

For the Fiscal Year Ended December 31, 2020 Prepared by the joint effort of the KCSPRS staff 3100 Broadway, Suite 1211, Kansas City, MO 64111 816.472.5800 • www.kcpsrs.org

Standing Like a Tree

Often considered the most powerful exercise of all the yoga poses, the standing tree is a metaphor apt for the resilience of the Kansas City Public School Retirement System (KCPSRS) in 2020. The ability to stand upright like a tree trunk with flexible branches adapting to headwinds of the pandemic while extending down on established and continuously growing roots, captures much of the essence of our work in 2020. The pandemic may have changed our approach to daily business, it did not change our ability to serve our members or the underlying benefit structure for our retirees.

KCPSRS is grounded in the fundamentals established for longterm sustainability of the Retirement Plan.



"Storms make trees take deeper roots."

Dolly Parton

Six Black Lives Matter Murals

In addition to the pandemic, 2020 brought protests to heighten awareness and promote efforts to denounce and combat racism. Kansas City undertook what is believed to be the largest city-wide effort in the entire country with six simultaneously painted Black Lives Matter murals on city streets.

An estimated 1,000 volunteers helped paint the unique designs by Black artists in six neighborhoods - 10th and Baltimore, 18th and Vine, 31st and Troost, 63rd and Troost, 63rd and Brookside Boulevard, and Northwest Briarcliff Parkway and North Mulberry.



Each mural has a different style but the same message: Black Lives Matter. The project, paid for by donations, covers 2,000 feet of street overall. It represents Kansas City people coming together to support each other and resonate healing.



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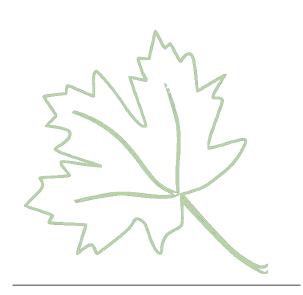
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May 26, 2021

Dear Members of the Kansas City Public School Retirement System,

We are pleased to submit the 2020 *Comprehensive Annual Financial Report* (Annual Report) of the Kansas City Public School Retirement System (KCPSRS) for the fiscal year ended December 31, 2020. This Annual Report is a presentation of the financial results for KCPSRS within the specific time frame of the last fiscal year.

This Annual Report is designed to provide an overview of the financial condition of KCPRS and a chronicle of plan status from one year to another. This Annual Report also meets the reporting requirements of state law as stipulated in Section 105.661 of the Revised Statutes of Missouri (RSMo). In addition to the *Introductory Section*, KCPSRS' Annual Report also contains a *Financial Section*, *Investment Section*, *Actuarial Section* and *Statistical Section*. The report is posted on our website, <u>www.kcpsrs.org</u> and printed copies are available upon request.

Financial Statements and Management Responsibility

The financial statements in this report were prepared in accordance with accounting principles generally accepted in the United States and established by the Governmental Accounting Standards Board (GASB). Management is responsible for the preparation of this report and the fairness and completion of the presentation, and the integrity of the information presented therein.

Management is responsible for maintaining adequate internal accounting controls, which are designed to provide reasonable, but not absolute, assurance the financial statements are free of any material misstatements and assets are properly safeguarded. The concept of reasonable assurance recognizes that the cost of internal controls should not exceed the benefit to be derived and the valuation of cost and benefit requires estimates and judgements by management. We believe the internal controls currently in place support this purpose. We believe the internal controls currently in place support this purpose and the financial statements and accompanying schedules are fairly presented in all material respects.

Management's Discussion and Analysis found in the *Financial Section* page 19 of this report serves as an introduction to and overview of the financial statements.

Mayer Hoffman McCann, P.C., the independent external auditors, selected by the KCPSRS Board of Trustees, have conducted an audit of the basic financial statements in accordance with U.S. generally accepted auditing standards. KCPSRS received an unmodified opinion from our independent auditor on the financial statements included in this report. This audit and the financial statements and related notes are presented on pages 23-40 in the *Financial Section* of this report.

Investments

For the fiscal year 2020, KCPSRS' investments generated a time-weighted return of 11.9%, net of investment fees. The total fund returned 4.4% more than the January 1, 2020 actuarial long-term investment return assumption of 7.50%. The net return of 11.9% trailed the policy benchmark for the year by 1.7%. The 3- and 5-year net returns also tracked near the policy benchmarks, slightly underperforming by 0.8% and 0.2%, respectively. A complete discussion of investments, investment performance, and the asset allocation can be found in the *Investment Section* beginning on page 45. Additionally, information on investment fees can be found on page 57.

Funding Status and Valuation Results

The Board hires an external actuarial consultant to perform an actuarial valuation each year. The valuations use economic and demographic assumptions adopted by the Board based on experience studies conducted at least every five years.

Cavanaugh Macdonald Consulting, LLC, the actuarial consultant, performed an experience study in 2020 of the four years ending December 31, 2019. The Board adopted the actuary's recommendations from this experience study for the January 1, 2021 actuarial valuation. this Annual Report includes actuarial and statistical information from the January 1, 2021 actuarial valuation report as approved by the Board in June 2021.

To allow for predictable and stable contribution rates, KCPSRS' funding is based on the actuarial value of assets which smooths asset gains and losses over a five-year period. As of January 1, 2021, KCPSRS was 66.5% pre-funded on an actuarial basis, reflecting an increase from the January 1, 2020 actuarial funded status of 63.6%. The changes in the funded status are primarily due to the favorable 2020 market returns on investments and the impact of the new set of actuarial assumptions resulting in an net actuarial gain of assets of \$17.0 million in the January 1, 2021 valuation. In addition, the actuarial funding ratio of 66.5% reflects the Board's lowering the long-term investment assumption from 7.50% to 7.25% effective with the January 1, 2021 valuation. Additional information on actuarial assumptions and funding can be found in the *Actuarial Section* of this report on pages 64-70.

Award for Excellence in Financial Reporting

The Government Finance Officers Association of the United States and Canada (GFOA) awarded a Certificate of Achievement for Excellence in Financial Reporting to KCPSRS for its *Comprehensive Annual Financial Report (annual report)* for the fiscal year ended December 31, 2019. This was the 4th consecutive year KCPSRS submitted its annual report for review and has achieved this prestigious award. To be awarded a Certificate of Achievement, a public entity must publish an easily readable and efficiently organized comprehensive annual financial report. This report must satisfy both generally accepted accounting principles and applicable legal requirements.

The Certificate of Achievement is valid for a period of one year only. We believe our current annual report continues to meet the Certificate of Achievement Program's requirements and we are submitting it to GFOA to determine its eligibility for another certificate.

This prestigious award recognizes KCPSRS for financial standards of excellence and is extremely gratifying to staff who work diligently throughout the year to carry out excellence and integrity in their work.

Conclusion

This report is a product of the combined efforts of KCPSRS staff and advisors functioning under the Board's leadership. It is intended to provide complete and reliable information for making management decisions, serves as a means for determining compliance with legal requirements, and allows for the evaluations of responsible stewardship of the System funds.

In reflecting on the year 2020 and all the challenges of the pandemic, we continue to stand like a tree, rooted in our mission of paying promised benefits and prudently investing trust assets. The long-term security of the benefits we administer require a commitment of time, skill, hard work and dedication to produce. It is our honor to work for you, our members. If you have any questions regarding this report or any aspect of KCPSRS, contact us at KCPSRS 3100 Broadway, Suite 1211, Kansas City, Missouri 64111 or call 819-472-5800 or visit our website www.kcpsrs.org.

Respectfully submitted,

Christine Gierer

Christine Gierer, Executive Director

Laura Oswald

Laura Oswald, Associate Director



Government Finance Officers Association

Certificate of Achievement for Excellence in Financial Reporting

Presented to

Kansas City Public School Retirement System Missouri

For its Comprehensive Annual Financial Report For the Fiscal Year Ended

December 31, 2019

Christopher P. Monill

Executive Director/CEO



3100 Broadway, Suite 1211 Kansas City, MO 64111 816.472.5800 Fax: 816.472.5909 Email: <u>kcpsrs@kcpsrs.org</u> Website: <u>www.kcpsrs.org</u>

May 28, 2021

Dear Members,

On behalf of the Board of Trustees (Board), I am pleased to present KCPSRS' *Comprehensive Annual Financial Report for* the fiscal year ending December 31, 2020. The past year was full of headwinds and operational challenges. When the pandemic hit, our staff and Board quickly adjusted. Our determination allowed us to transition to a remote work environment, continue to assist retirees, educate active members, and increase our investment portfolio, despite some of the largest daily financial market moves in recent history.

Despite lots of uncertainty, 2020 proved to be a year of resourcefulness, creativity, development of new skills, and financial gains. While this report provides information on the financial status of your retirement system, I would like to highlight several initiatives and successes that occurred during the year:

- Staff held three pre-retirement seminars.
- In late March, staff began working remotely, rotating one or two staff coming into the office each day.
- All Board meetings since March 2020 were held virtually via Zoom.
- Over 560 inactive members were contacted about their account balances resulting in 556 refunds.
- Contact made with all retirees who were age 100 or older for certification of critical contact information.
- Letters sent to inactive members whose addresses were reported to have changed via an address review.
- The number of retirees receiving their monthly benefit as a paper check decreased by 50% to the more secure and efficient direct deposit approach.
- Investable System assets increased by 5% to \$692 million as of December 31, 2020.
- Total return on investments as of December 31st was 11.9%, net after all investment fees and expenses.

On behalf of the Board and staff, I would like to recognize Javier Alfonso for his work while serving on the Board. In December 2020, the Board appointed Ben Bullington as replacement trustee to serve until the next active member election in 2021. KCPSRS Board members serve the retirement system without compensation for the time they devote to fulfilling their fiduciary duties.

We look forward to continuing to grow and better serve you in 2021.

Sincerely,

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Horace Coleman, Board of Trustees Chairperson

Our Mission

The Kansas City Public School Retirement System works to fulfill the expectation of a secure retirement for employees of Kansas City's School District, charter schools and Public Library.

Our Core Values

In pursuit of our mission, our work is guided and informed by four core values.

FIDUCIARY STEWARDSHIP

We are legally and ethically responsible to our members to safeguard the assets that provide for their future financial security.

ACCOUNTABILITY

Our principle obligation and concern is the security of member assets through efficient operations and prudent investment decisions.

TRANSPARENCY

We ensure openness in all aspects of governance and operations for our members and community.

MEMBER FOCUSED

We strive to make all decisions in the best interests of our members. All of our work begins with the question, *"Is it good for our members?"*

KCPSRS Board of Trustees

As of December 31, 2020

Horace Coleman, Jr. Board Chairperson Appointed by School Board

Curtis Rogers Vice-Chairperson Elected by retired members

Debbie Siragusa Treasurer Appointed by Library District

Javier Alfonso Elected by active members

Mark Bedell, Ed.D. District Superintendent Ex-Officio

Joanne M. Collins Appointed by School Board Carl Evans Appointed by School Board

Anthony Madry Elected by active members

Roger Offield Elected by active members

Beverly Pratt Elected by retired members

Von Smalley Elected by active members

Brian Welch Appointed by School Board

KCPSRS Staff

Christine Gierer, Executive Director and Board Secretary

Jill Chaloupka, Executive Assistant

Erica Hill, Retirement Education Specialist

Jim Lewallen, Administrative Manager

Shannon McClain, Retiree Services Coordinator

Laura J. Oswald, Associate Director

Joe Schaefer, IT Manager

Outside Professional Services

ACTUARY Cavanaugh Macdonald Consulting, LLC

AUDITOR Mayer Hoffman McCann PC

INVESTMENT ASSET CONSULTANT Segal Marco Advisors

LEGAL COUNSEL Seyferth, Blumenthal & Harris, LLC Husch Blackwell, LLP

MASTER CUSTODIAN Bank of New York Mellon

BANKING RELATIONSHIP Bank of America

INSURANCE Lockton Companies, Inc.

TECHNOLOGY CONSULTANTS Sagitec GFI

LEGISLATIVE CONSULTANT The Giddens Group

MEDICAL ADVISORS Clay Platte Family Medicine Clinic

INVESTMENT ADVISORS

Ares Management, LLC

BlackRock

Brandywine Global Investment Management, LLC

Brookfield Asset Management Inc

Corbin Capital Partners, L.P.

Earnest Partners

Fisher Investments

HarbourVest Partners, LLC

JP Morgan Investment Management

Kayne Anderson Capital Advisors, L.P.

Landmark Partners

Loomis Sayles & Company, L.P.

Mesirow Financial Investment Management

Neuberger Berman Crossroads

Pantheon Ventures Inc

Pugh Capital Management

RhumbLine Advisers, L.P.

The Green Cities Company

The Rock Creek Group, L.P.

Schroder Investment Management

StepStone Group, LLC

Wellington Trust Co.

Wells Capital Partners, LLC

Westfield Capital Management Company, L.P.

Westport Capital Partners, LLC



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INDEPENDENT AUDITORS' REPORT

To the Board of Trustees Public School Retirement System of the School District of Kansas City, Missouri Kansas City, Missouri

Report on the Financial Statements

We have audited the accompanying financial statements of the Public School Retirement System of the School District of Kansas City, Missouri (the "Retirement System"), which comprise the statements of fiduciary net position as of December 31, 2020 and 2019, and the related statements of changes in fiduciary net position for the years then ended, and the related notes to the financial statements, as listed in the table of contents.

Management's Responsibility for the Financial Statements

Management is responsible for the preparation and fair presentation of these financial statements in accordance with accounting principles generally accepted in the United States of America; this includes the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of financial statements that are free from material misstatement, whether due to fraud or error.

Auditors' Responsibility

Our responsibility is to express an opinion on these financial statements based on our audits. We conducted our audits in accordance with auditing standards generally accepted in the United States of America. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditors' judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. Accordingly, we express no such opinion. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluating the overall presentation of the financial statements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

Opinion

In our opinion, the financial statements referred to above present fairly, in all material respects, the fiduciary net position of the Retirement System as of December 31, 2020 and 2019, and the changes in fiduciary net position for the years then ended in accordance with accounting principles generally accepted in the United States of America.

KRESTON Member of Kreston International – a global network of independent accounting firms

Other Matters

Required Supplementary Information

Accounting principles generally accepted in the United States of America require that the management's discussion and analysis and the schedules of changes in net pension liability and related ratios, employer contributions, and investment returns, as listed in the table of contents, be presented to supplement the basic financial statements. Such information, although not a part of the basic financial statements, is required by the Governmental Accounting Standards Board, who considers it to be an essential part of financial reporting for placing the basic financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with auditing standards generally accepted in the United States of America, which consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management's responses to our inquiries, the basic financial statements, and other knowledge we obtained during our audits of the basic financial statements. We do not express an opinion or provide any assurance on the information because the limited procedures do not provide us with sufficient evidence to express an opinion or provide any assurance.

Other Information

Our audits were conducted for the purpose of forming opinions on the financial statements that collectively comprise the Retirement System's basic financial statements. The other supplementary information listed in the table of contents is presented for purposes of additional analysis and is not a required part of the basic financial statements.

The other supplementary information is the responsibility of management and was derived from and relates directly to underlying accounting and other records used to prepare the basic financial statements themselves, and other additional procedures in accordance with auditing standards generally accepted in the United States of America. In our opinion, the other supplementary information is fairly stated, in all material respects, in relation to the basic financial statements as a whole.

The Introductory, Investment, Actuarial and Statistical sections, as listed in the table of contents, have not been subjected to the auditing procedures applied in the audit of the financial statements, and accordingly, we do not express an opinion or provide any assurance on it.

Mayer Hoffman McCam P.C.

Kansas City, Missouri June 7, 2021

Management's Discussion and Analysis

The discussion and analysis of the Kansas City Public School Retirement System financial statements provides an overview of its financial activities during the years ended December 31, 2020 and 2019. Please read it in conjunction with the Transmittal letter and more detailed financial statements, notes, and required supplementary information on pages 41-44 of this report.

KCPSRS is the defined benefit plan for all regular, full-time employees of the Kansas City School District, the Kansas City Public Library, the charter schools located within the boundaries of the Kansas City School District and the Retirement System. The Plan was established by the Missouri General Assembly, commenced in 1944, and is administered by the KCPSRS Board of Trustees to provide retirement, disability, and survivor benefits to its members.

Overview of Financial Statements and Accompanying Information

- The financial statements presented in this report are the Statements of Fiduciary Net Position as of December 31, 2020 and 2019, and the Statements of Changes in Fiduciary Net Positions for the years ended December 31, 2020 and 2019. These statements reflect resources available for the payment of benefits as of the year-end, and the sources and uses of those funds during the year.
- The notes to the financial statements are an integral part of the financial statements and provide facts and detailed information to assist the reader in understanding the statements. Information in the notes includes a description of the Plan, a summary of significant accounting policies, the method used to value investments, a summary of investments, and actuarial methods and assumptions.
- Schedules related to employer contributions and the funding of the Plan are included in the section entitled Required Supplementary Information.
- Other supplementary schedules consist of detailed information supporting administrative and investment expenses.

Fiduciary Net Position

December 31,				Percentage	Percentage	
	2020	2019	2018	Change From 2019 to 2020	Change From 2018 to 2019	
Receivables	\$ 3,454,463	\$ 3,268,216	\$ 1,101,115	5.70%	196.81%	
Investments	690,839,707	658,275,646	600,954,128	4.95%	9.54%	
Cash	1,270,156	1,324,695	1,877,215	-4.12%	-29.43%	
Prepaid and other assets	68,747	65,706	44,631	4.63%	47.22%	
Property and equipment, net of						
accumulated depreciation	6,857	16,687	27,707	-58.91%	-39.77%	
Total assets	695,639,930	662,950,950	604,004,796	4.93%	9.76%	
Securities purchased	689,003	208,162	610,736	230.99%	-65.92%	
Accounts payable	575,230	546,467	533,053	5.26%	2.52%	
Accrued expenses	137,957	110,481	98,528	24.87%	12.13%	
Total liabilities	1,402,190	865,110	1,242,317	62.08%	-30.36%	
Net position restricted for pensions	\$ 694,237,740	\$ 662,085,840	\$ 602,762,479	4.86%	9.84%	

Financial Analysis of Fiduciary Net Position

As of December 31, 2020, KCPSRS held \$694.2 million in trust on behalf of about 11,318 active, inactive, and retired members. This represented a \$32.2 million increase in net position from the previous fiscal year-end. In fiscal 2019, KCPSRS experienced a \$59.3 million increase in net position from the previous fiscal year-end.

Assets - Total assets of KCPSRS were \$ 695.6 million as of December 31, 2020 and \$663.0 million as of December 31, 2019 and included receivables, investments, and cash. A large percentage of total assets, 99.3% for both fiscal 2020 and fiscal 2019 is represented by investments held to provide retirement, disability, and survivor benefits to its members. Other assets, including cash, receivables from employee and employer contributions, receivables from investment-related transactions, prepaid assets, and property and equipment make up .7% for both fiscal 2020 and fiscal 2019 of total assets. Total assets increased \$32.7 million (4.9%) from the previous fiscal year-end primarily attributable to favorable investment market conditions as evidenced by the increase in investable assets of \$32.6 million (5.0%). In fiscal 2019, total assets increased \$59.0 million (9.8%) from the previous fiscal year-end largely attributable to favorable investment market conditions as evidenced by the increase in investable assets of \$57.3 million (9.5%). Receivables also increased \$2.2 million (196.8%). The increase was the result of the Kansas City School District paying their December employer contribution and bi-monthly employee contribution soon after year end 2019 versus in 2018 when all School District's contributions were paid by year end.

Liabilities – Total liabilities of KCPSRS were \$1.4 million as of December 31, 2020 and \$.9 million as of December 31, 2019 and included payables for investment manager fees, payables from investment-related transactions, and accrued expenses. Total liabilities increased \$.5 million from previous fiscal year-end due to the increase in amounts due brokers for purchase of investments. In fiscal 2019, total liabilities decreased \$.4 million from the previous fiscal year-end due to the decrease in amounts due brokers for purchase.

Net Position – The fiduciary net position restricted for pensions increased 4.86% from prior fiscal year, ending at \$694.2 million as of December 31, 2020. The fiduciary net position restricted for pensions increased 9.84% during fiscal 2019, ending at \$662.1 million as of December 31, 2019.

-	Years Ended December 31,			Percentage	Percentage
	2020	2019	2018	Change From 2019 to 2020	Change From 2018 to 2019
Contributions	\$ 45,303,195	\$ 40,013,495	\$ 35,146,999	13.22%	13.85%
Net investment income (loss)	73,263,968	106,033,717	(33,250,915)	-30.91%	418.89%
Total additions	118,567,163	146,047,212	1,896,084	-18.82%	7,602.57%
Benefits paid	80,473,732	80,228,574	79,333,689	0.31%	1.13%
Refunds of contributions	4,316,797	4,937,877	4,084,837	-12.58%	20.88%
Depreciation expense	9,830	11,020	17,150	-10.80%	-35.74%
Administrative expenses	1,614,904	1,546,380	1,499,928	4.43%	3.10%
Total deductions	86,415,263	86,723,851	84,935,604	-0.36%	2.11%
Net increase (decrease)	32,151,900	59,323,361	(83,039,520)	-45.80%	171.44%
Net position restricted for pensions, beginning of year	662,085,840	602,762,479	685,801,999	9.84%	-12.11%
Net position restricted for pensions, end of year	\$ 694,237,740	\$ 662,085,840	\$ 602,762,479	4.86%	9.84%

Changes in Fiduciary Net Position

Financial Analysis of Changes in Fiduciary Net Position

Member contributions, employer contributions, and investment income are additions to fiduciary net position. During 2018 legislation was passed that increased the contribution rate of the employers by 1.5% on January 1, 2019 and again on January 1, 2020 and thereafter the legislation established guidelines to keep the System's contribution rate at the actuarial required contribution (ARC) rate. The increases of 3% through 2020 support the System in becoming financially stronger as continued payment of the ARC is one of the most important factors of funding a defined benefit plan. For the year 2020 the employer contribution rate increased to 12.0% from 10.5% for year 2019 and 9% for year 2018 of covered payroll. For years 2020, 2019 and 2018, members contributed at 9.0% of covered salary. Total contributions for fiscal 2020 shows an increase of \$5.3 million (13.2%) due to the 1.5% increase in the employer contribution during 2020 and the growth of payroll compared to previous year-end. Total contributions for fiscal 2019 shows an increase of \$4.9 million (13.9%) due to the 1.5% increase in employer contribution compared to fiscal 2018.

The portfolio's investment rate of return gross of fees for the current and preceding two fiscal years were 12.5%, 18.89%, and -4.96% respectively. Investment income for fiscal 2020 of \$79.4 million and investment expenses of \$6.1 million, investment income for fiscal 2019 of \$112.5 million and investment expenses of \$6.5 million, investment loss for fiscal 2018 of \$28.5 million and investment expenses of \$4.8 million are primarily the result of these market returns. Investment related expenses include investment manager fees, investment advisor and custodial fees.

Total additions to fiduciary net position as of December 31, 2020 decreased \$27.5 million from previous fiscal yearend and as of December 31, 2019 increased \$144.2 million from previous fiscal year-end primarily attributable to investment market returns during those periods, showing positive investment return in 2020 although not as strong as in 2019 and negative investment return in 2018.

Benefits paid to members, refunds of member contributions, and administrative expenses are the deductions fiduciary net position. Benefits paid out exceeded contributions received by \$35.2 million for fiscal year 2020 and by \$40.2 million for fiscal year 2019. This excess of benefits paid relative to contributions received is characteristic of a mature pension plan such as KCPSRS. The administrative expenses for both fiscal years 2020 and 2019 were approximately .23% of assets.

Total deductions from fiduciary net position as of December 31, 2020 decreased \$.3 million (.36%) from previous fiscal year-end due to a decrease in refunds of contributions. For fiscal year 2019 deductions from fiduciary net position showed an increase of \$1.8 million (2.1%) from previous fiscal year-end due to increases in both benefits paid and refunds of contributions.

Request for information

This report is intended to provide the Board of Trustees, the System's membership, and other interested parties a general overview of the System's financial matters. Questions about this report or requests for additional financial information should be directed to KCPSRS at 3100 Broadway, Suite 1211, Kansas City, MO 64111, or by email to kcpsrs@kcpsrs.org.

Statements of Fiduciary Net Position December 31, 2020 and 2019

ASSETS	2020	2019
Receivables:		
Plan member contributions	\$ 785,395	\$ 657,626
Employers' contributions	1,675,278	1,298,949
Due from brokers for securities sold	569,636	811,895
Accrued interest and dividends	424,154	499,746
	3,454,463	3,268,216
Investments, at fair value:		
Cash and short term investments	5,996,442	6,511,704
Commingled domestic fixed income	63,360,801	64,044,449
High yield fixed income	14,691,378	17,115,419
Global fixed income	34,550,614	33,025,912
Domestic equity	169,976,420	156,074,664
International equity	180,158,282	157,924,044
Pooled real estate funds	63,003,840	62,888,278
Alternative equity funds	114,891,293	132,440,656
Private equity funds	44,210,657	28,250,520
	690,839,707	658,275,646
Other:		
Cash	1,270,156	1,324,695
Prepaid and other assets	68,747	65,706
Property and equipment, at cost, less	6,857	16,687
accumulated depreciation	0,001	10,001
	1,345,760	1,407,088
TOTAL ASSETS	605 620 020	662,950,950
TOTAL ASSETS	695,639,930	002,950,950
LIABILITIES	000.000	000 (00
Due to broker for securities purchased	689,003	208,162
Accounts payable	575,230	546,467
Accrued payroll expenses	137,957	110,481
TOTAL LIABILITIES	1,402,190	865,110
NET POSITION RESTRICTED FOR PENSIONS	\$ 694,237,740	\$ 662,085,840

See Notes to the Financial Statements

Statements of Changes in Fiduciary Net Position Years ended December 31, 2020 and 2019

	2020	2019
ADDITIONS		
Contributions:		
Plan members	\$ 19,531,341	\$ 18,524,657
Employers	25,771,854	21,488,838
Total contributions	45,303,195	40,013,495
Investment Income:		
Net realized and unrealized appreciation		
in fair value of investments	73,874,683	104,158,262
Interest	1,971,911	2,219,412
Dividends	3,552,668	6,150,997
	79,399,262	112,528,671
Less: Investment expenses	6,135,294	6,494,954
Net investment income (loss)	73,263,968	106,033,717
TOTAL ADDITIONS	118,567,163	146,047,212
DEDUCTIONS		
Benefits paid	80,473,732	80,228,574
Refunds of contributions	4,316,797	4,937,877
Depreciation expense	9,830	11,020
Administrative expenses	1,614,904	1,546,380
TOTAL DEDUCTIONS	86,415,263	86,723,851
NET INCREASE IN NET POSITION	32,151,900	59,323,361
NET POSITION RESTRICTED FOR PENSION		
Beginning of year	662,085,840	602,762,479
End of year	\$ 694,237,740	\$ 662,085,840

See Notes to the Financial Statements

NOTES TO FINANCIAL STATEMENTS

(1) <u>Description of plan</u>

The following description of the Public School Retirement System of the School District of Kansas City, Missouri (the "Retirement System") provides only general information. Participants should refer to the Missouri Revised Statutes regarding the Retirement System or the Summary Plan Description for a more complete description of the Retirement System's provisions, which are available from the Retirement System's administrator.

General - The Retirement System is a cost-sharing multiple-employer defined benefit pension plan (the "Plan"), which was established by the General Assembly of the State of Missouri and is exempt from the provisions of the Employee Retirement Income Security Act of 1974. The Board of Trustees of the Retirement System (the "Board") administers and operates the Plan in accordance with the statutes of the State of Missouri. During the year ended December 31, 2020, participating employers consisted of the School District of Kansas City, Missouri; the Kansas City, Missouri Public Library District; the Retirement System; and the following charter schools: Académie LaFayette, Academy for Integrated Arts, Allen Village Charter School, Brookside Charter School, Citizens of the World Kansas City, Crossroads Charter Schools, DeLaSalle Charter School, Ewing Marion Kauffman School, Frontier Schools, Genesis School, Inc., Gordon Parks Elementary, Guadalupe Center Schools, Hogan Preparatory Academy, Hope Leadership Academy, Kansas City Girl's Preparatory Academy, Kansas City International Academy, Kansas City Neighborhood Academy (closed June 30, 2019), KIPP Endeavor Academy, Lee A. Tolbert Community Academy, Pathway Academy (closed June 30, 2019), Scuola Vita Nuova, and University Academy.

Eligibility - All regular, full-time employees of the participating employers become members of the Plan as a condition of employment if they are in a position requiring at least 25 hours of work per week and nine calendar months per year. Employees who retire after June 30, 1999 and were hired after 1961, but before January 1, 2014 are members of Plan B. Employees hired after January 1, 2014 are members of Plan C. At January 1, 2020 and 2019, respectively, the Plan's membership consisted of:

	2020	2019
Active plan members	4,074	3,898
Retirees and beneficiaries receiving benefits	4,145	4,113
Terminated plan members, vested entitled to but not yet		
receiving benefits	529	531
Terminated plan members, nonvested entitled to a refund of		
contributions plus accrued interest	2,631	2,784
Total plan membership	11,379	11,326

Contributions - For the years beginning January 1, 2020 and 2019, members were required to contribute 9% of their annual covered salary. For 2019, employers were required to match the contributions at the same rate made by their employees. During 2018, the Missouri General Assembly passed legislation that increased the employer contribution rate to 10.50% of annual covered salary effective January 1, 2019, and then to 12.00% of annual covered salary effective January 1, 2020. Beginning July 1, 2021, the employer contribution rate will be the greater of (1) the actuarial required contribution rate less the member contribution rate, or (2) 12.00% of annual covered salary, until the Retirement System is fully funded. Once the Retirement System is fully funded, the employer contribution rate may increase or decrease, in subsequent years, depending on valuation results and the employee contribution rate may decrease from 9% depending on valuation results. However, such changes are subject to statutory limitations.

Contributions (continued) - The contribution rate is set each year by the Board of Trustees of the Kansas City Public School Retirement System upon the recommendation of the Retirement System's actuary within the contribution restrictions of RSMo Section 169.350 subsections 5 and 6.

Service - Creditable service is membership service. This is service for which required contributions have been made. Members of Plan B are effectively limited to 30 years of creditable service, regardless of the number of years actually worked, unless the member earned more than 30 years prior to August 28, 1993. Members of Plan C are effectively limited to 34.25 years of creditable service, regardless of the number of years actually worked.

Compensation

Annual compensation - Compensation in excess of the limitations set forth in Section 401(a)(17) of the Internal Revenue Code will be disregarded for purposes of determining contributions and benefits for members of Plan B and C. A member's annual compensation is the member's regular compensation.

Average final compensation - For members of Plan B and C, the average final compensation is the highest average compensation paid during any four consecutive years of creditable service.

Normal retirement

Eligibility - A member of Plan B may retire (a) after the completion of five years of creditable service, provided such member has attained at least the age of 60 or (b) after the member has accumulated a minimum of 75 credits (effective August 28, 1998), where each year of creditable service plus a member's age equals 75 credits. A member of Plan C may retire (a) after the completion of five years of creditable service, provided such member has attained at least the age of 62 or (b) after the member has accumulated a minimum of 80 credits, where each year of creditable service plus a member's age equals 80 credits.

Benefit - For a member of Plan B, the normal monthly retirement benefit equals the product of one-twelfth of 2.00% (1.75% for members who retired prior to June 30, 1999) of the member's average final compensation and years of creditable service, subject to a maximum of 60% of their average final compensation. The normal monthly retirement benefit for a member of Plan B whose years of creditable service exceeded 34.25 years on August 28, 1993, shall equal the product of 1.75% and the member's years of creditable service on August 28, 1993. For a member of Plan C, the normal monthly retirement benefit equals the product of one-twelfth of 1.75% of the member's average final compensation and years of creditable service, subject to a maximum of 60% of their average final compensation and years of creditable service, subject to a maximum of 60% of their average final compensation and years of creditable service, subject to a maximum of 60% of their average final compensation.

Minimum benefit - Effective January 1, 1996, any member with at least ten years of service, but less than twenty years, is entitled to a minimum monthly retirement benefit equal to the sum of \$150 and \$15 for each full year of creditable service in excess of ten years or the actuarial equivalent if an option is elected. Any member with at least twenty years of creditable service at retirement is entitled to a minimum monthly retirement benefit of \$300 or the actuarial equivalent of \$300 if an option is elected. Beneficiaries of deceased members who retired with at least ten years of creditable service and elected one of the optional plans for payment of benefits may receive the actuarial equivalent of the minimum monthly retirement benefit available for the option chosen.

Early retirement

Eligibility - A member with at least five years of creditable service and a minimum age of fifty-five is eligible for early retirement.

Benefit - A member eligible for early retirement will receive a reduced benefit, calculated as for normal retirement, which recognizes service and compensation to the actual retirement date. The reduction in benefit will provide a benefit which is actuarially equivalent to the normal retirement benefit that would be payable at the member's normal retirement date.

Disability retirement

Eligibility - A member with at least five years of creditable service who is certified to be totally incapacitated for performance of duty by the Medical Board (as designated by the Board) is eligible for disability retirement.

Benefit - A disabled member will receive a benefit calculated as for normal retirement, based on credible service and average final compensation at the actual disability retirement date, or the minimum disability benefit whichever is greater. The minimum disability retirement benefit shall be the lesser of:

- 1. 25% of the member's average final compensation; or
- 2. The member's service retirement benefit calculated on the member's average final compensation and the maximum number of years of creditable service the member would have earned had the member remained an employee until age 60.

Termination benefits - vested

Eligibility - A member who has at least five years of creditable service earns a vested interest in their accrued benefit, provided the member leaves their contributions in the Plan.

Benefit - The vested benefit is calculated as a normal retirement benefit based on a member's creditable service and average final compensation on the termination date. The benefit is payable, at minimum, on the member's normal retirement date.

Termination benefits - non-vested

If the member's termination is for reasons other than death or retirement, and if the member has not met the vesting or retirement requirements, the member's contributions with interest will be refunded.

Death benefit

Prior to retirement - For a member who passes away while actively employed, the member's accumulated contributions with interest will be paid to the member's beneficiary. Certain beneficiaries of a member of Plan B or C have the option to receive a monthly retirement benefit or a refund of the member's contributions with interest. All beneficiaries are guaranteed to receive at least the member's accumulated contributions at retirement, if a member passes away before electing an option.

Death benefit (continued)

Post retirement - The optional form of benefit payment selected under either Plan B or Plan C will determine what, if any, benefits are payable upon death after retirement.

Option 1 - The retiree's designated survivor will receive, for life, the same level of monthly retirement benefit. In the event that the retiree's designated survivor predeceases the retiree, the retiree's monthly retirement benefit will be adjusted to the amount it would have been, had the retiree not elected Option 1.

Option 2 - The retiree's designated survivor will receive, for life, a monthly retirement benefit equal to one-half the retiree's benefit. In the event the retiree's designated survivor predeceases the retiree, the retiree's monthly benefit will be adjusted to the amount it would have been, had the retiree not elected Option 2.

Option 3 - No benefits are payable to the retiree's estate or any beneficiary. Retirement benefits payable under this option will be actuarially increased from the normal formula.

If the death of any retiree who has not elected an option occurs before they have received total benefits at least as large as their accumulated contributions and interest, the difference shall be paid to the deceased's beneficiary, if living, or to their estate.

Benefit increase adjustments - The Board shall determine annually whether or not the Retirement System can provide an increase in benefits for those retirees who, as of January 1 preceding the date of such increase, have been retired at least one year (three years prior to January 1, 2002). Any increase also applies to optional retirement allowances paid to a retiree's beneficiary. Before any increases are made, the following requirements must be satisfied:

- 1. The Retirement System funded ratio as of January 1st of the preceding year of the proposed increase must be at least 100% after adjusting for the effect of the proposed increase. The funded ratio is the ratio of assets to the pension benefit obligation.
- 2. The actuarially required contribution rate, after adjusting for the effect of the proposed increase, may not exceed the statutory contribution rate.
- 3. The actuary must certify that the proposed increase will not impair the actuarial soundness of the Retirement System.

In accordance with the Benefit Increase Adjustments Policy, if an increase is permissible, the amount of the increase will be equal to the lesser of 3% or the percentage increase in the CPI for the preceding year, subject to a cumulative increase of 100% subsequent to December 31, 2000.

The Board reserves the right, at its sole discretion, not to award any Benefit Increase Adjustment or other supplements for any year, even if the statutory requirements for an increase are satisfied, or to provide increases in greater or lesser amounts than prescribed by this policy. For the years ended December 31, 2020 and 2019 there was no Benefit Increase Adjustment or an extra check issued to eligible retirees.

Administration of the Retirement System - The Board is responsible for the general administration and proper operation of the Retirement System. The Board consists of twelve members: four members appointed by the Kansas City Public Schools Board of Directors, one member appointed by the Board of Trustees of the Library District, four members elected by and from the members of the Retirement System, two members elected by and from the retirees of the Retirement System, and the Superintendent of Schools of the School District of Kansas City, Missouri. The Board hires an Executive Director to manage the day-to-day operations and implement policies as set by the Board.

Administrative expenses - All expenses of the Retirement System are paid by the Plan. Fees related to the administration of Plan are included in administrative expenses. Investment related expenses are included in net appreciation (depreciation) of fair value of investments.

(2) <u>Summary of significant accounting policies</u>

Basis of accounting - The financial statements of the Retirement System are prepared on the accrual method of accounting. Plan member and employer contributions are recognized in the period in which the contributions are due. Beginning in 2018, the School District of Kansas City, Missouri and the Kansas City, Missouri Public Library District began paying their employer portions of their retirement payment each month rather than one year in arrears. Benefits and refunds are recognized when due and payable in accordance with the terms of the Plan.

The Retirement System's financial statements, notes to the financial statements, and required supplementary information were prepared in conformity with Governmental Accounting Standards Board ("GASB") Statement No.67, *Financial Reporting for Pension Plans*, as amended. GASB No. 67 addresses accounting and financial reporting requirements for pension plans. Significant requirements include an actuarial calculation of total and net pension liability. It also includes comprehensive footnote disclosures regarding the pension liability, the sensitivity of the net pension liability to the discount rate and extensive investment activity disclosures.

Use of estimates - The preparation of financial statements in conformity with accounting principles generally accepted in the United States of America requires management to make estimates and assumptions that affect reported amounts of assets and liabilities and changes therein, and disclosures of contingent assets and liabilities. Accordingly, actual results may differ from those estimates.

Property and equipment - Property and equipment are carried at cost. Purchases are depreciated over their estimated useful lives by use of the straight-line method. The useful lives for the purpose of computing depreciation are:

Equipment	7 years
Software	5 years

Investment valuation and income recognition - The net unrealized appreciation (depreciation) in the fair value of investments for the period reflects the net increase in the fair value of the investments, on an aggregate basis, between the beginning and the end of the reporting period. The net realized gain or loss on sale of investments is the difference between the proceeds received and the cost of the investment sold. The net realized gains and losses have been combined with the net unrealized appreciation and depreciation for purposes of this report.

Purchases and sales of securities are recorded on a trade-date basis. Investment income is recorded on the accrual basis. Dividends are recorded on the ex-dividend date.

Rate of return - For the years ended December 31, 2020 and 2019, the annual time-weighted return on the Retirement System's investments, net of investment expense was 11.90% and 18.22%, respectively. The money-weighted rate of return expresses investment performance, net of investment expense, adjusted for the changing amounts actually invested.

(2) <u>Summary of significant accounting policies (continued)</u>

The Retirement System's policy in regard to the allocation of invested assets is established and may be amended by the Board. Plan assets are managed on a total return basis with a long-term objective of achieving and maintaining a fully funded status for the benefits provided through the pension plan. In 2017, an asset liability study was completed at the request of the Board. This study identified new optimal portfolio mixes with new asset classes for the Board's consideration. The Board chose a new asset allocation mix that is expected to increase their long-term return slightly while lowering the overall risk of the portfolio. The table below illustrates the Retirement System's Board of Trustees approved asset allocation as of December 31, 2020.

Asset Class	2020 Targe Allocation	
US Equity	22.50	%
Multi-Asset Class	13.50	%
Real Estate	12.00	%
International Developed Equity	12.00	%
Emerging Market Equity	10.00	%
Core Fixed Income	10.00	%
Private Equity	7.50	%
Hedge Funds of Funds	5.00	%
Global Fixed Income	5.00	%
High Yield Bonds	2.50	%
Total	100.00	%

Concentration risk - As of December 31, 2020 and 2019, the Retirement System has the following concentrations defined as investments (other than those issued or guaranteed by the U.S. government in any one organization) that represent 5% or more of the Retirement System's net position.

	December 31				
	2020	-	2019		
Rhumbline S&P 500 Pooled Index Fund	\$ 75,641,938	\$	73,266,211		
Wells Capital Management Emerging Market Fund	48,157,685		38,356,764		
Rhumbline S&P Mid-Cap 400 Index Fund	46,723,876		43,193,740		
Wellington Opportunistic Investment	43,076,066		*		
Earnest Partners Emerging Market Fund	41,573,922		36,988,912		
Schroder Diversified Growth Collective Investment Trust	39,179,291		*		
AQR Global Risk Premium Fund	*		33,909,264		

*Not applicable, investment amount is below 5%.

(2) <u>Summary of significant accounting policies (continued)</u>

Custodial credit risk - Custodial credit risk is when, in the event a financial institution or counterparty fails, the Retirement System would not be able to recover the value of deposits, investments or collateral securities that are in the possession of an outside party. All investments are held in the Retirement System's name and are not subject to creditors of the custodial financial institution.

Currency risk - Currency risk is the risk that changes in exchange rates will adversely affect the fair value of an investment. All investments held by the Retirement System at December 31, 2020 and 2019 were in United States currency.

Credit risk - Credit risk is the risk that an issuer or other counterparty to a debt investment will not fulfill its obligations. The Retirement System's investment policies require that any investment manager have at least 90% of holdings in issues rated BBB or higher by both Standard & Poor's Corporation and Moody's Investors Service or their equivalents. Each portfolio is required to maintain a reasonable risk level relative to its benchmark. The Retirement System's assets as of December 31, 2020 and 2019 subject to credit risk are shown with current credit ratings below:

	December 3	1, 2020	Quality Rating									
	Fair Value	%		AAA/Aaa		AA/Aa		A/A	BBB/Baa	l	Not R	ated
U.S. Treasuries	\$ 10,217,632	16.1%	\$	10,217,632	\$	-	\$	- \$; -	\$		-
U.S. Government Agencies	16,740,385	26.4%		16,740,385		-		-	-			-
Corporate Bonds	35,636,203	56.2%		8,085,960		827,265		5,637,342	21,011,166		-	74,470
Municipals	766,581	1.2%		429,234		337,347		-	-			-
	\$ 63,360,801	100.0%	\$	35,473,211	\$	1,164,612	\$	5,637,342	5 21,011,166		\$ 7	74,470
	December 3	1, 2019					Quality Rating					
	 Fair Value	%		AAA/Aaa		AA/Aa		A/A	BBB/Baa	I	Not R	ated
U.S. Treasuries	\$ 10,464,098	16.3%	\$	9,868,834	\$	-	\$	-	\$-	\$	5	95,264
U.S. Government Agencies	20,395,960	31.8%		20,395,960		-		-	-			-
Corporate Bonds	32,456,304	50.7%		7,677,647		700,015		6,928,500	16,676,149		4	73,993
Municipals	728,087	1.1%		263,182		464,905		-	-			-

\$ 64,044,449 100.0% \$ 38,205,623 \$ 1,164,920 \$ 6,928,500 \$ 16,676,149 \$ 1,069,257

Interest rate risk - Interest rate risk is the risk that changes in interest rates will adversely affect the fair value of an investment. The Retirement System's assets as of December 31, 2020 and 2019 subject to interest rate risk are shown below grouped by effective duration ranges:

	December 31,	In	vestment Maturiti	es (in years)			
Security Description	2020 Fair Value	Less Than 1	1 - 5	6 - 10	Greater Than 10		
U.S. Treasury & Government Agencies Municipals Corporate Bonds – United States	\$ 26,958,017 766,581 35,636,203	\$ 2,600,797 - 119,528	\$ 2,865,055 143,207 13,335,681	\$ 4,339,331 337,347 9,252,451	\$ 17,152,834 286,027 12,928,543		
	\$ 63,360,801	\$ 2,720,325	\$ 16,343,943	\$ 13,929,129	\$ 30,367,404		
	December 31,	In	vestment Maturiti	estment Maturities (in years)			
	2019	Less			Greater		
Security Description	Fair Value	Than 1	1 - 5	6 - 10	Than 10		
Security Description U.S. Treasury & Government Agencies Municipals Corporate Bonds – United States	Fair Value \$ 30,860,058 728,087 32,456,304	Than 1 \$ 595,264 - 1,205,846	1 - 5 \$ 2,061,880 - 12,824,566	6 - 10 \$ 6,061,308 - 8,563,168			

(3) Fair value measurements

The framework for measuring fair value provides a fair value hierarchy that prioritizes the inputs to valuation techniques used to measure fair value. The hierarchy gives the highest priority to unadjusted quoted prices in active markets for identical assets or liabilities (Level 1) and the lowest priority to unobservable inputs (Level 3). The three levels of the fair value hierarchy are described below:

- Level 1 Inputs to the valuation methodology are unadjusted quoted prices for identical assets or liabilities in active markets that the Plan has the ability to access.
- Level 2 Inputs to the valuation methodology include quoted prices for similar assets and liabilities in active markets; quoted prices for identical or similar assets and liabilities in inactive markets; inputs other than quoted market prices that are observable for the asset or liability; and inputs that are derived principally from or corroborated by observable market data by correlation or other means. If the asset or liability has a specified (contractual) term, the Level 2 input must be observable for substantially the full term of the asset or liability.
- Level 3 Inputs to the valuation methodology are unobservable and significant to the fair value measurement.

The asset or liability's fair value measurement level within the fair value hierarchy is based on the lowest level of any input that is significant to the fair value measurement. Valuation techniques used need to maximize the use of observable inputs and minimize the use of unobservable inputs.

Following is a description of the valuation methodologies used for assets measured at fair value.

In instances where inputs used to measure fair value fall into different levels in the fair value hierarchy, fair value measurements in their entirety are categorized based on the lowest-level input that is significant to the valuation.

Debt and equity securities classified in Level 1 are valued using prices quoted in active markets for those securities.

Debt securities classified in Level 2 are valued using either a bid evaluation or a matrix pricing technique. Bid evaluations may include market quotations, yields, maturities, call features, and ratings. Matrix pricing is used to value securities based on the securities' relationship to benchmark quoted prices. Level 2 debt securities have nonproprietary information that is readily available to market participants, from multiple independent sources, which are known to be actively involved in the market.

(3) Fair value measurements (continued)

	Fair Value Measurements as of I					ecember 31,	2020)
Investment Type	Quoted Prices in Active Markets for Identical Assets (Level 1)		Significant Other Observable Inputs (Level 2)		Significant Unobservable Inputs (Level3)		То	tal Fair Value
Common stocks	\$	138,037,213	\$	-	\$	-	\$	138,037,213
Total equity investments		138,037,213		-		-		138,037,213
U.S. Treasuries		10,217,632		-		-		10,217,632
U.S. Government Agencies		-		16,740,385		-		16,740,385
Collateralized mortgage-backed securities		-		3,459,112		-		3,459,112
Corporate bonds		-		24,649,597		-		24,649,597
Corporate asset-backed securities		-		5,454,115		-		5,454,115
Non-agency collateralized mortgage obligations		-		2,073,379				2,073,379
Municipals		-		766,581		-		766,581
Total fixed income investments		10,217,632		53,143,169		-		63,360,801
Total investments by fair value level	\$	148,254,845	\$	53,143,169	\$	-	\$	201,398,014
Investments measured at NAV practical expedient ^(a)								483,445,271
Investments measured at amortized cost ^(b)								5,996,422
Total investments measured at fair value							\$	690,839,707

	Fair Value Measurements as of De					31, 3	2019	
Investment Type	A	ioted Prices in ctive Markets for Identical ssets (Level 1)	Si	gnificant Other Observable Inputs (Level 2)	Significant Unobservable Inputs (Level 3)	e	Tot	al Fair Value
Common stocks	\$	122,193,011	\$	-	\$	-	\$	122,193,011
Total equity investments		122,193,011		-		-		122,193,011
U.S. Treasuries		10,464,098		-		-		10,464,098
U.S. Government Agencies		-		19,336,240		-		19,336,240
Collateralized mortgage-backed securities		-		1,059,720		-		1,059,720
Corporate bonds		-		25,151,991		-		25,151,991
Corporate asset-backed securities		-		4,895,108		-		4,895,108
Non-agency collateralized mortgage obligations		-		2,409,205		-		2,409,205
Municipals				728,087				728,087
Total fixed income investments		10,464,098		53,580,351		-		64,044,449
Total investments by fair value level	\$	132,657,109	\$	53,580,351	\$	-	\$	186,237,460
Investments measured at NAV practical expedient ^(a)								465,523,482
Investments measured at amortized cost ^(b)								6,511,704
Total investments measured at fair value							\$	658,275,646

(a) Certain investments that were measured at net asset value ("NAV") per share (or its equivalent) practical expedient have not been classified in the fair value hierarchy. The fair value amounts presented in this table are intended to permit reconciliation of the fair value hierarchy to the line items presented in the statements of net assets available for benefits.

(3) Fair value measurements (continued)

(b) The EB Temporary Investment Fund of The Bank of New York Mellon (the "Fund) values its investments on the basis of amortized cost which approximates fair value for the Fund as a whole. The amortized cost method involves valuing a security at cost on the date of purchase and thereafter at a constant dollar amortization to maturity of the difference between the principal amount due at maturity and the initial cost of the security. The use of amortized cost is subject to compliance with the Fund's amortized cost procedures as specified under The Bank of New York Mellon Employee Benefit Collective Investment Fund Plan.

The valuation method for investments measured at the net asset value per share, or equivalent, as of December 31, 2020 and 2019 are presented in the tables below.

	December 31, 2020 Fair Value	Unfunded Commitments	Redemption Frequency (If Currently Eligible)	Redemption Notice Period
Investment Type				
Equity commingled funds				
Developed markets (1)	122,365,813	-	Daily	2 days
Emerging markets (1)	89,731,676	-	Daily/Weekly	2 days
Fixed-income comingled funds				
High yield fixed income (1)	14,691,379	-	Daily	2 days
International fixed income (1)	34,550,614	-	Daily	10 days
Hedge fund of funds commingled funds (1)	32,635,936	-	Quarterly	90 - 100 days
Private equity funds (2)	44,210,657	48,367,753	Not Eligible	N/A
Multi-asset class commingled funds (1)	82,255,357	-	Daily/Monthly	15 – 30 days
Real estate commingled fund (3)	22,429,201	-	Quarterly	45 - 60 days
Real estate (3)	40,574,638	22,561,742	Not Eligible	N/A
Investments measured at the NAV practical expedient	\$ 483,445,271			
	December 31, 2019 Fair Value	Unfunded Commitments	Redemption Frequency (If Currently Eligible)	Redemption Notice Period
Investment Type				
Equity commingled funds				
Developed markets (1)	116,459,951	-	Daily	2 days
Emerging markets (1)	75,345,746	-	, Daily/Weekly	2 days
Fixed-income comingled funds				
High yield fixed income (1)	17,115,419	-	Daily	2 days
International fixed income (1)	33,025,912	-	Daily	10 days
Hedge fund of funds commingled funds (1)	37,794,818	-	Quarterly	90 - 100 days
Private equity funds (2)	28,250,520	63,600,000	Not Eligible	N/A
Multi-asset class commingled funds (1)	94,645,838	-	Daily/Monthly	15 - 30 days
Real estate commingled fund (3)	25,549,774	-	Quarterly	45 - 60 days
Real estate (3)	37,338,504	5,100,000	Not Eligible	N/A

(1) Consists of two domestic equity funds, two international emerging market equity funds, two fixed income funds and two hedge fund of funds, two multi-asset class funds that are considered commingled in nature. Each are valued at the net asset value of the units held at the end of the period based upon the fair value of the underlying investments.

(3) Fair value measurements (continued)

- (2) The Retirement System's private equity portfolio consists of 391 active partnerships with the funds-of-funds investments, which invests primarily in buyout funds, with exposure to venture capital, special situations, growth equity and supplemented by secondary and co-investment opportunities. The fair values of the fund-to-funds have been determined using net assets valued one quarter in arrears plus current quarter cash flows. These funds are not eligible for redemption. Distributions are received as underlying investments within the funds are liquidated, which on average can occur over the span of the next 1 to 7 years.
- (3) For real estate and real estate commingled funds, investments generally valued using one or a contribution of the following accepted valuation approaches: market, cost or income. For four of the real estate funds, generally annual appraisals are performed by an independent third-party each year, minimum every three years. For five of the real estate funds, the inputs and assumptions utilized to estimate future cash flows are based upon the manger's evaluation of the economy, capital markets, market trends, operating results, and other factors, including judgments regarding occupancy rates, rental rates, inflation rates, and capitalization rates utilized to estimate the projected cash flows at disposition and discount rates. All portfolios have audited financials completed at fiscal year-end.

(4) <u>Property and equipment</u>

Property and equipment consisted of the following at December 31, 2020 and 2019:

	December 31,							
		2020	2019					
Cost								
Equipment	\$	42,675	\$	42,675				
Software		2,230,382		2,223,382				
Total cost		2,273,057		2,273,057				
Less: accumulated depreciation		(2,266,200)		(2,256,370)				
Net property and equipment	\$	6,857	\$	16,687				

Depreciation expense for the years ended December 31, 2020 and 19 was \$9,830 and \$11,020, respectively.

(5) <u>Funding policy</u>

The Missouri Revised Statutes Sections 169.350.4 and 169.291.16 specify that for 2014 and each subsequent year, the employee contribution rate and the employer contribution rate shall be the same percentage of compensation, each not less than 7.5% of compensation not more than 9% compensation. Within this permitted range, the rate may be changed (increased or decreased) in increments of 0.5% each year. The objective is that the combined employee and employer contribution will be the amount actuarially required to cover the normal cost and amortize the unfunded accrued actuarial liability over a period that does not exceed 30 years from the date of valuation. The rate for each calendar year shall be certified by the Board to the employers at least six months prior to the date such rate is to be effective. Effective January 1, 2018, the 2018 Missouri General Assembly passed a bill that increased the employer contribution rate (see Note 1).

(6) <u>Net pension liability</u>

The components of the net pension liability of participating entities at December 31, 2020 and 2019, were as follows:

		2020	2019				
Total pension liability Less: plan fiduciary net position Net pension liability	\$ \$	1,003,281,489 694,237,740 309,043,749	\$ \$	994,022,672 662,085,840 331,936,832			
Plan fiduciary net position as a percentage of total pension liability		69.20%		66.61%			

The net pension liability as of December 31, 2020 was determined based on an actuarial valuation prepared as of January 1, 2020, but using the new assumptions adopted by the Board in February 2021. Following the completion of an experience study covering the four-year period ending December 31, 2019, the Board adopted a revised set of actuarial assumptions to better project plan experience based on the results of the study. The actuarial accrued liability was rolled forward one year to December 31, 2020, using the following key actuarial assumptions:

Actuarial Assumptions:

Investment Rate of Return Projected Salary Increases Inflation

Mortality:

7.25%, including inflation 3.85% to 9.50%, including inflation 2.25%

Pre-retirement mortality rates were based on the Pub-2010 General Members (Below Median) Employee Mortality Table with a one-year age setback for males and a one-year age set-forward for females, projected 15 years from valuation date using Scale MP-2019. Post -retirement mortality rates were based on the Pub-2010 General Members (Below Median) Retiree Mortality Table with a one-year age setback for males and a one-year age set-forward for females, projected 7 years from valuation date using Scale MP -2019. Disabled mortality rates were based on the Pub-2010 Disabled Mortality Table.

(6) Net pension liability (continued)

Actuarial information - The Retirement System engages an independent actuarial firm to perform an annual actuarial valuation to estimate liabilities for future benefits expected to be paid by the Retirement System and to determine the actuarial contribution rates based on the Board's funding policy and evaluate the sufficiency of the current contribution rates. The total pension liability was determined by an actuarial valuation as of January 1, 2020, which was rolled forward to December 31, 2020. The actuarial assumptions used for the most recent valuations are as follows:

Valuation Date Actuarial Cost Method Amortization Method

Remaining Amortization Period Asset Valuation Method Actuarial Assumptions: Investment Rate of Return Projected Salary Increases Inflation

Mortality:

January 1, 2020 and 2019 Entry Age Normal Level Percent of Pay, Layered (2020), Closed Period (2019) 27 years (2020), 28 years (2019) 5-year Smoothed Market Value

7.50%, including inflation 5.00%, including inflation 2.75%

Pre-retirement mortality rates were based on RP-2014 Healthy Non-Annuitant Blue Collar Table with a one-year setback for females, projected 15 years from the valuation date using Scale MP-2016. Post-retirement mortality rates were based on RP-2014 Healthy Annuitant Blue Collar Table with a one-year setback for females, projected 7 years from the valuation date using Scale MP-2016. Disability mortality rates were based on RP-2014 Disabled Table for Males and Females.

The actuarial assumptions used in the January 1, 2020 and 2019 valuation were adopted by the Board from the results of an actuarial experience study covering the five-year period ended December 31, 2015 (dated October 3, 2016).

(6) Net pension liability (continued)

The long-term expected rate of return on pension plan investments is reviewed as part of the regular experience study prepared by the Retirement System. Several factors are considered in evaluating the long-term rate of return assumption, including long-term historical data, estimates inherent in current market data, and an analysis in which best-estimate ranges of expected future real rates of return (expected returns, net of investment expense and inflation), along with estimates of variability and correlations for each asset class, were developed by the Retirement System's investment consultant. These ranges are combined to produce the 20-year long-term expected rate of return by weighting the expected future real rates of return by the target asset allocation percentage and by adding expected inflation. Best estimates of arithmetic real rates of return for each major asset class included in the Retirement System's target asset allocation as of December 31, 2020 (see the discussion of the pension plan's investment policy) are summarized in the following table:

	20-Year Long- Expected Real	Rate
Asset Class	of Return	<u> </u>
US Large Cap Equity	6.2	%
US Mid Cap Equity	6.8	%
US Small Cap Equity	7.2	%
International Developed Equity	7.1	%
Emerging Market Equity	9.0	%
Core Fixed Income	1.2	%
Global Fixed Income	1.2	%
High Yield Bonds	3.7	%
Multi-Asset Class	4.7	%
Hedge Fund of Funds	3.3	%
Private Equity	10.4	%
Real Estate – Core	4.5	%
Real Estate – Value Add	7.0	%
Real Estate – Opportunistic	9.1	%

(6) <u>Net pension liability</u> (continued)

Discount Rate - The discount rate used to measure the total pension liability as of December 31, 2020 and 2019 was 7.25% and 7.75%, respectively. The projection of cash flows used to determine the discount rate assumed that contributions from the Plan members will be made at the current contribution rate and that contributions from employers will be made at contractually required rates, actuarially determined. Based on those assumptions, the Plan's fiduciary net position was projected to be available to make all projected future benefit payments of current Plan members. Therefore, the long-term expected rate of return on Plan investments was applied to all periods of projected benefit payments to determine the total pension liability.

Sensitivity of the Net Pension Liability to Changes in the Discount Rate - The following represents the net pension liability of participating entities as of December 31, 2020 and 2019, calculated using the discount rate assumption, as well as what the net pension liability would be if it were calculated using a discount rate that is one percentage point lower or one percentage point higher than the current assumption

	1% Decrease	Current Assumption	1% Increase
December 31, 2020	6.25%	7.25%	8.25%
	\$ 407,607,785	\$ 309,043,749	\$ 225,504,370
December 31, 2019	6.75% \$ 429,115,345	7.75% \$ 331,936,832	8.75% \$ 249,567,057

(7) **Operating lease**

Years Ending December 31,

The Retirement System entered into an office lease agreement commencing on April of 2016 and expiring on February 2026. Minimum rent payments under non-cancellable operating leases which extend for periods greater than one year are as follows:

, ,		
2021		73,518
2022		77,801
2023		77,825
2024		79,337
2025		79,639
Total	\$	388,120

During 2020 and 2019, the Retirement System recognized rent expense associated with the lease as follows:

	2020	2019
Operating lease cost: Annual rent expense	\$ 65,808	\$ 63,995
Common area maintenance fees	+,	+
and other ancillary charges	13,773	9,041
	\$ 79,581	\$ 73,036

(8) Tax status

The Retirement System is exempt from federal income tax under Section 501 of the Internal Revenue Code.

(9) <u>Risks and uncertainties</u>

The Plan invests in various investment securities. Investment securities are exposed to various risks such as interest rate, market, and credit risk. Due to the level of risk associated with certain investment securities, it is at least reasonably possible that changes in the values of investment securities will occur in the near term and that such changes could materially affect the amounts reported in the statements of plan net assets.

Plan contributions are made and the actuarial present value of accumulated plan benefits are reported based on certain assumptions pertaining to interest rates, inflation rates and employee demographics, all of which are subject to change. Due to uncertainties inherent in the estimation and assumption process, it is at least reasonably possible that changes in these estimates and assumptions in the near term would be material to the financial statements.

Changes in the discount rate and investment returns can have a significant effect on the funded status of the Plan. Management continues to monitor these changes and the potential impact on the future pension plan funding requirements and related expenses.

The world is still recovering from the COVID—19 pandemic and the Plan's investment portfolio incurred great volatility during 2020. However, the Plan ended the year with a strong positive investment return and did not experience any delays in contribution payments from employers. While the full impact of the pandemic continues to evolve management does not believe there is sufficient data yet to warrant modifications to investment strategy at this time.

(10) <u>Subsequent events</u>

The Retirement System has evaluated subsequent events through June 7, 2021, which is the date the financial statements were available to be issued and noted the following item for disclosure.

As a result of a comprehensive experience study performed for the Retirement System, the Board adopted a new set of actuarial assumptions for the January 1, 2021 valuation at their February 1, 2021 meeting. The assumption changes are outlined below:

- The investment return assumption was lowered from 7.50% to 7.25%.
- The inflation assumption was lowered from 2.75% to 2.25%.
- The assumed interest rate credited on employee account balances was lowered from 3.25% to 2.50%.
- The general wage increase assumption was lowered from 3.50% to 2.85%
- The payroll growth assumption was lowered from 3.00% to 2.85%.
- An explicit administrative expense load assumption based no actual prior year expenses is included in the Actuarially Determined Contributions.
- The mortality assumption was changed to the Pub-2010 General Members (Below Median) Mortality Tables, with a one-year age setback for males and a one-year age set-forward for females. Mortality improvements are projected 7 years from the valuation date for retirees and beneficiaries and 15 years for actives, using Scale MP-2019.
- Retirement rates were modified to partially reflect observed experience.
- Termination rates were changed to partially reflect observed experience.
- The salary scale was changed from 5.00% to all ages to service-based rates.
- The disability assumption was eliminated.

In May 2021, Jim Roehner was hired as the Executive Director to replace Christine Gierer who retired effective June 2021. The Retirement System and Mr. Roehner entered into an at-will agreement with an annual review.

(\$ in thousands) 2020 2019 2018 2017 2016 2015 2014 **Total Pension Liability** Service Cost \$ 18,724 \$ 18,024 \$ 16,983 \$ 18,683 \$ 17,413 \$ 16,690 \$ 15,418 Interest 73,812 72,760 73,517 68,868 68,599 67,219 66,956 Benefit term changes (64) Differences between expected and 944 (258) (11,652) 4,918 (2,897) 12,010 actual experience Assumption Changes 570 (14,307) 18,004 77,882 1,268 1,224 Benefit Payments, including member (84,791) (85, 166)(83,419) (81,763) (80,169) (79,634) (78,536) refunds Net change in total pension liability 9,259 (8,947) 13,433 88,588 4,150 17,509 3,838 Total pension liability - beginning 994.022 1,002,969 989,536 900,948 896,798 879,289 875,451 Total pension liability - ending 1,003,281 \$ 994,022 \$ 1,002,969 \$ 989,536 \$ 900,948 896,798 879,289 \$ \$ **Plan Fiduciary Net Position** Contributions Employer \$ 25,772 \$ 21,489 \$ 17,528 \$ 16,927 \$ 16,280 \$ 14,499 \$ 13,288 Employee 19,531 18,524 17,619 16,964 16,528 14,646 13,358 Net investment income (loss) 73,264 106,034 44,338 (10,025) 25,937 (33,251) 103,768 Benefit Payments, including member (84,791) (81,763) (85,167) (83,419) (80,169) (79,634) (78,536) refunds Administrative expenses (1,615) (1,546) (1,500) (1,521) (1,552) (1,648) (1,548) Other (10) (11)(17) (16) (92) (251)(529) Net change in plan fiduciary net position 32,151 59,323 (83,040) 54,359 (4,667) (62,413) (28,030) Plan fiduciary net position - beginning 662,085 602,762 685,802 631.443 636,110 698,523 726,553 Plan fiduciary net position - ending 624,236 662,085 602,762 685,802 631,443 636,110 698,523 Plan pension liability - ending 303,734 269,505 309,045 400,207 260,688 180,766 Ś \$ 331,937 \$ \$ \$ \$ \$ Plan fiduciary net position as a percentage of the 69.20% 66.61% 60.10% 69.31% 70.09% 70.93% 79.44% total pension liability Covered payroll Ś 214,765 Ś 204,656 Ś 194,754 \$ 188,073 Ś 180,893 Ś 170,580 Ś 166,102 Employers' Net Pension Liability as a 143.90% 205.49% 161.50% 148.99% 108.83% 162.19% 152.82% percentage of covered payroll

Schedules of Changes in Net Pension Liability

Note to Schedule:

This schedule is intended to show 10-year trend. Additional years will be reported as they become available.

Schedules of Net Pension Liability (\$ in thousands)

Year Ended	Total Pension Liability (TPL) (a)	Plan Fiduciary Net Position (b)	Net Pension Liability (NPL) (a-b)	Plan Fiduciary Net Position as a % of TPL (b/a)	Covered Employee Payroll (c)	Employer's NPL as a % of Covered Payroll ((b-a)/c)
12/31/2020	\$ 1,003,281	\$ 694,236	\$ 309,045	69.20%	\$ 214,765	143.90%
12/31/2019	\$ 994,022	\$ 662,085	\$ 331,937	66.61%	\$ 204,656	162.19%
12/31/2018	\$ 1,002,969	\$ 602,762	\$ 400,207	60.10%	\$ 194,754	205.49%
12/31/2017	\$ 989,536	\$ 685,802	\$ 303,734	69.31%	\$ 188,073	161.50%
12/31/2016	\$ 900,948	\$ 631,443	\$ 269,505	70.09%	\$ 180,893	148.99%
12/31/2015	\$ 896,798	\$ 636,110	\$ 260,688	70.93%	\$ 170,580	152.82%
12/31/2014	\$ 879,289	\$ 698,523	\$ 180,766	79.44%	\$ 166,102	108.83%

		Sc	he	dules c	mploy in thou		rib	utions				
	2020	2019		2018	2017	2016		2015	2014	2013	2012	2011
Actuarially determined employer contribution	\$ 25,342	\$ 21,144	\$	19,125	18,074	\$ 20,224	\$	18,886	\$ 19,401	\$ 20,995	\$ 16,373	\$ 11,398
Annual employer contributions	25,772	21,489		17,528	16,927	16,280		14,499	13,288	12,094	11,370	11,973
Annual contribution deficiency (excess)	\$ (430)	\$ 655	\$	1,597	\$ 1,147	\$ 3,944	\$	4,387	\$ 6,113	\$ 8,901	\$ 5,003	\$ (575)
Covered-employee payroll*	\$ 214,765	\$ 204,656	\$	194,754	\$ 188,073	\$ 180,893	\$	170,492	\$ 166,102	\$ 161,253	\$ 151,603	\$ 159,637
Actual contributions as a percentage of covered-employee payroll	12.00%	10.50%		9.00%	9.00%	9.00%		8.50%	8.00%	7.50%	7.50%	7.50%

*Covered-employee payroll based upon the pensionable payroll reported to the Retirement System and excludes additional compensation amounts that may need to be reported by the employer.

		S	chedules	of Invest	ment Ret	turns				
	2020	2019	2018	2017	2016	2015	2014	2013	2012	2011
Annual time-weighted rate of return, net of investment expense	11.90%	18.22%	(5.40%)	17.29%	8.07%	(1.45%)	3.64%	12.43%	12.96%	064%

Notes to Required Supplementary Information For the Year Ended December 31, 2020

Changes of benefit terms. The following change to the plan provisions was reflected in the valuation performed as of January 1, 2020:

The 2018 Missouri General Assembly passed a bill that changed the Retirement System's contribution policy beginning January 1, 2019 with respect to employers covered by the Retirement System. In accordance with the new legislation, the employer contribution rate will increase to 10.50% of pay effective January 1, 2019 and 12.00% of pay effective January 1, 2020. Beginning July 1, 2021, the employer contribution rate will be the greater of (1) the actuarial required contribution rate, as determined in the valuation prepared for the prior calendar year, less the member contribution rate, or (2) 12.00% of pay, until the Retirement System is fully funded. Once the Retirement System is fully funded, the employer contribution rate may increase or decrease in subsequent years, depending on the valuation results and the employee contribution rate may decrease from 9.00% depending on valuation results. However, such changes are subject to statutory limitations.

Changes of assumptions. In 2020, the non-disabled mortality tables were updated to reflect an additional year of mortality improvements and the investment return assumption was lowered from 7.75% to 7.50%.

Method and assumptions used in calculations of actuarially determined contributions. The Retirement System is funded with fixed contribution rates for members and employers. The actuarially determined contributions in the Schedule of Employer Contributions are calculated as of the beginning of the fiscal year in which contributions are reported. The following actuarial methods and assumptions were used to determine the employer Actuarially Determined Contribution reported in the most recent actuarial valuation as reported in the January 1, 2020 actuarial valuation:

Actuarial Cost Method	Entry Age Normal
Amortization Method	Level Percent of Pay, Closed Period
Remaining Amortization Period	Legacy base: 30 Years beginning January 1, 2017, Experience bases: 20 years
Asset Valuation Method	5-year Smoothed Market Value
Investment Rate of Return	7.50%, including inflation
Projected Salary Increases	5.00%, including inflation
Inflation	2.75%

Schedule of Expenses For the Period Ending December 31, 2020 and 2019

Investment Expenses	2020	2019
Bank custodial fees and expenses	\$ 96,402	\$ 85,136
Financial consultation	205,000	205,000
Financial management expenses	5,833,893	6,204,819
Total	6,135,294	6,494,954
Administrative Expenses		
Salaries and payroll taxes	642,893	605,103
Fringe Benefits	134,701	124,278
Legal fees	26,460	21,807
Audit fees	43,789	44,001
Actuarial fees	67,200	41,911
Legislative consultation	45,000	45,000
Other professional services	40,967	11,353
Board meetings	200	317
Board election	9,931	8,484
Travel and education expense	13,024	58,060
Membership dues	6,540	5,025
Printing and office expense	31,195	40,982
Postage and equipment	11,182	12,297
Payroll processing	2,698	2,483
Bank fees	21,919	21,135
Computer software support	325,500	325,500
Computer expense	43,056	47,218
Insurance	69,066	58,391
Lease space rental	79,581	73,036
Total	\$ 1,614,904	\$ 1,546,380



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May 18, 2021

Board of Trustees Kansas City Public School Retirement System 3100 Broadway, Suite 1211 Kansas City, MO 64111

Dear Trustees:

The 2020 year marked something new for all Systems with the introduction of COVID-19 as a daily topic of conversation and remote meetings as the norm. We were able to meet in person in January, February and March but by the April meeting we were 100% remote. This did not stop any of us from continuing to monitor and optimize the KCPSRS portfolio. This also did not stop the financial markets from continuing to perform and deliver a roller coaster of returns from the large drop of returns in March to the strong recovery in the September and December quarters of 2020.

While the economic recovery slowed slightly in the fourth quarter of 2020 due to renewed virus intensity, financial markets continued to perform extremely well on positive development of the FDA approval of the Pfizer and Moderna Covid-19 vaccines, along with election results, expectations of additional fiscal stimulus, and continued extraordinarily easy monetary policy from the Fed. World equity markets ended the 2020-year solidly positive with U.S equities and emerging markets having an amazing year with returns in excess of 21% and 18%, respectively. All asset classes, with the exception of commodities, were positive in 2020. Within U.S Equities, the S&P 500 Index returned 18.4% for the year, and seven of the ten sectors in the S&P 500 Index had posted double-digit positive returns. IT and Consumer Discretionary were the top performers for the year, returning 44% and 33%, respectively. Growth stocks trounced value stocks across the market caps for the year. Large cap and small cap returns were similar for the year, 21% for large cap vs. 20% for small cap.

Overseas, Japan and the EU also posted strong returns for the year, as their respective markets reacted positively to the announcement of several COVID-19 vaccine approvals. The International Developed Markets increased 7.8%, as represented by the MSCI EAFE Index. Emerging Market Equities performed even better, as the MSCI EM Index gained 18.3%. Asia was the top performing region in the developed world for the full year, up 28.4%.

Yields rose over the tail end of the curve, while shorter-maturity yields were relatively unchanged. The Barclays Aggregate Bond Index returned 7.5% for the year. A risk-on environment helped push Investment Grade Corporate Debt up 9.9%, and was the strongest sector within the U.S. Fixed Income markets for the year. U.S. Corporate High Yield was also strong, gaining 7.1%. Non-U.S. fixed income gained 10.8% in 2020, as a weak USD helped boost unhedged non-US debt.

With the more V-shaped recovery, private investment opportunities appear to have also stabilized, or even recovered, fairly rapidly. Hedge funds rose in 2020 and equity hedge strategies were the top performers. Although less positive than equity markets, hedge fund of funds also produced gains in 2020 returning 10.3% (as measured by HFRI FOF Composite) for the year. The potential for heightened volatility creates an environment where nimble long/short managers can add value.

Both private equity and real estate markets posted positive results for 2020. Private equity posted positive returns of over 5.1% (Thomas Reuters Private Equity as of 1st Qtr. due to later quarters not being available) with real estate posting 1.2% (NFI-ODCE index) for 2020. Private equity should benefit from low-for-longer interest rates with cost

May 18, 2021 Board of Trustees KCPSRS Page 2

of capital quite minimal for the foreseeable future. Distributions are expected to remain positive given improving conditions and exit values.

KCPSRS was valued at \$694.8 million as of December 31, 2020. The total portfolio (Fund) asset allocation was developed to provide a diversified, optimal portfolio to achieve the System's long-term investment and risk objectives. The asset allocation includes investments in U.S. equities, international equities, fixed income, international fixed income, real estate, hedge fund of funds, MACS (multi-asset class strategies), and private equity. As of the end of December, the Fund's trailing 1-year net return was 11.9%. The 2020 returns were helped significantly by investments in U.S. Equity and Emerging Markets equity which provided returns of over 19%. The trailing 3-year net return, for the period ending December 31, 2020, modestly trailed its benchmark returning 7.8% vs. the 8.6% for the policy index. The trailing 5-year gross return, for period ending December 31, 2020, slightly underperformed its benchmark returning 9.7% vs. the 9.9% for the policy index.

KCPSRS' investment program continues to change and evolve. During 2020, Segal Marco Advisors, working with the KCPSRS Board, completed a RE manager search towards further implementation and optimization of their asset allocation mix. Segal Marco also completed an updated asset allocation review for KCPSRS in 2020 along with a Private Markets cash flow review and a Pacing Study. We also provide education to the Board on asset allocation and active vs. passive investing at the beginning of the year.

Segal Marco Advisors, working closely with the KCPSRS Board conducted a Value-Add / Opportunistic Real Estate search in February of 2020. Segal Marco provided finalists, representing top talent in the real estate area, to the KCPSRS Board. The Board interviewed the real estate candidates for the search and hired two new investment managers. The Board, with recommendation from Segal, terminated a manager that was underperforming in the MAC space and those assets were allocated to the other two existing MAC managers. One of the two new Real Estate investments was funded in 2020. Waiting for capital to be called for the second new Real Estate investment.

Over the years, KCPSRS has revised its asset allocation mix, added asset classes and made investment manager changes to continue to optimize the Fund's risk return profile. This forward-looking approach has allowed the Fund to evolve over time with the markets and achieve strong performance. Looking forward to 2021, Segal Marco will continue to support KCPSRS to achieve both long-term and short-term objectives through implementation of the asset allocation mix, providing investment educational sessions, investment policy development, manager monitoring, and new manager selection and on-boarding.

Segal Marco Advisors wants to take this time to commend the trustees and staff at KCPSRS for the ingenuity and adaptation they underwent in such a short period in 2020. It was amazing to see this much transformation in such short order. The Retirement System has been successful this year, through diligence and perseverance resulting in strong returns, which has in turn provided a more secure outlook for the System. This System is the exclusive support to many retirees and their families along with being a wonderful benefit to offer new teachers, school and library staff. We are proud to be a part of this System and its many achievements over the years. We look forward to continuing to serve KCPSRS as an extension of your staff and to aid your many members for years to come.

Sincerely yours,

Rosemary E. Guillette Vice President

🔆 Segal Marco Advisors

Investment Policy Summary

Pursuant to investment fiduciary duties provided in Revised Missouri Statutes section 105.688, the KCPSRS Board of Trustees (Board) established the system's investment program, with overall objectives, asset allocation, and operating guidelines. The purpose of the System is to provide retirement and certain other benefits to participants and their beneficiaries. With respect to this purpose, the board develops a long-term plan to preserve the long-term corpus of the Fund and to maximize the rate of return within prudent risk parameters to meet, when combined with employee and employer contributions, will meet or exceed the benefit and administration funding requirements of the plan over time. The investment horizon of the Fund is long-term.

To achieve a balanced program, every five years, the Board conducts a review of its investment strategy and plan liability structure to evaluate the potential consequences of alternative investment strategies on the long-term financial wellbeing of the system. The investment policy shall consider the current and expected financial condition of the system, the expected long-term capital market outlook, and the system's risk tolerance. The policy shall consider the potential impact on pension costs of alternative asset allocation policies, the existing and projected liability structure of the pension plan, and other issues affecting governance of the system. An asset allocation review will be conducted annually with the investment policy reviewed and updated, if necessary, at least every two years.

Investment Objectives

The total fund objective is to generate a rate of return equaling or exceeding, over rolling 3- and 5-year periods the following performance objectives:

- A required rate of return, net of expenses, equaling the real rate objective of 4.75% (actuarial assumed rate 7.50%* less actuarial assumed inflation 2.75%) plus current inflation, as measured by the Consumer Price Index, to ensure that real asset growth maintains pace with real pay growth and cost of living adjustments, primary determinants of benefits and, therefore, pension costs.
- The system's actuarial investment rate of return assumption of 7.50%* to avoid an actuarial loss which would increase future years' contributions.
- A policy index that measures the value added through active management calculated by weighting the appropriate capital market indices per the established asset allocation.

*In February 2021, the Board approved the actuary's recommendation from the Experience Study for Four Years ended December 31, 2019 to change the actuarial assumed rate for investment for the 1/1/2021 valuation to 7.25%.

Roles and Responsibilities

Board of Trustees

The Board bears the ultimate fiduciary responsibility for the investment of the system assets. Members of the Board must adhere to state law and prudent standards of diligence with respect to their duties as investment fiduciaries. In so doing, the members of the Board and its advisors, as investment fiduciaries, shall discharge their duties in the sole interest of the plan participants and their beneficiaries and shall act with the same care, skill, prudence, and diligence that a prudent person acting in a similar capacity and familiar with these matters would use in the conduct of a similar enterprise with similar aims. To accomplish this, the Board utilizes staff, as well as investment and actuarial consultants to provide expert assistance.

Investment Asset Consultant

The investment consultant is hired by and serves at the pleasure of the Board. The investment consultant shall assist the board in the development, implementation, and monitoring of investment

policy on behalf of the System. Specifically, the investment consultant shall be responsible for the following functions:

- Development and periodic revision, as needed at least annually, of investment guidelines and objectives. This undertaking shall be conducted in conjunction with the Board, internal staff and other professional advisors as appropriate.
- Review and identification of qualified investment manager candidates based on the consultant's asset allocation studies and professional judgment.
- Investment performance monitoring.
- Efficiency reviews, including, but not limited to, assessment of the System's custodian relationship(s) and related functions, such as securities lending, commission recapture programs and other related matters.
- Special studies and projects as may periodically be determined by the board to be appropriate for the governance of the investment activities of the System.
- Education of Board members and staff in areas of investment strategy as needed to assist them in governance of the System's portfolio.

Executive Director

The executive director is appointed by and serves at the pleasure of the Board. Under the authority delegated by the Board, the executive director is responsible for the administration and management of the System consistent with policies set by the Board. Specific to the investment program, the executive director is responsible for implementing the Board's investment policies and management of the relationship with outside advisors and investment managers.

Investment Managers

In the implementation of the investment program, the Board hires and utilizes investment managers who have demonstrated expertise with specific asset classes and investment styles. Each manager shall operate under a set of guidelines specific to the strategic role its portfolio is to fulfill in the overall investment structure. The investment managers are monitored and judged per benchmarks which reflect the objectives and characteristics of the strategic role their portfolio is to fulfill.

Asset Allocation

The primary means by which capital preservation is to be achieved is through diversification of the Fund's investments across various asset classes. Determining the system's asset allocation is regarded as one of the most important decisions of the investment program. The Board with advice from the external investment consultant, develops an asset allocation with appropriate benchmarks that is designed to achieve the long-term required return objectives of the system, given risk constraints and liquidity needs.

Asset Class	Policy Benchmark	Target Allocation %	Allocation Range %
Domestic:		22.5	
Large Cap Core	S&P 500	10.5	8.0 - 13.0
Mid Cap Core	S&P 400	6.0	4.0 - 8.0
Small Cap Growth & Value	Russell 2000	6.0	4.0 - 8.0
International Developed	MSCI (EAFE)	12.0	7.0 – 17.0
Emerging Mkts	MSCI EM	10.0	5.0 - 15.0
Public Equity Total	Blended Equity Policy	44.5%	
Domestic Core	Barclays Cap Agg	10.0	5.0 - 15.0
High Yield	Barclays Cap HY	2.5	1.5 – 3.5
International/ EMD	FTSE World Govt	5.0	2.0 - 8.0
Fixed Income Total	Blended Fixed Income Policy	17.5%	
Alternatives (Low Volatility):		18.5	
Multi-Asset Class Strategies	60% MSCI World	13.5	8.5 – 18.5
	40% WGBI Index		
Hedge Fund of Funds	91 Day T-Bill + 5%	5.0	2.0 - 8.0
Private Equity (Alpha)	S&P 500	7.5	5.5 – 9.5
Real Estate:		12.0	7.0 – 17.0
Core Real Estate	NCREIF ODCE Equal weighted	4.0	2.0 - 6.0
Value Add	NCREIF NPI	4.0	2.0 - 6.0
Opportunistic	NCREIF NPI	4.0	2.0 - 6.0
Alternatives Total	Blended Alternatives Policy	38.0%	

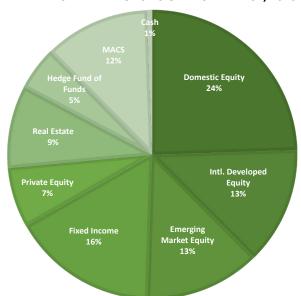
During 2020 the asset allocation policy and permissible ranges for each asset class, were as follows:

Total Fund Review

As of December 31, 2020, the KCPSRS investment portfolio had a fair value of \$694.8 million. KCPSRS' investments generated a time-weighted return of 11.9%, net of fees, for the fiscal year ended December 31, 2020.

Diversification

Asset allocation is a process designed to construct an optimal long-term asset mix that achieves specific investment objectives. The Investment Policy reflects the System's asset allocation policy as designed to meet the investment objectives. The chart below illustrates the actual allocation to each asset class, as of December 31, 2020.



SUMMARY OF INVESTMENTS BY MAJOR ASSET CLASS FAIR VALUE IN MILLIONS AS OF DECEMBER 31, 2020

Investment Performance vs. Benchmarks

Another board investment objective is to generate a net rate of investment return equaling or exceeding a policy benchmark that measures the value added through active management. The total fund return, net of investment fees, underperformed the 1-year policy benchmark by 1.7%. Returns for the total fund versus the policy benchmark, composed of market indexes with weightings reflective of KCPSRS' asset allocation targets are displayed on the bar chart.



TOTAL FUND RETURN (NET) VS. BENCHMARK RETURN

Investment Performance by Asset Class vs. Policy Benchmarks

Investment returns (net of investment fees) for each major asset class in the KCPSRS total fund portfolio are compared to the asset class policy benchmark returns for the 1-, 3-, and 5-year periods ended December 31, 2020. Returns for the major asset classes and the respective benchmark can be found in the table to the right/below/to the left.

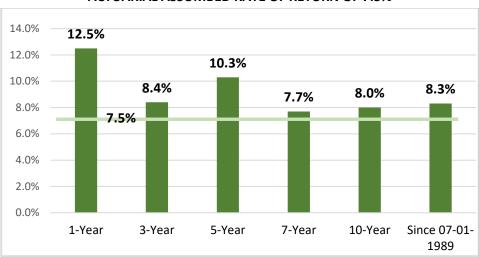
Asset Class	Annuali	ized Returr	ns* (%)
	1-Year	3-Year	5-Year
Total Fund	11.9	7.8	9.7
Policy Benchmark**	13.6	8.6	9.9
Domestic Equity	18.3	12.1	13.8
Blended Domestic Equity policy***	17.8	11.6	13.7
Intl Developed Equity	11.0	6.0	8.1
MSCI EAFE (net)	7.8	4.3	7.4
Emerging Market Equity	18.5	8.1	14.0
MSCI EM (net)	18.3	6.2	12.8
Fixed Income	8.9	5.2	5.3
Blended Fixed Income Policy****	8.3	5.4	5.2
Hedge Fund of Funds	12.9	7.0	6.0
90 Day T-Bill + 5 %	5.7	6.7	6.2
-			
Multi-Asset Class Strategies	8.4	5.8	8.7
60% MSCI World & 40% WGBI	14.7	9.1	9.8
Private Equity	11.9	9.8	10.2
S&P 500	18.4	14.2	15.2
			_
Real Estate	1.6	7.1	10.8
Blended Real Estate policy*****	1.6	5.1	6.2

ASSET CLASS INVESTMENT PERFORMANCE (NET) vs. POLICY BENCHMARKS

2020

Investment Performance vs. Actuarial Assumed Rate of Return

A long term objective of the KCPSRS investment program is to exceed the actuarial assumed investment rate of return. Given the randomness of the investment markets, the total portfolio should not be expected to meet the actuarial assumed rate of return every year. A review of the 1-, 3-, 5-, 7-, 10-year and since July 1, 1989 periods show the gross investment return has exceeded 7.5% in each of those periods.



TOTAL FUND RETURN (GROSS) RELATIVE TO LONG-TERM ACTUARIAL ASSUMBED RATE OF RETURN OF 7.5%

Largest Assets Held

As of December 31, 2020

Public Equity Portfolio: Top Ten Holdings

The top ten holdings within the public equity portfolio (domestic and international combined) listed below does not include the fair value of units held in commingled fund investments. A complete listing of the holdings, including commingled fund holdings, is available upon request.

Fair Value
\$ 9,309,955
5,611,522
4,992,368
4,555,552
4,009,023
3,644,442
3,553,331
3,252,603
3,188,887
2,733,331
\$

Fixed-Income Portfolio: Top Ten Holdings

The top ten holdings within the consolidated fixed-income portfolio (core-plus and credit opportunities combined) listed below does not include the fair value of units held in commingled fund investments. A complete listing of the holdings, including commingled fund holdings, is available upon request.

Ten Largest Fixed Income Holdings	Fair Value
U S TREASURY NOTE 2.125% Due 2021	\$ 2,600,796
U S TREASURY NOTE .1250% Due 2023	1,893,674
U S TREASURY BOND 1.250% Due 2050	1,469,648
U S TREASURY BOND 1.125% Due 2040	1,188,134
U S TREASURY BOND 2.750% Due 2047	928,641
FHLMC POOL #RA-2895 2.500% Due 2050	906,967
U S TREASURY NOTE 2.000% Due 2022	890,805
FHLMC POOL #QA-0127 3.500% Due 2049	813,365
FNMA POOL #0MA4119 2.000% Due 2050	744,171
FNMA POOL #QB-3716 2.000% Due 2050	743,388

Investment Summary

For the year ending December 31, 2020

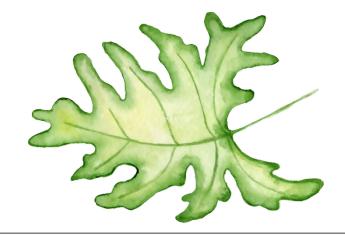
Investment Manager	Date Hired	Investment Class	Portfolio Fair Value as of 12/31/2020	% of Total
RhumbLine Advisors	December 2007	Large Cap Core Equities	\$ 75,641,938	10.9%
RhumbLine Advisors	June 2003	Mid Cap Core Equities	46,723,876	6.8%
RhumbLine Advisors	July 2019	Small Cap Value Equities	20,992,865	3.0%
Westfield Capital Management	July 2016	Small Cap Growth Equities	27,201,152	3.9%
Fisher Investments	August 2002	International Developed Equities	91,111,046	13.2%
Earnest Partners, LLC	June 2002	International Emerging Market Equities	41,573,922	6.0%
Wells Capital Management	August 2012	International Emerging Market Equities	48,157,754	7.0%
Pugh Capital Management	March 2014	Core Fixed Income	63,743,515	9.2%
Loomis Sayles	October 2011	High Yield Bonds	14,691,378	2.1%
Brandywine Global	June 2015	International Fixed Income	34,550,614	5.0%
BlackRock	January 1994	Core Real Estate	9,384,877	1.4%
JP Morgan Asset Management	February 2007	Real Estate	13,044,324	1.9%
Brookfield Property Group	May 2012	Real Estate	12,614,537	1.8%
Mesirow Financial Value Fund II	January 2014	Real Estate	4,995,109	0.7%
Mesirow Financial Value Fund III	March 2018	Real Estate	7,157,835	1.0%
Westport Capital Partners, LLC	May 2013	Real Estate	4,173,627	0.6%
Westport Capital Partners, LLC Fund II	June 2018	Real Estate	5,570,214	0.8%
Ares US Real Estate Fund IX	July 2018	Real Estate	3,868,739	0.6%
The Green Cities Company IV	July 2020	Real Estate	2,194,578	0.3%
Rock Creek	August 2008	Long/Short Equity	15,575,643	2.3%
Corbin Investor Services	December 2011	Hedge Fund of Funds	17,060,293	2.5%
AQR Capital Management	December 2012	Multi Asset Class Strategy	563,859	0.1%
Wellington Management	April 2018	Multi Asset Class Strategy	43,076,066	6.2%
Schroder Investment Management	April 2019	Multi Asset Class Strategy	39,179,291	5.7%
StepStone Group	May 2006	Private Equity	43,645	0.0%
Pantheon VI	July 2004	Private Equity	1,197,792	0.2%
Pantheon IX	March 2011	Private Equity	7,695,037	1.1%
NB Crossroads Fund XXII	April 2018	Private Equity	17,312,651	2.5%
Landmark Equity Partners XVI	December 2018	Private Equity	11,623,810	1.7%
HarbourVest Partners IX	October 2019	Private Equity	6,337,722	0.9%
Cash			4,086,784	0.6%
		Total	\$ 691,144,493	100%

Investment Fees

For the year ending December 31, 2020

Investment Managers	Ir	ivestment Fee	Pe	Performance Fee		Administrative Fee		Total
RhumbLine Advisors	\$	62,216	\$		\$		\$	62,216
Westfield Capital Management		218,299						218,299
Fisher Investments		486,694						486,694
Earnest Partners, LLC		322,795						322,795
Wells Capital Management		343,402						343,402
Pugh Capital Management		157,668						157,668
Loomis Sayles		68,555						68,555
Brandywine Global		140,928						140,928
BlackRock		102,951						102,951
JP Morgan Asset Management		219,194						219,194
Brookfield Property Group		139,247		(33,561)		76,103		181,789
Mesirow Financial		143,581		83,246		10,000		236,827
Westport Capital Partners, LLC		169,092		74,814		22,642		266,548
Ares Management, LLC		59,066				10,656		69,722
The Green Cities Company		2082,022				2,739		284,761
Rock Creek		119,739		131,535		41,171		292,445
Corbin Investor Services		169,809		115,577				285,386
AQR Capital Management		97,681						97,681
Wellington Management		192,942						192,942
Schroder Investment Management		165,447						165,447
StepStone Group		297				9,085		9,382
Pantheon		102,758		379,402		16,390		498,550
NB Alternatives Advisors		93,500		184,578		51,025		329,103
Landmark Partners		275,000		151,362		132,134		558,496
HarbourVest Partners, LLC		106,875				140,346		247,221
Total	\$	4,239,758	\$	1,086,953	\$	512,291	\$	5,839,003

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June 7, 2021

Board of Trustees Public School Retirement System of the School District of Kansas City, Missouri 3100 Broadway, Suite 1211 Kansas City, MO 64111

Dear Members of the Board:

The basic financial objective of the Public School Retirement System of the School District of Kansas City, Missouri is to establish and receive contributions which:

- when expressed in terms of percentages of active member payroll will remain approximately level from generation to generation, and
- when combined with present assets and future investment return will be sufficient to meet the financial obligations of the Public School Retirement System of the School District of Kansas City, Missouri to present and future retirees and beneficiaries.

The financial objective is addressed by actuarial funding valuations that are prepared annually as of January 1. The valuation process develops contribution rates that are sufficient to fund the plan's current cost (i.e. the costs assigned by the valuation method to the year of service about to be rendered), as well as to fund the unfunded actuarial accrued liability, as a level percent of active member payroll. The unfunded actuarial accrued liability as of January 1, 2017 is amortized over a closed 30-year period and subsequent changes to the UAAL are amortized over closed 20-year periods. The most recent valuation was completed based upon member data, asset data, and plan provisions as of January 1, 2021.

The plan administrative staff provides the actuary with data for the annual actuarial valuation. The actuary relies on the data after reviewing it for reasonableness and year to year consistency. The actuary summarizes and tabulates the member data in order to analyze longer term trends. The plan's external auditor also audits the actuarial membership data annually.

3802 Raynor Parkway, Suite 202, Bellevue, NE 68123 Phone (402) 905-4461 * Fax (402) 905-4464 www/CavMacConsulting.com Offices in Chicago, IL * Kennesaw, GA * Bellevue, NE Board of Trustees June 7, 2021 Page 2



For funding valuation purposes, an asset smoothing method is used to develop the actuarial value of assets. Under the smoothing method, the difference between the actual return on the fair (market) value of assets and the expected return, based on the investment return assumption, is recognized equally over five years.

Actuarial valuations for funding the System are based upon assumptions regarding future activity in specific risk areas including the rates of investment return, individual salary increases and payroll growth, eligibility for the various classes of benefits, and longevity among retired lives. These assumptions are adopted by the Board, after considering the advice of the actuary and other professionals. In our opinion, the assumptions and the methods comply with the requirements of applicable Actuarial Standards of Practice. Each actuarial valuation takes into account all prior differences between actual and assumed experience in each risk area and adjusts the actuarial contribution rates as needed. The January 1, 2021 actuarial valuation reflects a new set of actuarial assumptions and methods which were based on the findings in the experience study covering the four year period from January 1, 2016 to December 31, 2019, as adopted by the Board at their February 1, 2021 meeting. The most significant changes were lowering the investment return assumption to 7.25%, updating the mortality assumption to the Pub-2010 Mortality Table Below Median General Employees Table with certain age adjustments and including an explicit component for administrative expenses in the actuarial contribution rate.

The unfunded actuarial accrued liability (UAAL) decreased from the last valuation by \$40.4 million. There was an actuarial gain of \$10.4 million on assets and an actuarial gain of \$6.7 million on liability experience. The largest source of gain on the liability experience was from actual mortality and salary experience that was different than expected, based on the actuarial assumptions. In addition to the experience gains, the change to the actuarial assumptions decreased the UAAL by \$23.9 million and decreased the actuarial contribution rate by 0.49%.

Legislation passed in 2013 modified the set of plan provisions applicable for members hired after December 31, 2013, referred to as Plan C. The key differences between Plan B and Plan C are a lower benefit multiplier (1.75% instead of 2.00%) and more stringent requirements for unreduced benefits (age 62 or Rule of 80 rather than age 60 or Rule of 75). As of January 1, 2021, there are 2,752 active Plan C members in the System out of a total of 4,108, about 67%.

The System is 66% funded as of January 1, 2021, based on the actuarial value of assets. The increase from last year's funded ratio of 63% is largely due to favorable experience during calendar year 2020 and the impact of the new set of actuarial assumptions. The new benefit structure's impact on the System's funding will evolve gradually over time as current active members (covered by Plan B) leave covered employment and are replaced with new members who are covered by Plan C.

Cavanaugh Macdonald also prepared actuarial computations as of December 31, 2020 for purposes of fulfilling financial accounting requirements for the System under Governmental Accounting Standards Board (GASB) Statement No. 67. The results are presented in a separate report dated March 29, 2021. The changes to the actuarial assumptions, adopted by the Board of Trustees at their February 1, 2021 meeting, are reflected in the December 31, 2020 GASB 67 report. In addition, the entry age normal actuarial cost method, which is required to be used under GASB 67, is also used in the funding valuation report. The actuarial assumptions and methods used in both the funding and the GASB 67 valuation meet the parameters set by the applicable Actuarial Standards of Practice (ASOPs), as issued by the Actuarial Standards Board, and generally accepted accounting principles (GAAP) applicable in the United States of America as promulgated by the Governmental Accounting Standards Board.

Board of Trustees June 7, 2021 Page 3



The actuary prepared, or assisted in preparing, the following supporting information for the Comprehensive Annual Financial Report:

Financial Section

- Total Pension Liability
- Net Pension Liability
- Sensitivity Analysis
- Schedule of Changes in the Net Pension Liability
- Schedule of Employer Contributions

Actuarial Section

- Summary of Assumptions and Methods
 - Actuarial Cost Method and Asset Valuation Method
 - Investment Return, Salary Increase, and Payroll Growth
 - Probabilities of Age & Service Retirement
 - Probabilities of Separation from Active Employment Before Age & Service Retirement
 - Probabilities of Death, Before and After Retirement
- Short-Term Solvency Test
- Membership Data
- Analysis of Financial Experience
- Schedule of Funding Progress
- Computed and Actual Employer Contributions

Respectfully submitted,

CAVANAUGH MACDONALD CONSULTING, LLC

Patrice Beckham

Patrice A. Beckham, FSA, FCA, EA, MAAA Principal and Consulting Actuary

SUMMARY OF ACTUARIAL ASSUMPTIONS AND METHODS

ACTUARIAL COST METHOD

The actuarial cost method is a procedure for allocating the actuarial present value of pension benefits and expenses to time periods. The method used for the valuation is known as the Entry Age Normal actuarial cost method, and have the following characteristics:

- (i) The annual normal costs for each individual active member are sufficient to accumulate the value of the member's pension at time of retirement.
- (ii) Each annual normal cost is a constant percentage of the member's year-by-year projected covered compensation.

The Entry Age Normal actuarial cost method allocates the actuarial present value of each member's projected benefits on a level basis over the member's assumed pensionable compensation rates between the entry age of the member and the assumed exit ages.

The portion of the actuarial present value allocated to the valuation year is called the normal cost. The portion of the actuarial present value not provided for by the actuarial present value of future normal costs is called actuarial accrued liability. Deducting actuarial assets from the actuarial accrued liability determines the unfunded actuarial accrued liability or (surplus). Effective with the January 1, 2017 valuation, the existing UAAL on that date is amortized over a closed 30-year period and subsequent pieces of UAAL, arising from actuarial gains and losses each year, will be amortized over a closed 20-year period. The amortization payments on each of the UAAL bases will be determined on a level percentage of payroll basis.

For contributions rates beginning July 1, 2021 and later, there is a 18-month lag between the valuation date in which the employer contribution rates are determined and the effective date of those contributions rates. Therefore, the unfunded actuarial accrued liability is projected from the valuation date of July 1 of the year in which the contribution rate will apply based on the scheduled statutory contribution rates and expected payroll in the intervening years to better approximate the UAAL at that point in time.

CALCULATION OF THE ACTUARIAL VALUE OF ASSETS

The actuarial value of assets is based on a five-year smoothing method and is determined by spreading the effect of each year's investment return in excess of or below the expected return. The Market Value of assets on the valuation date is reduced by the sum of the following:

- I. 80% of the return to be spread during the first year preceding the valuation date,
- II. 60% of the return to be spread during the second year preceding the valuation date,
- III. 40% of the return to be spread during the third year preceding the valuation date,
- IV. 20% of the return to be spread during the fourth year preceding the valuation date.

ACTUARIAL ASSUMPTIONS

System contribution requirements and actuarial present values are calculated by applying assumptions to the benefit provisions and membership information of the System, using the actuarial cost method.

The principal areas of risk which require assumptions about future activities of the System are:

- (i) Long-term rates of investment return to be generated by the assets of the System
- (ii) Patterns of salary increases to members
- (iii) Rates of mortality among members, retirees and beneficiaries
- (iv) Rates of termination of active members
- (v) The age patterns of actual retirements

Investment Return Assumption: (net of administrative expenses): 7.25% per year, compounded annually (2.25% long-term price inflation and a 5.00% real rate of return).

Price Inflation: 2.25%

General Wage Growth (Wage Inflation): 2.85%

Payroll Growth Assumption: 2.85% per year

Interest Crediting Rate on Member Accounts: 2.50% per year.

Salary Increase Rates: Rates vary by years of service.

		Rates by Service		
Years	Inflation	Productivity	Merit	Total
<1	2.25%	.60%	6.65%	9.50%
1	2.25	.60	4.65	7.50
2	2.25	.60	3.65	6.50
3	2.25	.60	2.65	5.50
4	2.25	.60	2.40	5.25
5	2.25	.60	2.15	5.00
6	2.25	.60	1.90	4.75
7	2.25	.60	1.80	4.65
8 - 19	2.25	.60	1.65	4.50
20 – 25	2.25	.60	1.15	4.00
26+	2.25	.60	1.00	3.85

Mortality Table: This assumption is used to measure the probabilities of members dying and the probabilities of each pension payment being made after retirement.

Healthy Retirees:	Pub-2010 General Members (Below Median) Retiree Mortality Table with a one-year age setback for males and a one-year age set-forwarded for females, projected 7 years from valuation date using most recent MP-Scale.
Beneficiaries:	Pub-2010 General Members (Below Median) Contingent Survivor Mortality Table with a one-year age setback for males and a one-year age set-forwarded for females, projected 7 years from valuation date using most recent MP-Scale.
Disabled Retirees:	Pub-2010 General Members (Below Median) Disabled Retiree Mortality Table with a one- year age setback for males and a one-year age set-forwarded for females.

Active Members:Pub-2010 General Members (Below Median) Employee Mortality Table with a one-year age
setback for males and a one-year age set-forwarded for females, projected 15 years from
valuation date using most recent MP-Scale.

Rates of Retirement: These rates are used to measure the probability of eligible members retiring under the regular retirement provisions. The age-related rates used are shown in the tables below.

The first year of normal retirement eligibility is the earlier of age 60 and 5 years of creditable service or 75 credits for Plan B members, and the earlier of age 62 and 5 years of creditable service or 80 credits for Plan C members.

Retirement Rates When Eligible for Unreduced Benefits								
Age	First Eligible Rate	Ultimate Rate						
45 – 52	12%	12%						
53 – 54	15	12						
55	20	12						
56 - 61	15	12						
62	15	20						
63	30	20						
64	20	20						
65	20	28						
66 - 74	30	28						
75	100	100						

Retirement Rates When Eligible for Reduced Benefits					
Age	Rate				
55 – 59	5%				

Terminated vested members are assumed to begin receiving their benefits upon reaching age 60 if they participated in Plan B, and age 62 if they participated in Plan C.

Rates of Separation from Active Membership: This assumption measures the probabilities of a member terminating employment. The rates do not apply to members who are eligible to retire. Rates vary by service. Sample rates are as follows:

Years	Rate			
<1	26.0%			
1	25.0			
5	14.0			
10	8.5			
15	4.5			
20	2.5			
25+	1.0			

Forfeiture of Vested Benefits: Members terminating in vested status are given the option of taking a refund of their accumulated member contributions (and thereby forfeiting the employer-provided benefit) or deferring their vested benefit. Active members who terminate in the future with a vested benefit are assumed to take a deferred vested annuity, unless a refund of contributions and interest is greater than the actuarial present value of their vested deferred benefit.

Rates of Disability: None.

Active Member Group Size: Assumed to remain constant.

Future Benefit Increases or Additional Benefits: When funding is adequate, the Board may authorize cost of living adjustments (COLAs), as noted in the summary of plan provisions. In the past, the Board has also sometimes granted an additional monthly payment to retirees (13th check.) This valuation assumes that no future COLAs and no future 13th checks will be awarded.

MISCELLANEOUS AND TECHNICAL ASSUMPTIONS

Marriage Assumption: All members are assumed to be married for purposes of death benefits. In each case, the male was assumed to be 4 years older than the female.

Decrement Timing: Decrements of all types are assumed to occur mid-year.

Administrative Expense: The actuarial contribution rate includes an explicit component for administrative expenses, based on the actual administrative expenses for the prior year.

Missing Gender: Records that are missing a gender are assumed to be female if the record belongs to a member, and male if the record belongs to a beneficiary.

CHANGES FROM THE PRIOR VALUATION

There were several changes to the System's actuarial methods and assumptions as the result of a comprehensive experience study completed in 2020. The most significant changes are outline below:

- The investment return assumption was lowered from 7.50% to 7.25%.
- The inflation assumption was lowered from 2.75% 2.25%.
- The assumed interest rate credited on employee account balances was lowered from 3.25% to 2.50%.
- The general wage increase assumption was lowered from 3.50% to 2.85%.
- The payroll growth assumption was lowered from 3.00% to 2.85%.
- The mortality assumption was changed to the Pub-2010 General Members (Below Median) Mortality Tables with a 1-year age setback for males and a 1-year set-forward for females, projected using the most recent MP mortality improvement scale. Disabled retiree mortality rates do not reflect future mortality improvement.
- Retirement rates were modified to partially reflect observed experience.
- Termination rates were modified to partially reflect observed experience.
- The disability assumption was eliminated.
- Salary scale increases were changed from a flat 5.00% for all years to service-based rates.
- The actuarial contribution rate includes an explicit component for administrative expenses, based on the actual administrative expense for the prior year.

There was also one change to the actuarial methods implemented in this valuation. There is an 18-month lag between the valuation date in which the actuarial contribution rates are determined and the effective date of those contribution rates. A change was made in determining the amortization payment on the unfunded actuarial accrued liability (UAAL) by projecting the UAAL to July 1 of the following year.

ACTUARIAL SECTION

Membership Profile as of January 1									
	2021	2020	2019	2018	2017	2016	2015	2014	2013
Active Members	4,108	4,074	3,898	3,760	3,701	3,574	3,493	3,501	3,396
Average Age	42.8	42.7	42.7	42.8	43.5	44.0	44.4	44.5	44.9
Average Years of Service	7.4	7.1	7.2	7.5	8.1	8.1	8.3	8.5	9.0
Inactive Vested	521	529	531	522	490	461	476	560	526
Average Age	47.3	47.8	48.6	49.8	50.5	50.5	50.2	51.6	51.1
Average Estimated Monthly Benefit	\$640	\$650	\$647	\$678	\$671	\$689			
Retirees, Disabled and Survivors	4,099	4,145	4,113	4,112	4,032	4,049	4,011	3,885	3,859
Average Age	73.2	72.9	72.5	72.3	72.2	72.0	71.7	71.7	71.5
Average Monthly Benefit	\$1,632	\$1,631	\$1,625	\$1,607	\$1,589	\$1,580	\$1,574	\$1,569	\$1,562

Active Member Valuation Data Active Members Annual Valuation Annual % Increase in Average Charter School January 1 Payroll **Average Pay** Library Total Pay District Schools 2012 1,133 2,022 129 3,284 155,893,016 47,470 2.00% 2013 1,108 2,152 136 3,396 157,303,005 46,320 -2.42% 2014 1,147 2,215 139 3,501 157,014,537 44,848 -3.18% 9.06% 2015 1,245 2,112 136 3,493 170,845,124 48,911 2016 1,336 2,095 3,574 179,013,516 50,088 2.41% 143 2017 1,481 2,076 144 3,701 194,132,739 52,454 4.72% 2018 1,555 2,065 140 3,760 196,277,971 52,202 -0.48% 2019 3,898 -0.08% 1,586 2,172 140 203,310,599 52,158 2020 1,640 2,285 149 4,074 217,255,306 53,327 2.24% 2021 1,650 2,306 4,108 228,084,635 1.04% 152 55,522

Retirants and Beneficiaries Added to and Removed from Rolls

	Adde	d to Rolls	Remov	Removed from Rolls		Rolls End of Year		
Year Ended December 31	Number	Annual Benefits	Number	Annual Benefits	Number	Annual Benefits	% Increase in Annual Benefits	Average Annual Benefits
2012	138	\$ 1,939,048	108	\$ 1,148,934	3,859	\$ 72,356,163		\$ 18,750
2013	148	2,480,646	95	1,690,031	3,885	73,146,778	1.09%	18,828
2014	257	4,763,445	131	2,173,699	4,011	75,736,524	3.54%	18,882
2015	159	2,949,800	122	1,900,088	4,049	76,786,235	1.39%	18,964
2016	151	2,791,834	167	2,697,334	4,032	76,880,736	0.12%	19,068
2017	215	4,456,931	135	2,040,515	4,112	79,297,152	3.14%	19,284
2018	153	2,992,593	152	2,161,017	4,113	80,128,728	1.05%	19,482
2019	155	2,832,629	123	1,866,173	4,145	81,095,184	1.21%	19,565
2020	120	2,115,087	166	2,971,863	4,099	80,238,408	-1.06%	19,575

Solvency Test

In a system that has been following the discipline of level percent of payroll financing, the liabilities for active participant accumulated contributions (liability 1) and the liabilities for future benefits to retirees, beneficiaries, and inactive participants (liability 2) will be fully covered by assets if all assumptions are met. In addition, the liabilities for service already rendered by active participants (liability 3) are normally partially covered by the remainder of the present assets. Generally, if the system has been using level percent of payroll financing, the funded portion of liability 3 will increase over time. The schedule below illustrates the history of the liabilities of the system and their funded status.

Valuation January 1	Active Participants' Accumulated Contribution	Retirees, Beneficiaries and Inactive Participants	Active Participants (Employer Financed)	Valuation Assets		cent Covered By luation Assets	y
	(1)	(2)	(3)		(1)	(2)	(3)
2012	99,513,420	654,828,752	119,944,326	742,279,611	100%	98%	0%
2013	100,767,726	653,949,421	113,946,236	697,028,072	100%	91%	0%
2014	98,272,633	660,003,861	117,174,620	710,828,744	100%	93%	0%
2015	98,966,336	674,794,654	117,782,046	712,390,611	100%	91%	0%
2016	101,173,695	677,295,366	116,761,234	694,641,248	100%	88%	0%
2017	105,887,868	717,052,296	158,574,660	684,412,437	100%	81%	0%
2018	103,069,314	739,004,732	138,362,580	678,288,805	100%	78%	0%
2019	106,618,062	744,459,772	137,156,929	654,259,324	100%	74%	0%
2020	112,913,289	759,819,775	147,388,749	645,373,172	100%	70%	0%
2021	121,889,145	730,344,984	145,353,276	663,210,594	100%	74%	0%

Analysis of Financial Experience				
		(Millions)		
Unfunded Actuarial Accrued Liability, January 1, 2020	\$	374.7		
- Expected increase from amortization method		2.6		
- Actual versus actuarial contributions		(0.5)		
- Investment experience		(10.4)		
- Liability experience		(6.7)		
- Assumption change		(23.9)		
- Other experience		(1.4)		
Unfunded Actuarial Accrued Liability, January 1, 2021	\$	334.4		

Funding Progress

Analysis of the dollar amounts of actuarial value of assets, actuarial accrued liability, or unfunded actuarial accrued liability in isolation can be misleading. Expressing the actuarial value of assets as a percentage of the actuarial accrued liability provides one indication of the System's funded status on an on-going concern basis. Analysis of this percentage over time indicates whether the System is becoming financially stronger or weaker. Generally, the greater this percentage, the stronger the System's funding. The unfunded actuarial accrued liability and annual covered payroll are both affected by inflation. Expressing the unfunded actuarial accrued liability as a percentage of covered payroll approximately adjusts for the effects of inflation and aids analysis of the progress being made in accumulating sufficient assets to pay benefits when due. Generally, the smaller this percentage, the stronger the System's funding.

Actuarial Valuation Date	Actuarial Value of Assets (AVA) (a)	Actuarial Accrued Liabilities (AAL) (b)	Unfunded AAL (UAAL) (b-a)	Funded Ratio (a/b)	Covered Payroll (c)	UAAL as Percent of Covered Payroll [(b-a)/c]
1/1/2012	742,279,611	874,286,498	132,006,887	84.9%	155,893,016	84.7%
1/1/2013	697,028,072	868,663,383	171,635,311	80.2%	157,303,005	109.1%
1/1/2014	710,828,744	875,451,114	164,622,370	81.2%	157,014,537	104.8%
1/1/2015	712,390,611	891,543,036	179,152,425	79.9%	170,845,124	104.9%
1/1/2016	694,641,248	895,230,295	200,589,047	77.6%	179,013,516	112.1%
1/1/2017	684,412,437	981,514,827	297,102,390	69.7%	194,132,739	153.0%
1/1/2018	678,288,805	980,436,626	302,147,821	69.2%	196,277,971	153.9%
1/1/2019	654,259,324	988,234,763	333,975,439	66.2%	203,310,599	164.3%
1/1/2020	645,373,172	1,020,121,813	374,748,641	63.3%	217,255,306	172.5%
1/1/2021	663,210,594	997,587,405	334,376,811	66.5%	228,084,635	146.6%

	Historical Contribution Rates				
Actuarial Valuation Date	Actuarial Contribution Rate	Actual Contribution Rate	Contribution Shortfall/(Margin)		
1/1/2012	18.30%	15.00%	3.30%		
1/1/2013	20.52%	15.00%	5.52%		
1/1/2014	19.68%	16.00%	3.68%		
1/1/2015	19.56%	17.00%	2.56%		
1/1/2016	20.18%	18.00%	2.18%		
1/1/2017	18.61%	18.00%	0.61%		
1/1/2018	18.82%	18.00%	0.82%		
1/1/2019	19.82%	19.50%	0.32%		
1/1/2020	20.80%	21.00%	(0.20%)		
1/1/2021	19.49%	21.00%	(1.51%)		

Summary Plan Description

Effective Date

January 1, 1944, most recently amended in 2018.

Plan Type

Plan B applies to anyone who retires on or after June 30, 1999 and was hired prior to January 1, 2014. Plan C applies to members hired on or after January 1, 2014. All members with Plan A benefits have terminated or retired.

Eligibility for coverage

All regular, full-time employees of the School District of Kansas City, Missouri, the Kansas City Public Library District, the Retirement System and the Charter Schools located within the boundaries of the Kansas City District become members as a condition of employment. Regular employment means working at least five hours per day, five days per week, nine months per year. Temporary and part-time employees are excluded.

Service

Creditable service is member service, which is service for which required contributions have been made. There is no cap on creditable service. Prior to 1990, creditable service could not exceed 35 years. The Plan B maximum retirement benefit is 60% of Average final compensation, which will be reached upon attainment of 30 years of service. The Plan C maximum retirement benefit is 60% of Average final compensation, which will be reached upon attainment of 34.25 years of service.

Annual compensation

A member's annual compensation level will be the regular compensation shown on the employer's salary and wage schedules, excluding extra pay, overtime pay, or any pay not on the schedule.

Average final compensation

The average final compensation is the highest average annual compensation paid during any four consecutive years of service.

Normal retirement

Eligibility

- Plan B: Members may retire after (a) the completion of five years of creditable service and the attainment of age 60, or (b) having a total of at least 75 credits, with each year of creditable service and year of age, both prorated for fractional years, equal to one credit.
- Plan C: Members may retire after (a) the completion of five years of creditable service and the attainment of age 62, or (b) having a total of at least 80 credits, with each year of creditable service and year of age, both prorated for fractional years, equal to one credit.

Benefit

Plan B: The normal retirement benefit payable monthly equals one twelfth of 2.00% (1.75% for members who retired prior to June 30, 1999) of the member's average final compensation multiplied by years of creditable service, subject to a maximum of 60% of average final compensation. Any member whose years of creditable service exceed 34.25 years on August 28, 1993 shall have a maximum greater than 60%, which shall be equal to 1.75% times the member's years of creditable service on August 28, 1993. Plan C: The normal retirement benefit payable monthly equals one twelfth of 1.75% of the member's average final compensation multiplied by years of creditable service, subject to a maximum of 60% of average final compensation.

Minimum benefit

Effective January 1, 1996, any member with at least 10 years of creditable service, but less than 20 years is entitled to a minimum benefit of \$150 per month, plus 15 for each year of creditable service in excess of 10 years, or the actuarial equivalent if an option was elected. Any member with at least 20 years of creditable service at retirement is entitled to a minimum benefit of \$300 per month, or the actuarial equivalent of \$300 if an option was elected. Beneficiaries of deceased members who retired with at least 10 years of creditable service and elected one of the optional plans for payment of benefits may receive the actuarial equivalent of the minimum benefit available for the option chosen.

Early retirement

Eligibility

Members may retire at any time after the completion of five years of creditable service and the attainment of age 55.

Benefit

Plan B: A member eligible for early retirement will receive a reduced benefit, with the reduction based on the number of months preceding eligibility for a normal retirement benefit. The reduction factors are as follows:

Age	Reduction Factor
59	0.91042
58	0.82985
57	0.75727
56	0.69175
55	0.63251

Plan C: A member eligible for early retirement will receive a reduced benefit, with the reduction based on the number of months preceding eligibility for a normal retirement benefit. The reduction factors are as follows:

Age	Reduction Factor
61	0.90799
60	0.82558
59	0.75162
58	0.68511
57	0.62518
56	0.57109
55	0.52219

Disability retirement

Eligibility

A member with at least five years of creditable service who is certified to be totally incapacitated for performance of duty by the Medical Board is eligible for a disability retirement.

Benefit

A disabled vested member will receive a benefit, calculated as for normal retirement, based on creditable service and average final compensation at actual disability retirement date, or the minimum disability benefit whichever is greater. The minimum disability retirement benefit will be the lesser of (a) 25% of the member's average final compensation, or (b) the member's service retirement benefit calculated on the participant's average final compensation and the maximum number of years of creditable service the member would have earned had the member remained an employee until age 60. Disability benefits are payable immediately.

Vested termination benefits

Eligibility

A member who has at least five years of creditable service earns a vested interest in his or her accrued benefit, provided the member leaves his or her contributions in the System.

Benefit

The vested benefit is calculated as a normal retirement benefit based on service and average final compensation at date of termination and is payable at minimum normal retirement date.

Non-vested benefits

Benefit

If the member's termination is for reasons other than death or retirement and if the participant has not met the vesting or retirement requirements, the participant's contributions with interest will be refunded.

Death Benefit

Prior to retirement

For a member who dies before retirement and was either an active employer or any inactive vested member who met the other requirements (age or points) for either normal or early retirement, the member's designated beneficiary is entitled to receive either (a) the member's accumulated contributions and interest, or if the designated beneficiary is the member's spouse, dependent child or dependent parent, (b) a monthly retirement benefit calculated under Option 1 as if the deceased member had at least ten years of creditable service at time of death. If the beneficiary is a child, the optional monthly benefit is payable until the beneficiary reaches age nineteen.

For an inactive vested member who dies before retirement and has not met the other (age or points) requirements for retirement, the member's accumulated contributions and interest will be payable to the member's designated beneficiary.

All members are guaranteed to have their designated beneficiaries receive at least their accumulated contributions and interest, upon the member's death.

Postretirement

The benefit payment selected by the retiree will determine what, if any, benefits are payable upon death after retirement.

Normal form of benefit payments

The normal form of benefit payment is the normal retirement benefit amount paid monthly for the life of the member. If the member should die before receiving payments totaling the amount of their contributions to the plan, the designated beneficiary shall receive a lump sum payment of the remaining amount.

Optional forms of benefit payments

Members may elect from the following optional forms of benefit payment:

Option 1

Option 1 provides a reduced retirement benefit that will continue on to a designated survivor. Upon a retiree's death, the retiree's designated survivor will receive for life, the same level of monthly retirement benefit. In the event the retiree's designated survivor predeceases the retiree, the retiree's monthly retirement benefit will be adjusted to the amount that would have been paid in the normal form of payment.

Option 2

Option 2 provides a reduced retirement benefit that will continue on to a designated survivor. Upon a retiree's death, the retiree's designated survivor will receive for life, a monthly benefit equal to one-half of the retiree's monthly retirement benefit. In the event the retiree's designated survivor predeceases the retiree, the retiree's monthly retirement benefit will be adjusted to the amount that would have been paid in the normal form of payment.

Option 3

Option 3 provides that upon a retiree's death, no benefits are payable to the retiree's estate or any beneficiary. Retirement benefits payable under this option will be actuarially increased from the normal form.

Each of the above options produces benefits which are actuarially equivalent to the normal form of benefit which is a monthly annuity payable for the lifetime of the retiree.

Cost-of-living allowances

The Board of Trustees shall determine annually whether or not the system can provide an increase in benefits for those retirees who, as of the January 1 preceding the date of such increase, have been retired at least one year. Any such increase also applies to optional retirement allowances paid to a retiree's survivor. The Board makes its determination as follows:

- The actuary recommends to the Board what portion of the investment return is available for increases and the amount available to be paid on the first day of the 14th month following the end of the valuation year. The actuary's recommendation is subject to the following safeguards:
 - a. The System's funded ratio as of the January 1st of the preceding year of the proposed increase must be at least 100% after adjusting for the effect of proposed increase. The funded ratio is the ratio of assets to the pension benefit obligation.
 - b. The actuarially required contribution rate, after adjusting for the effect of the proposed increase, may not exceed the statutory contribution rate.
 - c. The actuary must certify that the proposed increase will not impair the actuarial soundness of the System.

- 2. The Board reviews the actuary's recommendation and shall, in their discretion, determine if an increase may be granted. In accordance with Board policy, if an increase is permissible, the amount of the increase will be equal to the lesser of 3% or the percentage increase in the CPI for the preceding year, subject to a cumulative increase of 100% subsequent to December 31, 2000.
- 3. This provision does not guarantee an annual increase to any retired member.

Administration of the retirement system

The Board of Trustees is responsible for the general administration and proper operation of the retirement system. The Board consists of 12 members – four members appointed by the Board of Education, one member appointed by the Board of Trustees of the library district, four members elected by and from the actives and terminated vested members of the retirement system, two members elected by and from the retirees of the retirement system, and the Superintendent of Schools of the School District of Kansas City, Missouri. Administrative expenses are paid out of the general reserve fund.

Employee contributions

Contributions for Employees are as follows:

- Effective July 1, 2021, if the System is at least 100% funded, the members contribute the lesser of (a) 9.00% or (b) one-half of the actuarial required contribution rate. If the System is less than 100% funded, the members contribute 9.00%
- Effective January 1, 2016, members contribute 9.00%
- Effective January 1, 2015, members contributed 8.50%
- Effective January 1, 2014, members contributed 8.00%
- Effective January 1, 1999, members contributed 7.50%
- Prior to January 1, 1999, members contributed 5.90%
- Prior to 1990, members contributed 5.00% of earnable annual compensation plus 2.00% of earnable compensation in excess of \$6,500, the contribution earning base.

Employer contributions

Effective July 1, 2021, and for each subsequent twelve-month period beginning July 1 of each year, the employer contribution rate shall be the greater of (1) the actuarial required contribution rate, as determined in the valuation prepared for the prior calendar year, less the member contribution rate, or (2) 12.00 % of pay, until the system is fully funded. Once the System Is fully funded, the employer contribution rate may increase or decrease in subsequent years, depending on the actuarial contribution rate developed in the annual actuarial valuation and the applicable employee contribution rate. Effective July 1, 2021, the employer contribution rate shall not increase by more than 1.00% or decrease by more than 0.50% from the corresponding rate in effect immediately before such increase or decrease. An exception to the limitation on the magnitude of employer rate increases and decreases exists only when the system is fully funded and the total actuarial required contribution rate for employer and employee rate falls below 18%.

Prior to July 1, 2021, the employers of members contribute at the fixed rate of covered compensation as follows;

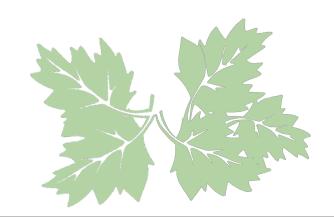
- Effective January 1, 2020, 12.00%
- Effective January 1, 2019, 10.50%
- Effective January 1, 2016, 9.00%
- Effective January 1, 2015, 8.50%
- Effective January 1, 2014, 8.00%
- Effective January 1, 1999, 7.50%

- Effective July 1, 1996, 5.99%
- Effective July 1, 1995, 3.99%
- Effective July 1, 1993, 1.99%
- Prior to July 1, 1993, employer contributions were actuarially determined.

Changes from the Prior Valuation

None.

V.



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Statistical Summary

Objectives

The objective of the Statistical section is to provide the detail and historical context needed for a thorough assessment and understanding of KCPSRS' financial condition. Data in this section are presented in multiple-year format to show previous and emerging trends.

Contents

The schedules on pages 80-81 show financial trend information that assists users in understanding and assessing how KCPSRS financial position has changed over time. The financial trend schedules presented are:

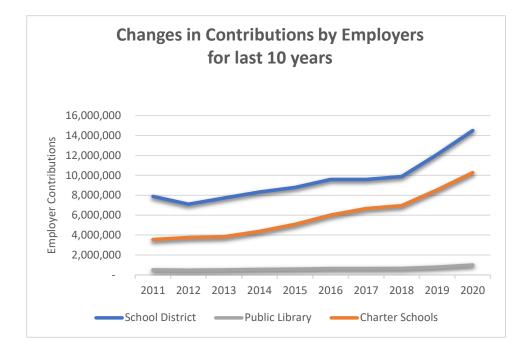
- Changes in Fiduciary Net Position
- Deductions from Fiduciary Net Position for Benefits and Refunds
- Changes in Contributions by Employers

Demographic and operating information begins on pages 82-88. This information is intended to assist users in understanding the environment in which KCPSRS operates and to provide information that facilitates comparisons of financial statement information over time. The demographic and operating information presented are:

- Valuation Assets vs Pension Liabilities
- Actuarial Accrued Liabilities
- Valuation Assets as percent of Pension Liabilities
- Membership Profile in the Retirement Plan
- Active Members by Employer and Plan
- Changes in Active Members by Employer
- Active Membership by Employer and Plan
- Participating Employers
- Retired Members by Type of Benefit
- Average Monthly Benefits Amounts by Service Years (New Retirees)
- 2020 Successes

		Change	es in Fiduc	iary Net P	osition –	Last 10 Y	ears			
Fiscal Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Additions										
Member Contributions	\$ 12,082,175	\$ 11,577,924	\$ 12,310,320	\$ 13,358,180	\$ 14,645,901	\$ 16,280,327	\$ 16,964,351	\$ 17,619,145	18,524,657	19,531,341
Employer Contributions	11,972,752	11,370,252	12,093,945	13,288,142	14,499,260	16,528,188	16,926,562	17,527,854	21,488,838	25,771,854
Net Investment Income	5,502,704	76,761,126	78,598,783	25,936,419	(10,025,518)	44,331,774	103,767,714	(33,250,914)	106,033,718	73,263,968
Total Additions to Plan Net Positions	29,557,631	99,709,302	103,003,048	52,582,741	19,119,643	77,146,289	137,658,627	1,896,085	146,047,213	118,567,163
Deductions										
Benefits	70,411,893	72,426,711	73,844,481	75,298,737	76,235,124	76,898,255	78,181,575	79,333,689	80,228,574	80,473,732
Refunds	5,721,334	4,386,983	3,567,693	3,236,645	3,399,065	3,270,723	3,581,147	4,084,837	4,937,877	4,316,797
Depreciation Expense	443,060	522,930	524,163	528,850	250,979	92,179	15,855	17,150	11,020	9,830
Administrative	1,283,444	1,336,764	1,479,931	1,548,320	1,648,449	1,552,025	1,520,665	1,499,928	1,546,381	1,614,905
Total Deductions from Plan Net Position	77,859,731	78,673,388	79,416,268	80,612,562	81,533,617	81,813,182	83,299,242	84,935,604	86,723,852	86,416,263
Change in Net Position	\$ (48,302,100)	\$ 21,035,914	\$ 23,586,780	\$ (28,029,821)	\$ (62,413,974)	\$ (4,666,893)	\$ 54,359,385	\$ (83,039,520)	\$ 59,323,361	32,151,9000

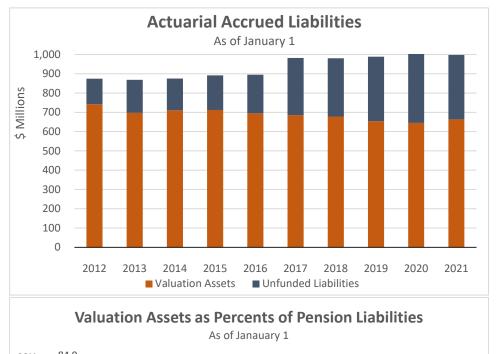
	Deductions from Plan Net Position for Benefits and Refunds									
Fiscal Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Total Benefits	\$ 70,411,892	\$ 72,426,711	\$ 73,844,481	\$ 75,298,738	\$ 76,235,124	\$ 76,898,255	\$ 78,181,575	\$ 79,333,689	\$ 80,228,574	80,473,732
Total Refunds	\$ 5,721,334	\$ 4,386,983	\$ 3,567,693	\$ 3,236,645	\$ 3,399,065	\$ 3,270,723	\$ 3,581,147	\$4,084,837	\$ 4,937,877	\$ 4,316,797

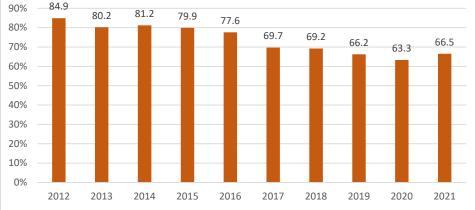


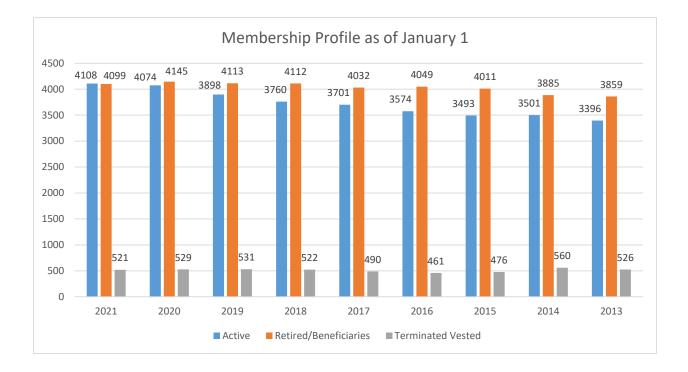
Changes in Contributions by Employers for last 10 years										
	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
School District	\$ 7,878,152	\$ 7,719,216	\$ 7,719,216	\$ 8,324,500	\$ 8,786,297	\$ 9,586,293	\$ 9,587,553	\$ 9,878,602	\$ 12,161,075	\$ 14,503,808
Charter Schools	\$ 3,554,946	\$ 3,381,254	\$ 3,831,254	\$ 4,375,968	\$ 4,375,968	\$ 6,012,583	\$ 6,659,635	\$ 6,955,232	\$ 8,543,030	\$ 10,268,702
Public Library	\$ 507,553	\$ 508,693	\$ 508,693	\$ 550,376	\$ 587,212	\$ 636,430	\$ 641,867	\$ 647,906	\$ 784,734	\$ 999,344

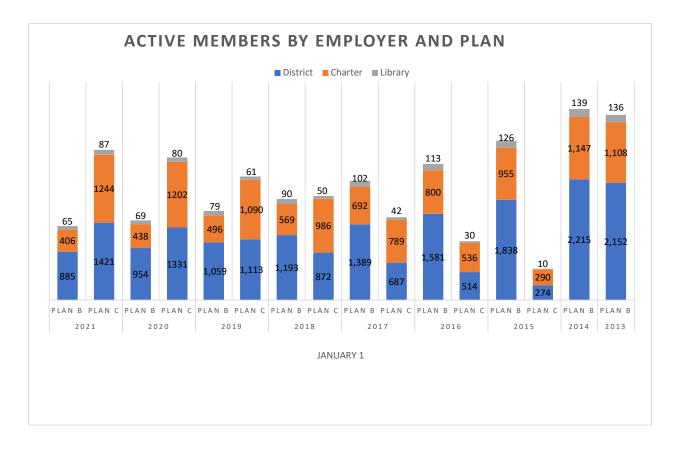
	Valuation Assets vs Pension Liabilities						
Valuation		Dollars in Millions					
January 1	Valuation Assets	Unfunded Liabilities	Accrued Liabilities	Funded Ratios			
2012	742.28	132.01	874.29	84.9%			
2013	697.03	171.64	868.66	80.2%			
2014	710.83	164.62	875.45	81.2%			
2015	712.39	179.15	891.54	79.9%			
2016	694.64	200.59	895.23	77.6%			
2017	684.41	297.10	981.51	69.7%			
2018	678.29	302.15	980.44	69.2%			
2019	654.26	333.98	988.23	66.2%			
2020	645.37	374.75	1,020.12	63.3%			
2021	663.21	334.38	997.59	66.5%			

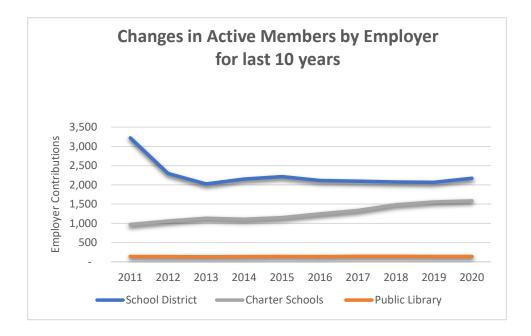
Note: Numbers may not add due to rounding.

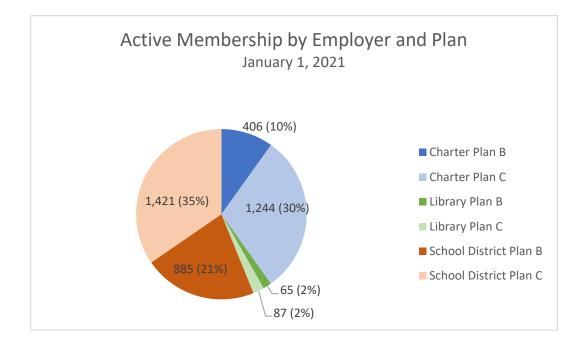












Participating Employers 2020 Employer Contribution Total **Total Contribution** % of Total Kansas City Public Schools \$ 14,503,808 56.3% 3.9% Kansas City Public Library 999,344 **Charter Schools** Frontier Schools 1,389,109 5.4% **Guadalupe Centers Schools** 1,038,187 4.0% Ewing Marion Kauffman School 860,961 3.3% 854,002 3.3% University Academy **Crossroads Charter Schools** 777,693 3.0% Hogan Preparatory Academy Académie Lafayette 720,911 2.8% 713,684 2.8% Académie Lafayette Kansas City International Academy 644,511 2.5% **Brookside Charter School** 615,764 2.4% KIPP Endeavor Academy 490,433 1.9% 347,548 1.3% Allen Village Charter Lee A. Tolbert Community Academy 335.600 1.3% 1.2% Citizens of the World Kansas City 297,383 Scuola Vita Nuova 278,728 1.1% 0.8% Genesis Schools. Inc. 216,786 Gordon Parks Elementary 201,391 0.8% Academy of Integrated Arts 168,092 0.7% Kansas City Girl's Preparatory Academy 119,827 0.5% DeLaSalle Charter School 0.4% 115,726 82,366 0.3% Hope Leadership Academy **Total Charter Schools** \$ 10,268,702 39.8% **Total Contributions** 100.0% \$ 25,771,854

STATISTICAL SECTION

Retired Members by Type of Benefit							
Amount of	Total	Total		Type of	Type of Benefit		
Monthly	Monthly	Number of		Surviving	Surviving		
Benefits	Benefits	Recipients	Retired	Spouses	Children	Disability	
\$1 to 500	\$ 201,422	596	535	49	1	11	
501 to 1,000	626,515	844	754	61	2	27	
1,001 to 1,500	789,322	637	556	54	4	23	
1,501 to 2,000	924,989	528	492	29	2	5	
2,001 to 2,500	1,329,690	590	571	14	1	4	
2,501 to 3,000	1,307,552	480	471	9	-	-	
3,001 to 3,500	807,905	250	249	1	-	-	
3,501 to 4,000	363,004	98	95	3	-	-	
4,001 to 4,500	213,583	51	50	1	-	-	
4,501 to 5,000	79,531	17	17	-	-	-	
Over 5,000	43,021	8	8	-	-	-	

Years of Credited Service All **Members Retiring During** <5 5-10 10-15 15-20 20-25 25-30 30+ Members Fiscal Year Ending 01/01/2014 Average monthly benefit \$1,669 \$566 \$827 \$1,428 \$2,091 \$2,218 \$2,662 \$1,399 Number of retirees 5 32 28 19 22 22 6 134 Fiscal Year Ending 01/01/2015 Average monthly benefit \$343 \$563 \$879 \$1,656 \$2,120 \$2,591 \$2,985 \$1,516 Number of retirees 44 10 3 37 25 36 25 180 Fiscal Year Ending 01/01/2016 Average monthly benefit \$436 \$625 \$977 \$1,403 \$2,174 \$2,678 \$3,414 \$1,579 9 21 27 9 Number of retirees 23 39 17 145 Fiscal Year Ending 01/01/2017 Average monthly benefit \$478 \$493 \$1,019 \$1,415 \$2,036 \$2,568 \$2,740 \$1,570 Number of retirees 24 17 22 24 12 129 4 26 Fiscal Year Ending 01/01/2018 Average monthly benefit \$549 \$611 \$935 \$1,490 \$2,435 \$2,786 \$3,087 \$1,792 Number of retirees 32 31 30 33 35 24 196 11 Fiscal Year Ending 01/01/2019 Average monthly benefit \$730 \$701 \$961 \$1,818 \$2,245 \$2,643 \$2,928 \$1,684 Number of retirees 2 35 22 27 16 18 18 138 Fiscal Year Ending 1/01/2020 Average monthly benefit \$465 \$680 \$928 \$1,640 \$2,253 \$2,787 \$3,469 \$1,569 Number of retirees 6 38 24 22 15 18 8 131 Fiscal Year Ending 1/01/2021 Average monthly benefit \$396 \$515 \$1,082 \$1,466 \$1,742 \$2,944 \$2,939 \$1,508 Number of retirees 1 19 20 30 17 8 10 105

Average Monthly Benefit Amounts (New Retirees)

While 2020 was an eventful year worldwide, it was successful for KCPSRS in many ways:

- Adding \$32.2 million to our total fund which in turn provides a secure future for all our members
- Strong investment return of 11.90% for net investment income of \$73.3 million
- Paying \$80.4 million in retirement benefits to our retirees
- Contributions received from employers and employees totaling \$45.3 million

KCPSRS benefit is the major source of income to many retirees.



KCPSRS Staff are proud to be a small part of this System and its many achievements over the years. We look forward to continuing to serve Kansas City and our members.