 2 members vest with 15 years of credited service. Normal retirement age for Tier 1 members is any age with 32 years of credited service or 55 with 20 years of credited service. Normal retirement age for Tier 2 members is 50 with 25 years of credited service, 55 with 20 years of credited service, or 60 with 15 years of credited service. Members may select from the following irrevocable benefit payment options:

- **Straight Life Annuity** – The standard benefit paying a monthly pension for the life of the member. A beneficiary receives any remaining contributions plus interest not already paid to the member.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, 75.0%, or 100.0% of the member benefit for the remainder of the spouse's life.
- **Life Income, 5-Year, 10-Year or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 60, 120, or 180 months in benefits the death benefit payable is equal to the remaining monthly payments.
- **Lump Sum Payment** – A lump sum at retirement that must be in paid 10.0% increments and can be no more than 50.0% of the actuarial present value of the standard benefit straight life annuity. The lump sum is then combined with another option to provide a reduced, regular monthly benefit.

If a member terminates employment other than by retirement they are entitled to employee contributions plus interest at a guaranteed rate of 8.0% if hired before July 1, 1993, and 4.0% if hired on, or after July 1, 1993. Terminating employees that withdraw contributions forfeit all rights under the system and are not entitled to any of the employer contributions.

As of the [July 1, 2012, actuarial valuation](#), KP&F's funded percentage was 66.5% and the UAL was \$866.4 million. The KPERS is presently amortizing the UAL using a 40-year closed period (established in 1993), on a level percent of pay basis.

Minnesota – The Minnesota State Patrol Retirement Plan (MSRS) is a defined benefit plan providing coverage to state troopers, state agents, conservation officers, and members of the Department of Corrections fugitive apprehension unit. Employees contribute 12.4% of covered wages that are matched by an employer contribution of 18.6%. The AFC is calculated on the highest five years, need not be consecutive, and need not be calendar years. A member's benefit is based on the AFC times a multiplier of 3.0% per year of covered service with a maximum benefit of 105.0% (35 years of service).

The plan does provide for early retirement at age 50 with a benefit reduction of no more than 6.0% for those hired before July 1, 2010, and 12.0% for those hired on or after July 1, 2010.

Retiring members may select from several irrevocable payment options. They are:

- **Single Life Benefit** – Monthly payments for the life of the member with a refund to the beneficiary equal to any unpaid balance of the member's account.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, 75.0%, or 100.0% of the member benefit for the remainder of the spouse's life.
- **Life Income, 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 180 months in benefits the death benefit payable is equal to the remaining monthly payments and may be made to more than one surviving beneficiary.

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An annual postretirement benefit increase of 1.5% of the member's monthly benefit is provided until the fund reaches a 90.0% funded ratio. Then the postretirement benefit increase is adjusted to 2.5% of the member's monthly benefit for the life of the pensioner and beneficiary.

Members terminating service after the five-year vesting period may choose to leave their contributions in the fund and request a deferred benefit. If a member requests a refund, the member is entitled to the employee contributions plus guaranteed interest of 6.0% to June 30, 2011, and 4.0% after that. The terminating member is not entitled to any of the employer contribution or accumulated interest on employer contributions.

As of the [July 1, 2012, actuarial valuation](#), the funded percentage of the system was 72.84% and the UAL was \$206.7 million. The MSRS is presently amortizing the UAL using a 30-year closed period (established in 2007), on a level percent of pay basis.

Missouri – The Missouri State Employee's Retirement System (MPERS) is a defined benefit plan providing benefits to employees of the Missouri Department of Transportation and State Highway Patrol. Employees beginning covered service before July 1, 2000, are members of the "closed" plan and those beginning employment on or after July 1, 2000, are members of the Year 2000 Plan. There is no employee contribution for members of the closed plan or the Year 2000 Plan. Members of the Year 2011 Plan, those employed on or after July 1, 2011, contribute 4.0% of pay. The state contribution for all three plans is 55.23% of pay. Members that terminate service before the required vesting period of five years (Year 2000 Plan) or 10 years (Year 2011 Plan) are entitled to a refund of employee contributions plus accumulated interest at a guaranteed rate of 4.0%. Employees eligible for a retirement benefit may not request a refund of contributions.

Retirement eligibility begins at age 60, the mandatory retirement age, with five years of service or when the member's age and years of service total 80, but not before age 48. The benefit is based on a multiplier of 1.7% for each year of service and the AFC. Creditable service is determined by the length of service plus unused sick leave, where 168 hours of unused sick leave equals one month of creditable service. The MPERS also includes a "temporary benefit formula" providing a benefit to supplement other income until the retired member reaches the age of 62. The formula for the temporary benefit is 0.8% x years of service x average final pay. To receive the temporary benefit the member must retire under the Rule of 80 provisions.

Retiring members may select from several irrevocable payment options. They are:

- **Single Life Benefit** – Monthly payments for the life of the member with a refund to the beneficiary of any unpaid balance of the member's account.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0% or 100.0% of the member benefit for the remainder of the spouse's life.
- **Life Income, 10-Year or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 120 months, or 180 months in benefits (depending on the options selected), the death benefit payable is equal to the remaining monthly payments and may be made to any surviving beneficiary.

Postretirement COLAs equal to 80.0% of the CPI, but no more than 5.0% of the monthly benefits, are provided every year on the anniversary of retirement.

As of the [June 30, 2012, actuarial valuation](#), the funded percentage of the MPERS was 46.31% and the UAL was \$1,775.2 million. The MPERS is presently amortizing the UAL using a 12-year closed period for unfunded retiree liabilities and a 27-year close period for all other unfunded liabilities (both established July 1, 2013), on a level percent of pay basis.

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Nebraska – The Nebraska State Employee’s Retirement System’s State Patrol Plan was established as a defined benefit plan on September 7, 1947. Employees contribute 16.0% of covered compensation and the state contributes 16.0% of covered wages. The state has been making additional contributions since FY 2004 that have totaled more than \$15.8 million. Members terminating employment after vesting are entitled to employee contributions, plus interest at a rate set by law and subject to change annually. There is no guaranteed rate of return.

Retirement eligibility begins at age 55 with 10 or more years of service with mandatory retirement at age 60. An early retirement benefit is available at age 50, but is reduced by 5/9ths of 1.0% for each month the age precedes age 55, or for each month the years of service precedes 25 years, whichever provides the greater benefit. The benefit is based on a multiplier of 3.0% for each year of service and the AFC, and is limited to 75.0% of average final compensation. The AFC is determined by gross wages including overtime, but does not include bonuses, early retirement incentives, and severance pay.

The normal benefit payment form is a joint and 75.0% survivor annuity. If the member has dependent children at the time of postretirement death, the spouse receives a monthly annuity of 100.0% of the member’s monthly benefit. Members may also elect a refund of contributions. No other payment option is available to retired members.

A COLA provision provides an increase each July 1 that is equal to the Consumer Price Index-Clerical Workers (CPI-W) for the previous fiscal year, but no more than 2.5%.

As of the [July 1, 2012, actuarial valuation](#), the funded percentage of the State Patrol Plan was 78.1% and the UAL was \$79.5 million. The plan is presently amortizing the UAL using a 30-year closed period (established in 2006), on a level dollar basis.

South Dakota – The South Dakota Retirement System’s (SDRS) Public Safety Plan is a defined benefit plan covering state law enforcement officers, police officers, firefighters, county sheriffs and deputies, correctional staff, court services officers, conservation officers, and park rangers. Members contribute 8.0% of gross wages reported on the employee’s W-2 and the employer matches with 8.0% of gross wages.

Average final compensation is based on the highest 12 consecutive quarters during the last 40 quarters of covered employment. The standard benefit formula includes a multiplier of 2.4% for years of service before July 1, 2008, and a multiplier of 2.0% for years of service on, or after July 1, 2008. Normal retirement age is 55 and a member may retire as early as age 45 with an unreduced benefit if their age and years of service total 75.

Irrevocable benefit payment options are limited to:

- **Joint and Survivor Annuity** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 60.0% of the member benefit for the remainder of the spouse’s life.
- **Level Income Payment** – For members electing early retirement, an option is available to have pension payments increased before Social Security normal retirement age and reduced thereafter (between ages 45 and 62).

Postretirement COLAs indexed to the CPI and the market value of the fund are provided, but cannot exceed 3.1% or be less than 2.1% in any year. A compounding COLA is provided only if the member has been retired for at least the previous fiscal year period.

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If a member terminates prior to having three years of credited service, the member is entitled to withdraw the member's contributions plus interest and 50.0% of the employer's contribution plus interest. Vested members terminating prior to retirement are entitled to employer contributions plus interest and 85.0% of the employer contributions plus accumulated interest, or a lifetime monthly benefit when reaching normal retirement age.

For funded status, unfunded actuarial liability, and amortization method see the SDRS general retirement summary in **Attachment A**.

Wisconsin – The Wisconsin Retirement System (WRS) was created in 1981 by the merger of the Wisconsin retirement fund, the state teachers' retirement system, the Milwaukee teachers' retirement fund, and several other public retirement and disability programs. Employee contribution rates for the public safety category are set at 7.0% of covered wages and are matched with a 14.0% contribution provided by the employer.

The plan is designed to provide career public safety employees, with more than 25 years of service, with a benefit between 50.0% and 85.0% of pre-retirement earnings. The benefit maximum for the protective service plan is 85.0% of AFC. The WRS includes two benefit payment calculations that are made for each member when they apply for pension benefits. The first calculation, the "formula method," is a defined benefit calculation based on average final compensation, years of service, and multipliers. The multiplier is set at 2.67% of the average high three years earnings for service prior to July 1, 2000, and 2.5% for service on or after July 1, 2000.

The second calculation is the "money purchase method" and is a defined contribution calculation that guarantees an annuity provided by the member's required contributions plus the employer's match. A retiring member is entitled to the greater of the two determinations.

Minimum retirement age is 50 with a normal retirement age of 53 with 25 or more years of service. There is no postretirement COLA provision. Retiring members may select from several irrevocable payment options. They are:

- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 75.0% or 100.0% of the member benefit for the remainder of the spouse's life.
- **Joint and Survivor Benefit** – an annuity reduced 25.0% upon the death of either the member or the beneficiary.
- **Joint and 100.0% Survivorship Annuity** – monthly payments for a guaranteed 180 months with a 100.0% survivorship annuity for a beneficiary for the balance of 180 months should the member predecease the beneficiary.
- **Life Annuity, 5-Year, or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 60 months, or 180 months in benefits (depending on the options selected), the death benefit payable is equal to the remaining monthly payments and may be made to any surviving beneficiary.

A member terminating service prior to the required 5-year vesting period is entitled to withdraw the member's contributions plus interest. There is no entitlement to any portion of the employer contributions or interest. A vested member that terminates employment is entitled to a pension at the age of 65, or at age 55 with a reduced benefit.

For funded status, unfunded actuarial liability and amortization method see the WRS general retirement summary in **Attachment A**.

Other State Judicial Pension Systems

Illinois – The Judicial Retirement System of Illinois (JRS) provides benefits to over 2,000 active and retired judges and associate judges and is a defined benefit plan. Judges contribute 11.0% of covered wages including an optional 2.5% survivor's annuity contribution. However, the decision to decline the survivor's annuity is irrevocable. The state match for FY 2014 is 63.09%.

The JRS has a multiplier of 3.5% of covered wages for each of the first 10 years of service and 5.0% for each year after 10 years with a maximum benefit of 85.0% of the average high four years of earnings. Normal retirement age is 60 with 10 years of service for an unreduced benefit. Members may retire at age 55 with 10 years of service, but the benefit will be reduced by one-half of 1.0% for each month under age 60. The JRS provides for a compounding COLA of 3.0% each January 1 after the first full year of retirement for retired members age 60 and older. The COLA is also provided to beneficiaries receiving a survivor pension.

Members terminating employment are entitled to the employee contributions only and are not entitled to the state contribution or any interest accumulated on the employee's or the state's contributions.

Retiring members may select from two irrevocable payment options. They are:

- **Straight Life Annuity** – The standard benefit paying a monthly pension for the life of the member. A beneficiary receives any remaining contributions plus interest not already paid to the member.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 66⅔% of the member benefit for the remainder of the spouse's life.

As of the [July 1, 2012, actuarial valuation](#), the funded ratio was 28.59% on a market value of assets basis and the UAL was \$1,420.5 million. The JRS is presently amortizing the UAL using a 30-year open period on a level percent of projected capped pay basis

Kansas – The Kansas Judicial Retirement System is a defined benefit plan governed under the umbrella of KPERS. The system provides benefits to approximately 260 active members and 220 retired members. As is the case with KPERS, there are two tiers of membership in the Judicial Retirement System, those members employed before July 1, 1987 (Tier 1), and those employed on or after July 1, 1987 (Tier 2). Judges are vested upon election or appointment.

Members contribute 6.0% of gross earnings until the age of 65 with 20 years of service, or when the member has enough service to receive the maximum benefit of 70.0%. Employer contributions are currently 23.98% of gross earnings. Member contributions earn a guaranteed 8.0% interest if the member's service commenced before July 1, 1993, and 4.0% if service commenced on or after July 1, 1993.

The Kansas Judicial Retirement system has a multiplier of 5.0% for up to 10 years of service if membership commenced before July 1, 1987, and a multiplier of 3.5% per year of service if membership commenced on or after July 1, 1987. The maximum benefit for either tier is 70.0% of the average final compensation (AFC). The AFC is based on the highest three of the last 10 years earnings, but they need not be consecutive years. The plan contains no provision for postretirement COLAs.

Normal retirement age from the Judicial Retirement System is 65 with one year of service or 62 with 10 years of credited service, or any age and years of service combination equaling 85. Mandatory retirement age is the end of the term in which the judge turns 70 if a Supreme Court

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justice and 75 for all other judges. Members may select from the following irrevocable benefit payment options:

- **Straight Life Annuity** – The standard benefit paying a monthly pension for the life of the member. A beneficiary receives any remaining contributions plus interest not already paid to the member.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, 75.0%, or 100.0% of the member benefit for the remainder of the spouse's life.
- **Life Income, 5-Year, 10-Year or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 60, 120, or 180 months in benefits the death benefit payable is equal to the remaining monthly payments.
- **Lump Sum Payment** – A lump sum at retirement that must be paid in 10.0% increments and can be no more than 50.0% of the actuarial present value of the standard benefit straight life annuity. The lump sum is then combined with another option to provide a reduced, regular monthly benefit.

Members terminating employment other than by retirement are entitled to employee contributions plus interest. Terminating employees that withdraw contributions forfeit all rights under the system and are not entitled to any of the employer contributions.

As of the [December 31, 2012, actuarial valuation](#), the Judicial Retirement System funded percentage was 81.4% and the UAL was \$29.0 million. The KPERS is presently amortizing the UAL using a 40-year closed period (established in 1993), on a level dollar basis.

[Minnesota](#) – The Minnesota Judicial Retirement Plan is a defined benefit plan administered by the Minnesota Employee Retirement System providing coverage to approximately 310 active members and 290 retired members. Employees contribute 7.5% of covered wages matched by an employer contribution of 20.5%. The AFC is calculated on the highest five years, these need not be consecutive and need not be calendar years. A member's benefit is based on the AFC times a multiplier of 3.2% per year of covered service with a maximum benefit of 76.8% of the AFC. Mandatory retirement age is 70. The plan does provide for early retirement at age 60 with a benefit reduction of as much as 30.0%.

Retiring members may select from several irrevocable payment options. They are:

- **Single Life Benefit** – Monthly payments for the life of the member with a refund to the beneficiary of any unpaid balance of the member's account.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, 75.0%, or 100.0% of the member benefit for the remainder of the spouse's life.
- **Life Income, 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 180 months in benefits the death benefit payable is equal to the remaining monthly payments and may be made to more than one surviving beneficiary.

An annual postretirement benefit increase of 2.0% of the member's monthly benefit is provided for the life of the pensioner and beneficiary.

Members terminating service after the five-year vesting period may choose to leave their contributions in the fund and request a deferred benefit. Members requesting a refund are entitled to the employee contributions plus guaranteed interest of 6.0% to June 30, 2011, and 4.0% after that. Terminating members are not entitled to any of the employer contribution or accumulated interest on employer contributions.

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As of the [July 1, 2012, actuarial valuation](#), the funded percentage of the system was 51.46% and the UAL was \$136.7 million. The Judicial Retirement System is presently amortizing the UAL using a 30-year closed period (established in 2009), on a level percent of pay basis.

Missouri – The Missouri Judicial Retirement System is a defined benefit plan administered under the umbrella of the Missouri Employee Retirement System (MOSERS) providing benefits to approximately 400 active members and 490 retired members of the Missouri judiciary. Judges are vested immediately upon becoming a member. Judges beginning covered service before January 1, 2011, are members of the “closed” plan and those beginning employment on or after January 1, 2011, are members of the Judicial Plan 2011. There is no employee contribution for members of the closed plan. Members of the Judicial Plan 2011 contribute 4.0% of pay. The state contribution for all three tiers is 59.69% of pay.

Members that terminate service prior to retirement that are members of the Judicial Plan 2011 are entitled to a refund of employee contributions plus accumulated interest at a guaranteed rate of 4.0% and forfeit all rights to receive benefits from the plan. Once employees become eligible for a retirement benefit they may not request a refund of contributions.

Closed plan members are retirement eligible at 60 with 15 years of service and at age 62 with 12 years of service. Judicial Plan 2011 members are eligible to retire at age 67 with 12 years of service and at age 62 with 20 years of service. The mandatory retirement age is 70. Failure to retire by the mandatory retirement age results in forfeiture of all rights to a retirement benefit, annual compensation, or salary. The plan requires the member to retire “in good standing.” Members convicted of a felony in any court, impeached for misconduct, or disbarred from the practice of law forfeit all rights to benefits.

The base monthly benefit is 50.0% of the monthly compensation at retirement with 10 years of service. Creditable service is determined by the length of service.

Retiring members may select from several irrevocable payment options. They are:

- **Single Life Benefit** – Monthly payments for the life of the member with a refund to the beneficiary of any unpaid balance of the member’s account.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 50.0%, or 100.0% of the member benefit for the remainder of the spouse’s life.
- **Life Income, 10-Year, or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 120 months, or 180 months in benefits (depending on the option selected), the death benefit payable is equal to the remaining monthly payments and may be made to any surviving beneficiary.

Postretirement COLAs equal to 80.0% of the CPI, no less than 4.0%, but no more than 5.0% of the monthly benefits are provided every year on the anniversary of retirement.

As of the [June 30, 2012, actuarial valuation](#), the funded percentage of the Judicial Retirement Plan was 24.7% and the UAL was \$311.1 million. The plan is presently amortizing the UAL using a 30-year closed period (established June 30, 2010), on a level percent of pay basis.

Nebraska – The Nebraska Judges Retirement Plan is a defined benefit plan administered by the Nebraska Public Employees Retirement System. Judges hired before July 1, 2004, contribute 7.0% of compensation with fewer than 20 years of service and 1.0% of compensation for 20 or more years of service. These rates change to 6.0% and 0.0% effective July 1, 2014. Judges hired on or after July 1, 2004, contribute 9.0% until they have 20 years of service and will contribute 5.0% after 20 years. These rates are scheduled to change to 8.0% and 4.0%

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effective July 1, 2014. Since FY 2003 the state made contributions totaling more than \$34.1 million through appropriation of court fees and general fund appropriations.

Members are vested upon appointment. If a member terminates employment, the member is entitled to employee contributions, plus interest at a rate set by law and subject to change annually. There is no guaranteed rate of return.

Normal retirement age with an unreduced benefit is age 65. An early retirement benefit is available between the ages of 55 and 62, but is reduced by an actuarial factor based on age. Early retirement between the ages of 62 and 65 is available with a benefit reduced by 3.0% for each year retirement precedes the age of 65. The benefit is based on a multiplier of 3.5% for each year of service and the AFC, and is limited to 70.0% of average final compensation. The AFC equals the highest three 12-month periods of salary.

Members may select from several irrevocable benefit payment options. They are:

- **Single Life Benefit** – Monthly payments for the life of the member with a refund to the beneficiary of any unpaid balance of the member's account.
- **Straight Life Annuity** – Monthly payments for the life of the member with no refund or death benefit.
- **Life Income with 5-Year, 10-Year, or 15-Year Certain** – Monthly payments for the life of the member. If the member dies before receiving 60 months, 120 months, or 180 months in benefits (depending on the option selected), the death benefit payable is equal to the remaining monthly payments and may be made to any surviving beneficiary.
- **Joint and Survivor Benefit** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the surviving spouse equal to 50.0%, 66⅔%, or 100.0% of the member benefit for the remainder of the surviving spouse's life.
- **Joint and Last Survivor Benefit** – Monthly payments for the life of the member and the member's spouse with guaranteed survivor benefits equal to 50.0%, 66⅔%, or 100.0% of the member's benefit paid to the surviving spouse after the member's death. If the spouse predeceases the member, benefit payments equal to 50.0%, 66⅔%, or 100.0% of the original benefit are paid to the member for the remainder of the member's life.

A postretirement COLA provision provides an increase each July 1 that is equal to the CPI-W for the previous fiscal year, but no more than 2.5%.

As of the [July 1, 2012, actuarial valuation](#), the funded percentage of the Judicial Retirement Plan was 89.0% and the UAL was \$11.5 million. The plan is presently amortizing the UAL using a 30-year closed period (established in 2011), on a level dollar basis.

South Dakota – The South Dakota Retirement System's (SDRS) Judicial Retirement Plan is a defined benefit plan covering justices, judges, and magistrate judges. Members are vested after three years of contributory service and are eligible to apply for benefits at the normal retirement age of 65. An unreduced early retirement benefit is available as early as age 55 if the member's age and years of service total 80. Members contribute 9.0% of gross wages reported on the employee's W-2 and the employer matches with 9.0% of gross wages.

Average final compensation is based on the highest 12 consecutive quarters during the last 40 quarters of covered employment. The benefit formula includes a multiplier of 3.73% for up to 15 years of service occurring before July 1, 2008, plus a multiplier of 2.4% for years of service in excess of 15 years occurring prior to July 1, 2008. For service occurring after July 1, 2008, a multiplier of 3.33% is applied for a period of up to 15 years of service plus a multiplier of 2.0%

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for service in excess of 15 years. An example of the calculation is shown below assuming retirement on July 1, 2012, at age 65, with 25 years of service, and an AFC of \$85,000.

For the first 15 years of service:

Multiplier 3.73%	x	\$85,000 (Average Final Comp)	x	15 Years Service before 7/1/2008	=	\$47,595.75
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Plus

Multiplier 3.33%	x	\$85,000 (Average Final Comp)	x	0 Years Service after 7/1/2008	=	\$0.00
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For service in excess of 15 years

Multiplier 2.40%	x	\$85,000 (Average Final Comp)	x	6 Years Service before 7/1/2008	=	\$12,240.00
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Plus

Multiplier 2.00%	x	\$85,000 (Average Final Comp)	x	4 Years Service after 7/1/2008	=	\$6,800.00
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Total Benefit

\$47,595.75 + \$0 First 15 Years	+	\$12,240 + \$6,800 Service in Excess of 15	=	\$66,635.75 per year
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Irrevocable benefit payment options are limited to:

- **Joint and Survivor Annuity** – Monthly payments for the life of the member with guaranteed survivor benefits paid to the spouse equal to 60.0% of the member benefit for the remainder of the spouse's life.
- **Level Income Payment** – For members electing early retirement, an option is available to have pension payments increased before Social Security normal retirement age and reduced thereafter (between ages 55 and 62).

A compounding postretirement COLA indexed to the CPI and the market value of the Fund is provided, but cannot exceed 3.1% or be less than 2.1% in any year. A COLA is provided only if the member has been retired for at least the previous fiscal year period.

If a member terminates prior to having three years of credited service, the member is entitled to withdraw the member's contributions plus interest and 50.0% of the employer's contribution plus interest. Vested members terminating prior to retirement are entitled to employee contributions plus interest and 85.0% of the employer contributions plus accumulated interest, or a lifetime monthly benefit.

For funded status, unfunded actuarial liability, and amortization method see the SDRS general retirement summary in **Attachment A**.

Wisconsin – See **Attachment A**

Surrounding States Comparison

ATTACHMENT D

Plan Description	Membership	Active Members	Retired Members	Assumed Rate of Return	2012 Funded Ratio	Average Final Comp.	Avg Annual		YOS Multiplier	Avg Annual Retired Member Benefit	Annual Required Contribution	Normal Cost
							Active Member Salary	Benefit Maximum				
General Membership Plans												
Iowa PERS	State, Local, Schools	155,800	101,677	7.50%	79.20%	High 5	\$ 41,820	65% AFC	2.00%	\$ 14,136	14.88%	10.17%
Illinois SERS	State, Local, Schools	62,729	62,788	7.75%	34.68%	High 4	\$ 69,012	75% AFC	1.67%	\$ 26,766	44.31%	12.81%
Kansas PERS	State, Local, Schools	148,605	79,390	8.00%	55.00%	High 5	\$ 40,522	60%	1.85%	\$ 12,929	20.95%	8.26%
Minnesota SERS	State, GA, Judges	48,207	31,975	8.00%	82.67%	High 5	\$ 51,107	68%	1.70%	\$ 17,266	12.32%	7.17%
Missouri SERS	State Employees	51,332	37,308	8.00%	73.16%	High 3	\$ 36,314	65% AFC	1.70%	\$ 14,973	13.97%	N/A
Nebraska PERS	State Employees	11,956	910	7.75%	93.60%	N/A	\$ 41,861	Cash Balance	N/A	\$ 15,353	11.32%	10.06%
South Dakota PERS	State, Local, Schools	38,207	22,408	7.25%	92.60%	High 3	\$ 39,329	N/A	Variable	\$ 17,247	12.48%	10.28%
Wisconsin Ret. Syst.	All Gov't Employees	252,526	149,804	7.20%	99.90%	High 3	\$ 48,511	70% AFC	1.60%	\$ 12,218	14.00%	14.00%

¹ Based on actual Wisconsin Retirement System experience.

* Benefit is 100% of AFC reduced by earned income and primary Social Security

Public Safety Plans												
IPERS Sheriffs & Deputies	Sheriffs & Deputies	1,530	671	7.50%	88.70%	High 3	\$ 62,996	72% AFC	2.73%	\$ 28,284	19.76%	16.62%
IPERS Protection Occupations	Police, Fire, DNR, DOC	6,870	1,682	7.50%	95.10%	High 3	\$ 46,732	72% AFC	2.73%	\$ 22,286	16.90%	16.04%
Iowa POR	Iowa DPS only	618	549	8.00%	61.00%	High 3	\$ 71,040	88% AFC	2.75%	\$ 43,402	53.14%	26.22%

IOWA 411	Municipal > 8,000	3,888	3,816	7.50%	72.00%	High 3	\$ 66,491	82% AFC	3.00%	\$ 33,084	39.52%	18.37%
Illinois SERS	State Police, Fire, DOC					High 8		80% AFC	3.00%			
Kansas KP & F	State & Local Police	7,187	4,525	8.00%	66.50%	High 3	\$ 62,489	90% AFC	2.50%	\$ 28,600	28.51%	14.58%
Minnesota State Patrol	Troopers, Agents,DNR	823	963	7.00%	72.84%	High 5	\$ 76,883	105%	3.00%	\$ 52,914	42.52%	21.60%
Missouri DOT and Patrol	Uniformed Patrol	1,215	826	8.25%	46.31%	High 3	\$ 59,840	N/A	1.70%	\$ 50,521	58.63%	17.34%
Nebraska State Patrol	Troopers	427	422	8.00%	78.10%	High 3	\$ 62,359	75% AFC	3.00%	\$ 41,212	56.06%	29.10%
South Dakota PS & Judicial	Public Safety & Judges	2,705	1,298	7.25%	92.60%	High 3		Variable	2.00%	\$ 51,875	12.48%	10.28%
Wisconsin Ret. Syst.	Protective Occupations	2,727	203	7.20%	99.90%	High 3	\$ 70,949	85% AFC	2.50%	\$ 41,901	21.00%	20.70%

Judicial Plans													
Iowa Judicial		192	186	7.50%	68.89%	High 3	\$ 134,167	65.00%	3.25%	\$ 51,885	40.74%	22.03%	
Illinois SERS		968	1,056	7.00%	29.74%	High 8	\$ 178,143	85% AFC	Varies	\$ 102,365	73.07%	25.91%	
Kansas Judges		261	227	8.00%	81.40%	High 3	\$ 107,584	70% AFC	3.50%	\$ 38,261	29.74%	19.61%	
Minnesota SERS		308	314	8.00%	51.46%	High 5	\$ 127,844	76.8% AFC	3.20%	\$ 60,269	41.50%	18.20%	
Missouri Judges		398	496	8.50%	24.70%	High Month	\$ 115,165	65%	2.50%	\$ 54,403	57.30%	N/A	
Nebraska Judges		150	166	8.00%	91.60%	N/A	\$ 126,703	Cash Balance	N/A	\$ 43,197	25.63%	20.43%	
South Dakota PERS		See South Dakota PS & Judicial						Variable	See South Dakota PS & Judicial				

N/A - not readily available or not applicable

Surrounding States Comparison

ATTACHMENT D (cont.)

Plan Description	Employer Contribution	Employee Contribution	Normal Retirement Age	Special Provisions	Actuarial Cost Method	Mortality Table	Smoothing Period
General Membership Plans							
Iowa PERS	8.93%	5.93%	65	Rule of 88	Entry Age Normal	RP 2000	5-Year
Illinois SERS	38.44%	4%/8%	60	Rule of 85	Projected Unit Credit	RP 2000	5-Year
Kansas PERS	12.37%	6.00%	65	Rule of 85	Entry Age Normal	RP 2000	5-Year
Minnesota SERS	5.00%	5.00%	65	Rule of 90	Entry Age Normal	RP 2000	5-Year
Missouri SERS	16.98%	0.00%	65	Rule of 80	Entry Age Normal	RP 2000	5-Year
Nebraska PERS	7.49%	4.80%	55	Cash Balance	Entry Age Normal	1994 Group Annuity Mortality Tables	5-Year
South Dakota PERS	6.00%	6.00%	65	Rule of 85	Frozen Entry Age	1995 Buck Mortality Table	5-Year
Wisconsin Ret. Syst.	7.00%	7.00%	65	None	Frozen Entry Age	Wisc 2012 Mortality Table ¹	5-Year
¹ Based on actual Wisconsin Retirement System * Benefit is 100% of AFC reduced							
Public Safety Plans							
IPERS Sheriffs & Deputies	9.88%	9.88%	55	Rule of 88	Entry Age Normal	RP 2000	5-Year
IPERS Protection Occupations	10.14%	6.76%	55	Rule of 88	Entry Age Normal	RP 2000	5-Year
Iowa POR	29.00%	10.85%	55		Entry Age Normal	RP 2000	4-Year
IOWA 411	30.12%	9.40%	55		Entry Age Normal	Blended 1/3 1971 Group Annuity Mortality, 2/3 1994 Group annuity Mortality	5-Year
Illinois SERS	38.44%	12.50%	60				
Kansas KP & F	21.36%	7.15%	55		Entry Age Normal	RP 2000	5-Year
Minnesota State Patrol	18.60%	12.40%	55		Entry Age Normal	RP 2000	5-Year
Missouri DOT and Patrol	55.23%	0.00%	60	Rule of 80	Entry Age Normal	1994 Group Annuity Mortality Tables	3-Year
Nebraska State Patrol	16.00%	16.00%	60	50/25 YOS	Entry Age Normal	1994 Group Annuity Mortality Tables	5-Year
South Dakota PS & Judicial	8.00%	8.00%	55	Rule of 75	Frozen Entry Age	1995 Buck Mortality Table	5-Year
Wisconsin Ret. Syst.	14.00%	7.00%	54		Frozen Entry Age	Wisc 2012 Mortality Table ¹	5-Year
Judicial Plans							
Iowa Judicial	30.60%	9.35%	65	20 YOS	Entry Age Normal	RP 2000	4-Year
Illinois SERS	38.83%	11.00%	62		Projected Unit Credit	UP-1994 Mortality Tables	5-Year
Kansas Judges	23.98%	5.76%	62	Rule of 85	Entry Age Normal	RP 2000	5-Year
Minnesota SERS	20.50%	7.52%	65		Entry Age Normal	RP 2000	5-Year
Missouri Judges	59.69%	0.00%	62	12 YOS	Entry Age Normal		
Nebraska Judges	7.68%	7.00%	65	Cash Balance	Entry Age Normal	1994 Group Annuity Mortality Tables	5-Year
South Dakota PERS	9.00%	9.00%	65	Rule of 80	Frozen Entry Age		

N/A - not readily available or not