

STILLWATER AREA PUBLIC SCHOOLS ISD #834

ENROLLMENT PROJECTIONS

Hazel H. Reinhardt

October 8, 2020

PROJECTION ENVIRONMENT

- COVID-19 Pandemic
- Low fertility
 - Number of births decreasing in US and Minnesota
 - Larger percentage of Millennials remain childless?
- Less mobility
 - US fewer than 10 percent moved last year
 - Was 20 per cent per year since WWII
- Population aging
 - Different new housing mix

PROJECTION ENVIRONMENT

- Immigration from abroad slowed
- Minnesota population back to pattern of net out migration

PAST TEN YEARS IN DISTRICT #834

- Since 2009-10, a decade of decreases
 - The District's enrolled school age population decreased by 129 students or -1.2 percent
 - Resident enrollment (excluding Early Childhood) decreased by 363 students of -4.3 percent
 - Market share is 72.7 percent down from 75.1 percent in 2009-10
 - Competition for students is increasing
 - In 2019-20, the Stillwater Area Public Schools had a net loss of 1,499 students to other public options

PAST TEN YEARS IN DISTRICT #834

- Since 2009-10
 - Total enrollment (excluding Early Childhood) decreased by 300 students or -3.5 percent
 - Nonresident enrollment increased from 266 to 329 students
 - Nonresidents were 3.9 percent of total enrollment in 2019-20
 - Marked by natural decrease, that is, each fall's incoming kindergarten was smaller than the previous year's Grade 12
 - Major reason for enrollment decline
 - Net in migration even when four elementary schools closed

HOUSING DATA

- Projected single-family detached housing units for the next three years (582 units) is only 67 percent the number of the past three years (872 units)—so expect slower growth. Single-family detached units yield the largest number of Stillwater Area Public School students per unit; 85 percent of resident students live in single-family detached units
- The yield of resident Stillwater Area Public School K-12 students per newly built single-family detached units is an exceptionally low 0.25 per new unit

HOUSING DATA

- Even in the Lake Elmo elementary attendance area where 496 new single-family detached units were built in the past three years, resident K-5 per unit yield for new units was only 0.15

ENROLLMENT

Year	Total	Resident	Nonresident
2009-10	8,680	8,414	266
2010-11	8,644	8,365	279
2011-12	8,479	8,222	257
2012-13	8,419	8,156	263
2013-14	8,415	8,117	298
2014-15	8,392	8,090	302
2015-16	8,322	8,002	320
2016-17	8,401	8,059	342
2017-18	8,267	7,934	333
2018-19	8,351	8,006	345
2019-20	8,380	8,051	329

Excludes Early Childhood

PUBLIC OPTIONS

2019-20

YEAR	IN		OUT			NET
	Open Enrollment	Tuition Agree.	Open Enrollment	Tuition Agree.	Charter	
2019-20	329		568	44	1,255	-1,494

EDUCATION CHOICES

2018-19

	Minnesota	Stillwater Area
Nonpublic settings	8.9%	10.7%
Traditional schools	6.9%	7.7%
Home schools	2.0%	3.0%
Public Options		
Open enrollment	8.7%	
In		4.1%
Out		4.6%
Charter schools	6.3%	11.6%
Capture Rate	76.1%	72.2%

GRADE SIZE

- In 2019-20
 - 592 K-5 average grade size
 - 666 6-8 average grade size
 - 697 9-12 average grade size
- Net in migration between Grade 5 and Grade 6 and between Grade 6 and Grade 7, especially in the past three years. Also net in migration between Grade 8 and Grade 9. However, no “built in” growth momentum

ENROLLMENT PROJECTIONS

- In ten years (2029-30)
 - Stillwater's enrollment (excluding Early Childhood) is projected to range from 8,881 to 9,153. 2019-20 enrollment was 8,380 (excluding Early Childhood)
 - Kindergarten projected to be smaller than the previous year's Grade 12, which is a continuation of the pattern of the past ten years
 - Net in migration projected to continue, which is also the pattern of the past ten years

COMPONENTS OF ENROLLMENT CHANGE

Fall to Fall	Total		Natural Increase/Decrease	Net Migration
	#	%		
2009 to 2010	-36	-0.4%	-190	154
2010 to 2011	-165	-1.9%	-248	83
2011 to 2012	-60	-0.7%	-256	196
2012 to 2013	-4	0.0%	-214	210
2013 to 2014	-23	-0.3%	-177	154
2014 to 2015	-70	-0.8%	-262	192
2015 to 2016	79	0.9%	-208	287
2016 to 2017	-134	-1.6%	-241	107
2017 to 2018	84	1.0%	-201	285
2018 to 2019	29	0.3%	-212	241
Total	-300	---	-2,209	1,909

Excludes Early Childhood

FUTURE KINDERGARTEN CLASSES

- Kindergarten classes beginning in 2025-26 likely to be smaller because births are declining

ENROLLMENT PROJECTIONS

- The low kindergarten assumption and the high migration assumption seem to be the best (most realistic) assumptions
 - Low kindergarten assumption is based on a kindergarten to kindergarten pool ratio that except for one year is higher than any year from 2015-16 to date
 - High migration assumption has lower survival rates at the elementary grades, which is the most recent pattern, and higher survival rates at the middle school grades, which is not only the most recent pattern but fits with the large enrollment at charter schools

ENROLLMENT PROJECTIONS

“BEST” ENROLLMENT PROJECTIONS **2024-25**

	2019-20	2024-25	Change
Total	8,380	8,707	327
K-5	3,552	3,607	55
6-8	1,997	2,146	149
9-12	2,831	2,954	123

RESIDENT LIVE BIRTHS

Year	MN	Washington County						
2003	70,053	2,930						
2004	70,617	2,856						
2005	70,950	2,870						
2006	73,515	2,960						
2007	73,675	2,943						
2008	72,382	2,891						
2009	70,617	2,781						
2010	68,407	2,868						
2011	68,416	2,818						
2012	68,783	2,793						
2013	69,183	2,857						
2014	69,916	2,888						
2015	69,835	2,800						
2016	69,746	2,867						
2017	68,603	2,725						
2018	67,348	2,732						

STILLWATER'S KINDERGARTEN AS A PERCENTAGE OF THE WASHINGTON COUNTY KINDERGARTEN POOL

Birth Years	Washington County Pool	Percentage	Kindergarten Year
2003; 2004	2,881	20.93%	2009-10
2004; 2005	2,865	21.57%	2010-11
2005; 2006	2,930	20.27%	2011-12
2006; 2007	2,949	18.72%	2012-13
2007; 2008	2,908	18.84%	2013-14
2008; 2009	2,817	21.26%	2014-15
2009; 2010	2,840	19.37%	2015-16
2010; 2011	2,834	19.44%	2016-17
2011; 2012	2,801	19.24%	2017-18
2012; 2013	2,836	20.52%	2018-19
2013; 2014	2,878	19.81%	2019-20
2014; 2015	2,829		2020-21
2015; 2016	2,845		2021-22
2016; 2017	2,772		2022-23
2017; 2018	2,729		2023-24

PROJECTED MINNESOTA 0-YEAR OLDS

Year	Number
2017 Actual*	68,603
2017	70,312
2018 Actual*	67,348
2018	70,395 (68,987)
2019	70,373 (68,966)
2020	70,325 (68,919)
2021	70,274 (68,869)
2022	70,227 (68,822)
2023	70,191 (68,787)
2024	70,164 (68,761)
2025	70,164(68,761)
*Actual births	

PROJECTED MINNESOTA 0-YEAR OLDS

- Kindergarten pool for 2024-25 and beyond may be too high
 - Based on the ratio of 2017 births to projected 2017 0-year-olds—that is 98%
 - In 2018 the ratio of actual to projected was 96%
- Predicted decrease in births due to pandemic and economic downturn

PROJECTED KINDERGARTEN POOL

Year	Number
2020-21	2,829
2021-22	2,845
2022-23	2,772
2023-24	2,729
2024-25	2,783
2025-26	2,805
2026-27	2,804
2027-28	2,802
2028-29	2,800
2029-30	2,799

KINDERGARTEN PROJECTIONS

Year	@19.86%	@20.52%
2019-20	570	570
2020-21	562	581
2021-22	565	584
2022-23	551	569
2023-24	542	560
2024-25	553	571
2025-26	557	576
2026-27	557	575
2027-28	556	575
2028-29	556	575
2029-30	556	574
Total	5,555	5,740

Past ten years 5,703 Kindergarten students

NET MIGRATION

OCTOBER TO OCTOBER

	09 to 10	10 to 11	11 to 12	12 to 13	13 to 14	14 to 15	15 to 16	16 to 17	17 to 18	2018-19
Total	154	83	196	210	154	192	287	107	285	241

PROJECTED SURVIVAL RATES

Grade	Low (past 4 years)*	High (past 2 years)
K to 1	1.029	1.023
1 to 2	1.048	1.046
2 to 3	1.025	1.021
3 to 4	1.020	1.022
4 to 5	1.043	1.045
5 to 6	1.041	1.059
6 to 7	1.040	1.057
7 to 8	1.029	1.028
8 to 9	1.033	1.027
9 to 10	1.017	1.011
10 to 11	1.000	0.997
11 to 12	1.107	1.089

*Minus fall 2016 to fall 2017

ENROLLMENT PROJECTIONS

Year	Low K Low Mig	High K Low Mig	Low K High Mig	High K High Mig
2019-20	8,380	8,380	8,380	8,380
2024-25	8,662	8,707	8,760	8,804
2029-30	8,881	8,936	9,097	9,153

PROJECTED COMPONENTS OF ENROLLMENT CHANGE

- 2019-20 to 2029-30
 - Natural decrease averages 205 to 234 students per year depending on the kindergarten and migration assumptions
 - Net in migration averages 279 to 287 students per year depending on the kindergarten and migration assumption
- 2009-10 to 2019-20
 - Natural decrease averaged 221 students per year in the past ten years
 - Net in migration averaged 191 students per year in the past ten years and 263 students per year in the past two years

ENROLLMENT PROJECTIONS

- First five projection years (2019-20 to 2024-25)
 - K-5 increases 55 to 180 students
 - 6-8 increases 89 to 149 students
 - 9-12 increases 112 to 123 students
- In ten years (2019-20 to 2029-30)
 - K-5 increases 43 to 190 students
 - 6-8 increases by 108 to 222 students
 - 9-12 increases by 323 to 388 students

TOTAL ENROLLMENT PROJECTIONS

- Too high
 - A long recession, which would slow residential growth
 - Projected kindergarten too high
 - More students open enroll out of the Stillwater Area Public Schools, attend charter schools, etc.
- Too low
 - Projected kindergarten too low
 - More students open enroll into the Stillwater Area Public Schools

HOUSING TYPE

- Stillwater Area Public School resident students
 - 85.4 percent live in single-family detached units
 - 6.3 percent live in apartment units
- Single-family detached homes have the highest yield per unit (0.35)

HOUSING TYPE

District #834

Housing Type by Stillwater Area Public Schools Resident Student Yield

Housing Type	Units	K-12 Students	K-12 Yield
Single-Family Detached	19,163	6,721	0.35
Single-Family Attached*	1,576	239	0.15
Apartments	n.a.	499	n.a.
Condominium Units	1,622	147	0.09
Duplex Units	244	9	0.04
Mobile Homes	n.a.	255	n.a.
Total	---	7,870	---

*Townhomes

AGE OF SINGLE-FAMILY DETACHED UNITS

Single-Family Detached Resident Student Yield by Year Built

Year Built	Units	Resident K-12	
		#	Yield
2000 or later	4,872	2,756	0.57
1980-1999	5,638	1,747	0.31
1960-1979	4,551	1,273	0.28
Pre 1960	4,102	945	0.23
Total	19,163	6,721	0.35

VALUE OF SINGLE-FAMILY DETACHED UNITS

Single-Family Detached Resident Student Yield by Market Value

Estimated Market Value	Units	Resident K-12	
		#	Yield
\$550,000 or more	3,499	1,229	0.35
\$450,000-\$549,999	3,052	1,178	0.39
\$350,000-\$449,999	4,882	2,111	0.43
\$250,000-\$349,999	5,002	1,577	0.32
Less than \$250,000	2,728	626	0.23
Total	19,163	6,721	0.35

SINGLE-FAMILY DETACHED UNITS BY SALES STATUS

Sold January 1, 2017 to December 31, 2019

Status	Units	K-12 Yield
New*	872	0.25
Existing (pre-2017)		
Not Sold	15,737	0.35
Sold	2,554	0.41
Total	19,163	0.35
*Built 2017-2019		

RACE/ETHNICITY

- Of the 7,870 resident students, 19.2 percent are classified as minority
 - 19 percent of minority students live in multi-family units compared to 3 percent of white students
 - 92 percent of white students live in single-family detached units compared to 58 percent of minority students

PROJECTED DEVELOPMENT

2020 to 2022

MCD*	Single-Family Detached	Townhomes	Apartment Units
Afton	21		
Bayport	47		
Grant	18		
Lake Elmo	343	80	300
Marine-on-St. Croix	3		
May Twp.	6		
Stillwater	90		200
Woodbury	39	296	255
West Lakeland Twp.	15		
Total	582	376	755
** Only MCDs with projected housing units shown in this table			

COMPARISON OF PROJECTIONS

COMPARISON OF PROJECTIONS 2022-23	
Projections	K-12 Students
Housing Unit Method (residents)	8,224
Housing Unit Method (total)	8,558
Low K/Low Mig	8,571
Low K/High Mig	8,582
High K/Low Mig	8,626
High K/High Mig	8,640

ENROLLMENT PROJECTIONS

- Projections for 2024-25
 - Two of the seven elementary schools show a decrease in enrollment—Rutherford and Anderson
 - Reasons for decreases are different
 - Most elementary growth in three schools—but growth occurs for different reasons
 - Lake Elmo projected to increase but growth depressed by natural decrease
 - Brookview projected to increase because of natural increase
 - Afton-Lakeland's increase due to high survival rates (net in migration)

COHORT SURVIVAL METHOD PROJECTIONS GRADES K-5

High/High

School	2019-20	2020-201	2021-22	2022-23	2023-24	2024-25
Afton-Lakeland	479	494	503	526	537	542
Anderson	364	354	354	356	356	349
Brookview	480	503	529	549	549	559
Lake Elmo	697	701	738	758	763	747
Lily Lake	477	488	494	483	492	490
Rutherford	567	548	537	514	512	501
Stonebridge	433	422	432	431	434	437
Gate 4/5	55	60	65	70	75	80
Sum	3,552	3,570	3,652	3,687	3,718	3,705
District-wide	3,552	3,577	3,654	3,688	3,720	3,705
Difference	0	-7	-2	-1	-2	0



ENROLLMENT PROJECTIONS

- Oakland Middle School's enrollment projected to increase while enrollment at Stillwater Middle School projected to decrease
 - Middle school enrollment driven by net in migration

COHORT SURVIVAL METHOD PROJECTIONS GRADES 6-8

High/High

School	2019-20	2020-201	2021-22	2022-23	2023-24	2024-25
Oak Land MS	973	1,042	1,087	1,136	1,142	1,226
Stillwater MS	1,024	987	968	948	917	922
Sum	1,997	2,029	2,055	2,084	2,059	2,148
District-wide	1,997	2,028	2,054	2,083	2,057	2,146
Difference	0	1	1	1	2	2