



City of Saint Paul
Interdepartmental Memorandum

To: Mayor Melvin Carter
Members of the City Council

From: District Energy Rate Review Team

John McCarthy, Director, Office of Financial Services
Michael Solomon, Treasurer, OFS
Sarah Brown, OFS Treasury
Mary Guerra, OFS Budget
Melissa Zellmer, OFS Accounting
Holly Huston, City Council
Lisa Veith, City Attorney's Office

Date: October 7, 2020

Subject: Staff Report for Proposed District Energy St. Paul, Inc. Rates,
Effective for FY 2021

This memorandum provides an analysis of District Energy's proposed cooling and heating rate changes for fiscal year 2021, in accordance with the procedural requirements specified in District Energy's franchise agreements.

I. District Cooling Rates:

District Cooling proposes the following changes to Schedule A:

Demand Rate:

Increase from \$29.28 to \$30.02 per ton per month, an increase of 2.53%

Energy Rate:

Decrease from \$0.098 to \$0.094 per ton-hour

Transition Rate:

Increase from \$0.390 to \$0.394 per ton-hour at 1200 utilization hours

All other service charges will remain at the 2020 levels as indicated in the attached District Cooling Schedule A.

Comparison of Cooling Rates: 2017 – 2021

	Actual FY 2017	Actual FY 2018	Actual FY 2019	Forecast FY 2020	Budget FY 2021
Rates					
Demand (\$/ton/mo)	\$27.41	\$28.15	\$28.57	\$29.28	\$30.02
Energy (\$/ton hr)	\$0.098	\$0.100	\$0.100	\$0.098	\$0.094
Overall cost at 1200 hrs (\$/ton hr)	\$0.372	\$0.381	\$0.386	\$0.390	\$0.394
Increase as %					
Demand (\$/ton/mo)	2.70%	2.70%	1.49%	2.49%	2.53%
Energy (\$/ton hr)	6.50%	2.04%	0.00%	-2.00%	-4.08%
Overall cost at 1200 hrs	3.60%	2.42%	1.31%	1.04%	1.03%

The proposed District Cooling *average overall cost* (at 1200 utilization hours) shows an increase of 1.03% from forecasted 2020 to budgeted 2021.

The proposed *demand rate* increase is 2.53%. The demand rate covers operations and maintenance, general and administrative, research and development, debt and capital expenses. Total budgeted demand related costs are expected to decrease by \$318,877 (net of capital expenditures).

The *energy rate* shows a decrease back to 2017 levels. The energy rate is a pass through to the customer. The rate is based on the projected cost of electricity, which is the major fuel source for cooling. The 2021 budgeted rate is \$0.094.

The *average overall cost* increase (at 1200 utilization hours) of 1.03% is due to two factors. On the *demand rate* side, an increase in debt service costs, and operation and maintenance costs, are contributing to the increase. On the *energy rate* side, increases in the cost of electricity is contributing to the rate increase.

District Cooling Comparison to Similar Utility Provider

	Cooling Cost* (\$ / Ton-Hour 1200 Hrs)
Energy Park Utility 2018 Cost	\$0.295
District Cooling 2021 Cost	\$0.394

*Excluding City fees and sales tax.

II. District Heating Rates:

District Heating proposes no changes in 2021:

Single rate & Transition Rate:

\$0.0596 per kilowatt hour

Two-part rate:

\$5.63 per kilowatt per month

\$19.90 per megawatt hour

All other service charges will remain at the 2020 levels.

Comparison of Heating Rates: 2017 – 2021

	Actual FY 2017	Actual FY 2018	Actual FY 2019	Forecast FY 2020	Budget FY 2021
Rates					
Demand (\$/kW/mo)	\$5.37	\$5.45	\$5.53	\$5.63	\$5.63
Energy rate	\$24.15	\$23.85	\$22.50	\$19.90	\$19.90
Fuel adjustment rate	(\$1.24)	\$0.00	\$0.00	\$0.00	\$0.00
Total Energy (\$/MWh)	\$22.91	\$23.85	\$22.50	\$19.90	\$19.90
Single Rate (\$/KWH)	\$0.0621	\$0.0623	\$0.0615	\$0.0596	\$0.0596
Increase as %					
Demand (\$/kW /mo)	1.90%	1.49%	1.47%	1.81%	0.00%
Total Energy (\$/MWh)	8.07%	4.10%	-5.66%	-11.56%	0.00%
Single Rate (\$/KWH)	6.30%	0.32%	-1.28%	-3.09%	0.00%

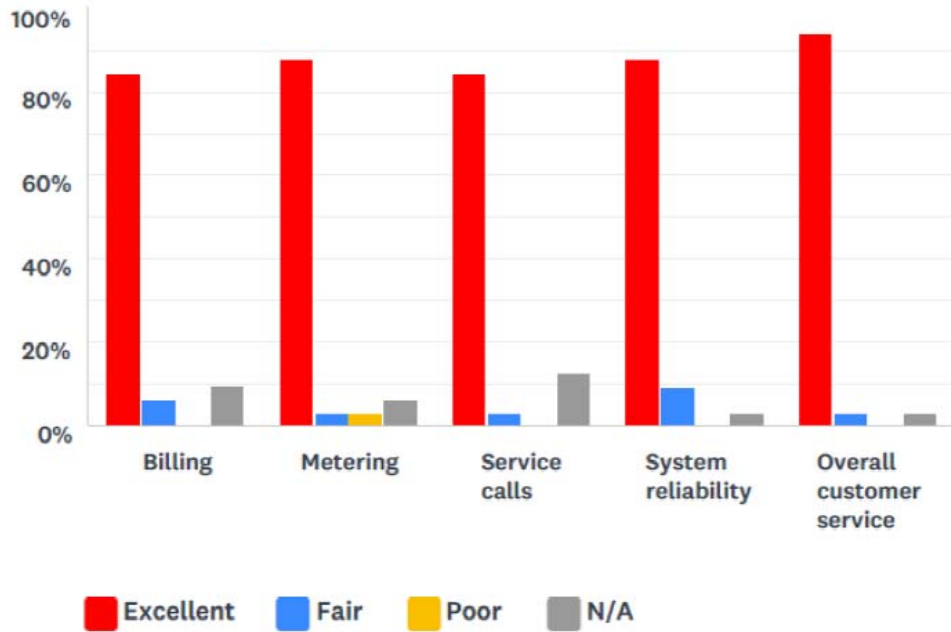
District Heating Comparison to Other Similar Utilities

	<u>Heating Cost*</u> <u>(\$ / MMBtu 1700 Hrs)</u>
Energy Park Utility 2018 Cost	\$21.45
District Heating 2021	\$19.90

*Excluding City fees and sales tax.

III. Customer Survey

In 2019, District Energy conducted a customer satisfaction survey. Of the survey responses received, 93.9% rated District Energy’s overall customer service as excellent, and 88.2% rated the system reliability as excellent.



IV. Staff Recommendation

District Cooling:

From an internal perspective, looking at the City’s own district cooling expense trend for the past five years (see table below), District Energy’s requested rate increase does not seem unreasonable. The City’s own trends in cooling costs are likely similar to District Energy’s other customers. Given that customer survey results reflect that most customers are satisfied with the service, and given that the average rate increase request at 1.04% is relatively small, staff recommends approval of the rate increase request.

City District Cooling Expenditures by Department:

Department	Description	2015	2016	2017	2018	2019
Police	Building Maint.	92,135.37	90,764.00	90,887.00	92,556.00	83,465.59
Fire	Station Maint.	27,847.81	27,694.00	27,034.00	28,046.00	28,246.71
Real Estate	Real Estate CHA	72,190.04	76,681.00	59,174.00	66,595.00	65,294.62
Library	Maint. Service	47,770.77	51,267.00	52,148.00	63,218.00	53,543.24
Total		239,943.99	246,406.00	229,243.00	250,415.00	230,550.16
% Change		-3.50%	2.69%	-6.97%	9.24%	-7.93%

District Heating:

The City's district heating expense trend for the past five years are below. Heating rates will remain the same for 2021.

City District Heating Expenditures by Department:

Department	Description	2015	2016	2017	2018	2019
Police	Building Maint.	131,725.31	123,067.00	116,550.00	75,326.00	55,156.59
Fire	Station Maint.	30,837.65	29,531.00	32,408.00	33,981.00	31,821.37
Real Estate	Real Estate CHA	67,431.12	59,083.00	79,390.00	108,619.00	130,017.48
Library	Maint. Service	36,714.71	36,140.00	43,921.00	50,599.00	58,729.31
Total		266,708.79	247,821.00	272,269.00	268,525.00	275,724.75
% Change		-16.35%	-7.08%	9.87%	-1.38%	2.68%