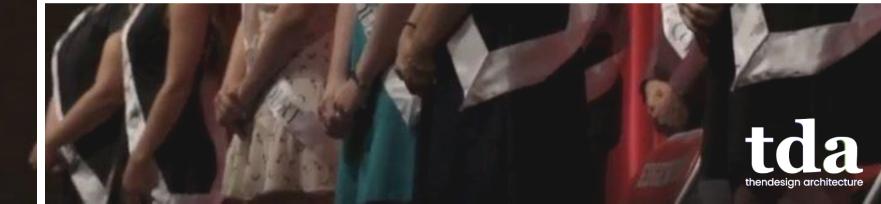


### Buckeye Local School District

Facilities Committee Meeting 3

November 5, 2019



# Agenda

### Planning Timeline & Recap

Guiding Principles & Word Cloud

Kingsville School Assessment & Educational Adequacy Study

Braden School Educational Adequacy Study

Next Steps / Questions



#### Planning Timeline

1

09/09/2019 Kick-off Meeting 2

10/08/2019
Review of the
HS & Develop
Guiding
Principles

3

11/07/2019

Review of MS & Kingsville ES 4

12/2019

Review of Ridgeview ES, Jeopardy Game & Treasurer Report

DATA COLLECTION / IMMERSION

5 & 6

01/2020 Master Planning 7 & 8

02/2020 Master Planning 9 & 10

03/2020 Master Planning 10&11

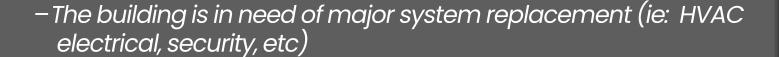
04/2020 Master Planning

MASTER PLANNING - PUTTING IT ALL TOGETHER



### Recap of Meeting #2

- Reviewed Assessment & Building Data for Edgewood HS
  - The building is larger than what we need for our current enrollments



- -The cost to fully renovate = \$24. M. Cost to replace at same SF = \$33 M. This equates to a 73% renovation vs. rebuild percentage
- -Site is 49 acres, but almost fully developed and long narrow design creates restrictions
- School has good natural light, most corridors provide good line of site, but there is a lack of flexible, collaborative space
- Established our Guiding Principles







# Agenda

Planning Timeline & Recap

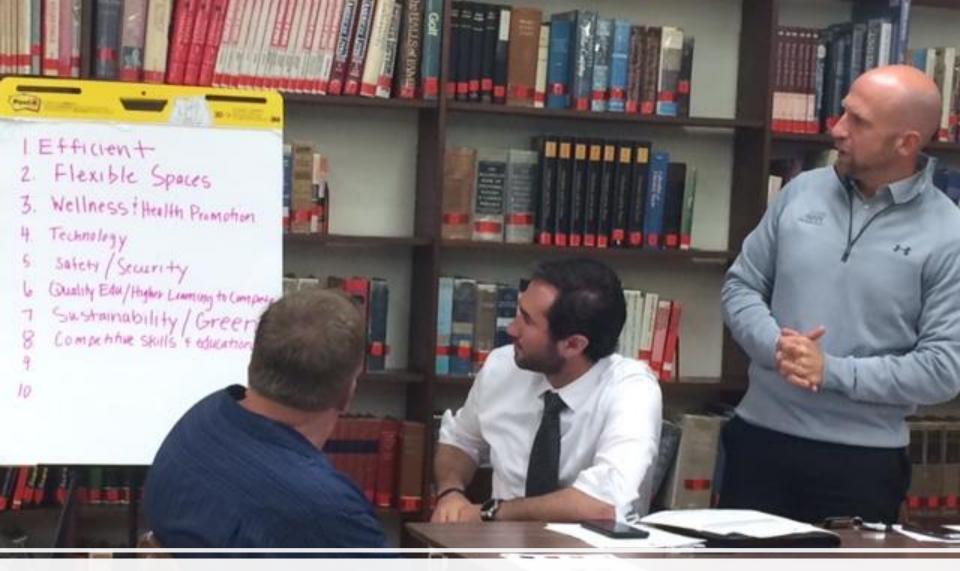
Guiding Principles & Word Cloud

Kingsville School Assessment & Educational Adequacy Study

Braden School Educational Adequacy Study

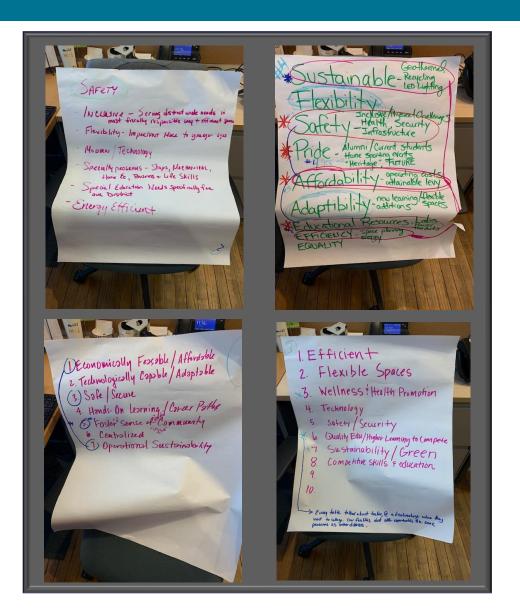
Next Steps / Questions





### **Your Guiding Principles**

#### **Your Guiding Principles**





Every table talked about feeling at a disadvantage when they went to college. Our facilities did not offer opportunities for the same programs as other districts

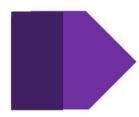


#### **GUIDING PRINCIPLES**



#### Safe & Secure

Our schools should promote the safety of students and staff. A safe, healthy environment should be inclusive to all students district-wide.



#### **Pride**

Our schools should foster our sense of pride in the community. They should reflect our heritage, but at the same time provide opportunities for success in the future.



#### **Quality Education**

Buckeye Schools students should be afforded with facilities that give them the advantage and ability to compete in a higher learning setting and feature state-of-the-art educational resources / spaces.



#### **Affordability**

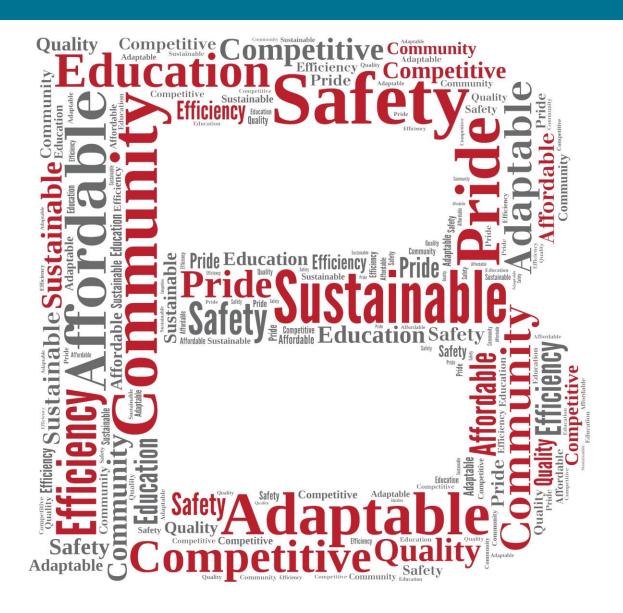
The building project should be attainable and affordable to the taxpayers in our community. It is imperative that we develop a plan that is economically feasible, is attainable, and promotes operational sustainability.



#### Efficient & Sustainable

Our schools need to be energy efficient and sustainable both in building materials and building systems. The buildings can serve as an educational tool giving students a physical place and culture that fosters the development of being global citizens and educates in healthy sustainable environments.

#### **Your Guiding Principles**





# Agenda

Planning Timeline & Recap

Guiding Principles & Word Cloud

Kingsville School Assessment & Educational Adequacy Study

Braden School Educational Adequacy Study

Next Steps / Questions



#### Kingsville Elementary School



• Acres: 10 acres

• SF = 52,552 SF

Original Construction: 1928

• Additions: 1956, 1965, 1975

• Enrollment: 418

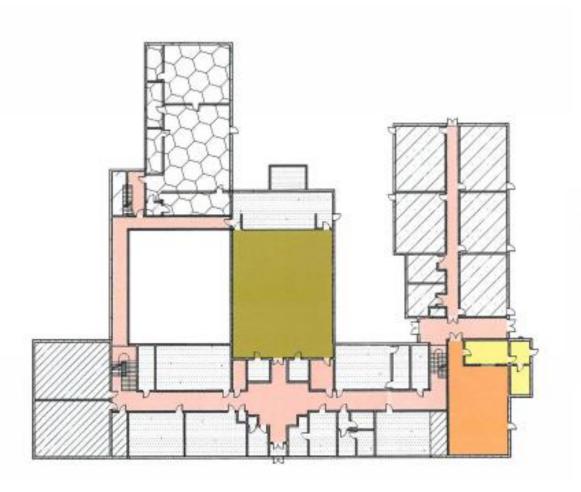
• Grades: K-5

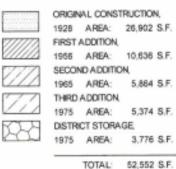
Building Capacity: 426 students

### Kingsville Elementary School



#### Kingsville Elementary







	Item	Rating	TMP 2008 Assessment with 2019 Cost Set	As
A.	Heating System	3	\$1,839,320.00	
B.	Roofing	3	\$206,880.00	
C.	Ventilation / Air Conditioning	1	\$0.00	
D.	Electrical Systems	3	\$914,088.16	
E.	Plumbing and Fixtures	3	\$330,732.00	
F.	Windows	3	\$704,760.00	
G.	Structure: Foundation	1	\$0.00	
H.	Structure: Walls and Chimneys	2	\$89,667.50	
1.	Structure: Floors and Roofs	1	\$14,913.50	
J.	General Finishes	3	\$1,229,562.40	
K.	Interior Lighting	3	\$341,588.00	
L.	Security Systems	2	\$123,497.20	
M.	Emergency/Egress Lighting	3	\$52,552.00	
	Fire Alarm	3	\$118,242.00	
0.	Handicapped Access	3	\$501,110.40	
P.	Site Condition	3	\$559,746.00	
Q.	Sewage System	3	\$75,125.00	
R.	Water Supply	3	\$11,750.00	
S.	Exterior Doors	3	\$66,000.00	
	Hazardous Material	3	\$52,200.00	
	Life Safety	3	\$311,222.64	
	Loose Furnishings	3	\$268,268.00	
W.	Technology	2	\$617,169.00	
	Subtotal:		\$8,428,393.80	
X.	Construction Contingency / Non Construction Costs		\$2,059,081.89	
	Total		\$10,487,475.69	
Т	otal Cost (regional cost factor applied (104.88%)):		\$10,999,264.50	

TDA April 2019	
Assessment Validation	
Update	
\$1,839,320.00	
\$463,886.00	
\$0.00	
\$852,918.96	
\$481,364.00	
\$921,270.00	
\$0.00	
\$270,420.50	
\$114,913.50	
\$2,075,223.60	
\$341,588.00	
\$273,497.20	
\$52,552.00	
\$118,242.00	
\$669,110.40	
\$662,146.00	
\$359,200.00	
\$11,750.00	
\$66,000.00	
\$52,200.00	
\$336,192.40	
\$341,588.00	
\$627,024.00	
\$10,930,406.56	
\$2,670,331.11	
\$13,600,737.67	
\$14,264,453.67	

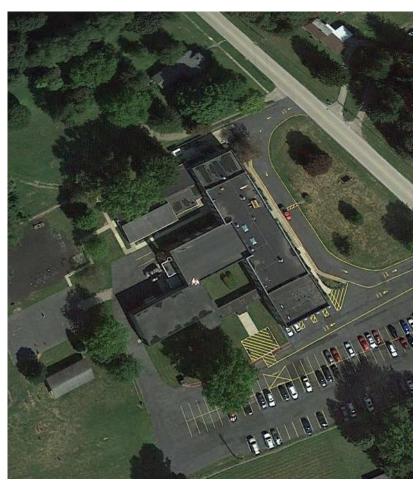
Delta:
\$0.00
\$257,006.00
\$0.00
(\$61,169.20)
\$150,632.00
\$216,510.00
\$0.00
\$180,753.00
\$100,000.00
\$845,661.20
\$0.00
\$150,000.00
\$0.00
\$0.00
\$168,000.00
\$102,400.00
\$284,075.00
\$0.00
\$0.00
\$0.00
\$24,969.76
\$73,320.00
\$9,855.00 \$2,502,012.76
\$611,249,22
\$3,113,261.98
\$3,265,189.17

23%

Cost to Replace Reno/Replace Ratio \$14,183,784.80 78%

\$14,183,784.80 101%





Roofs need replacement – additional insulation needed to meet LEED



Windows are in poor condition





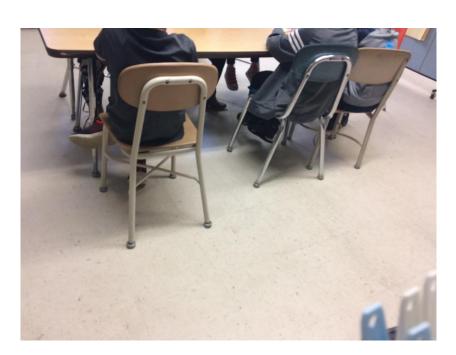
Concrete roof deck erosion – exposing steel

Fallen concrete





ADA accessibility challenges



Dated and mismatched furnishings



#### **Educational Adequacy**



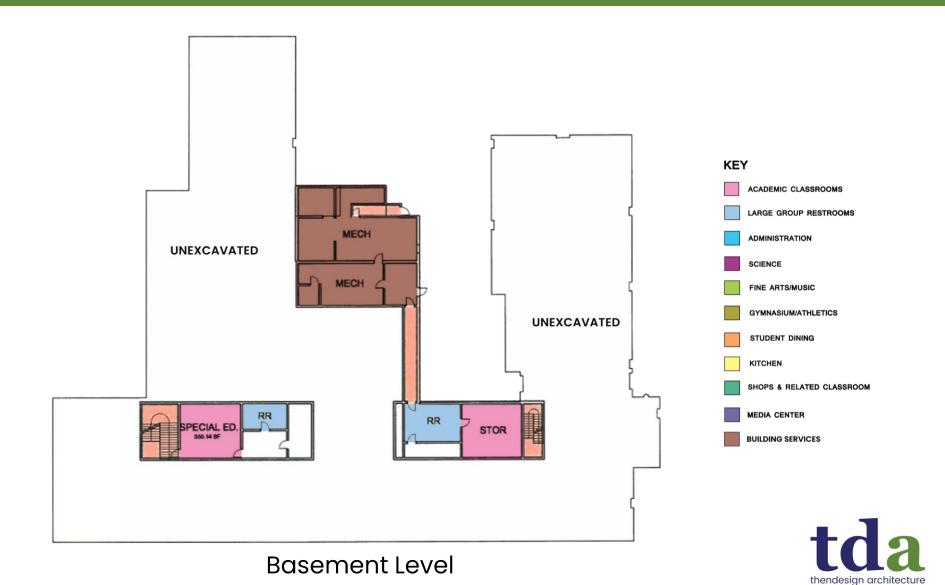
SIZE



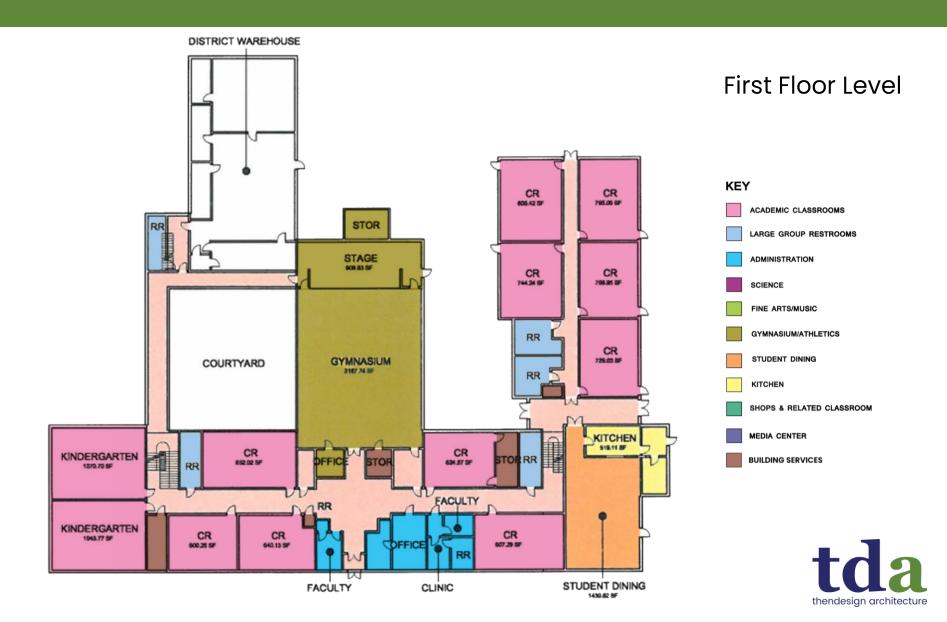




#### Kingsville Elementary – Current Landscape



#### Kingsville Elementary – Current Landscape



#### Kingsville Elementary – Current Landscape



#### Kingsville Elementary – Size & Flexibility



SIZE

and Flexibility

Student retention is 5% with a lecture format,

50% with a discussion format and

70% with a practice by doing format.





## Kingsville Elementary – Capacity & Space Study of Classrooms

- Average standardclassroom size is 700 SFundersized
- Average classroom
   lacks flexibility between
   rooms they are static
- Lack of small group, remedial instruction, and teacher & student collaboration spaces
- Special Education classrooms are located in the basement level

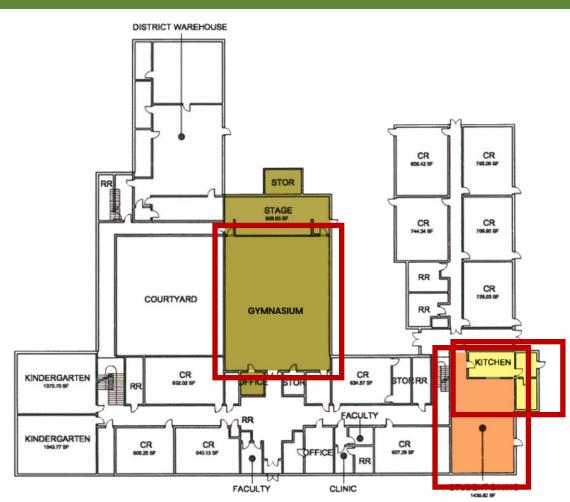


First Floor Level



## Kingsville Elementary – Capacity & Space Study of Large Group Spaces

- Gymnasium is slightly undersized at 3,188 SF compared to OSDM recommendation of 3,500 SF
- Kitchen is very undersized at only 519 SF, compared to 1,393 SF recommendation by the OSDM
- Student dining is also undersized.
   It only has 1,431 SF, but should
   have approximately 3,000 SF for the current enrollment.

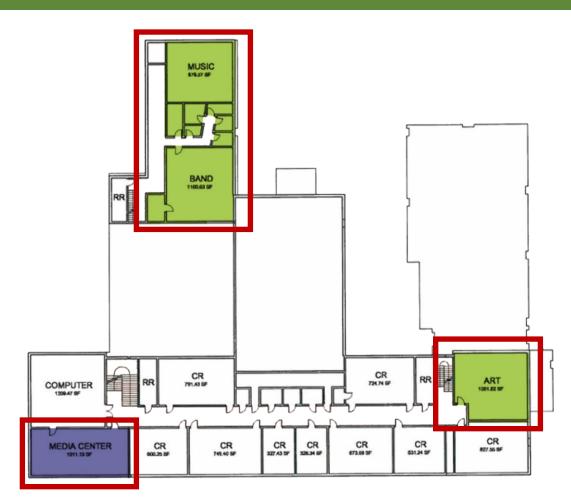


First Floor Level



## Kingsville Elementary – Capacity & Space Study of Large Group Spaces

- Gymnasium is slightly undersized at 3,188 SF compared to OSDM recommendation of 4,000 SF
- Kitchen is very undersized at only 874 SF, compared to 1,463 SF recommendation by the OSDM
- Student dining is also undersized.
   It only has 1,431 SF, but should have approximately 4,000 SF for the current enrollment.
- Music classroom is undersized by 321 SF, however, a separate band room is provided which is not typical in an elementary school
- Both media center & art are slightly undersized and appear to be converted standard classroom spaces



Second Floor Level



#### Kingsville Elementary – Capacity & Space Study

	EXISTING SF	OFCC RECOMMENDED SF	DIFFERENCE
CLASSROOMS	avg 700	900	-200
MEDIA CENTER	1,011	1,256	-245
STUDENT DINING	1,431	4,000	-2,569
KITCHEN	519	1,463	-874
GYMNASIUM	3,188	3,500	-312
MUSIC	879**	1,200	-321
SCIENCE	N/A	N/A	N/A

<sup>\*\*</sup> Note: The school has a 1,100 band room in addition to the music room





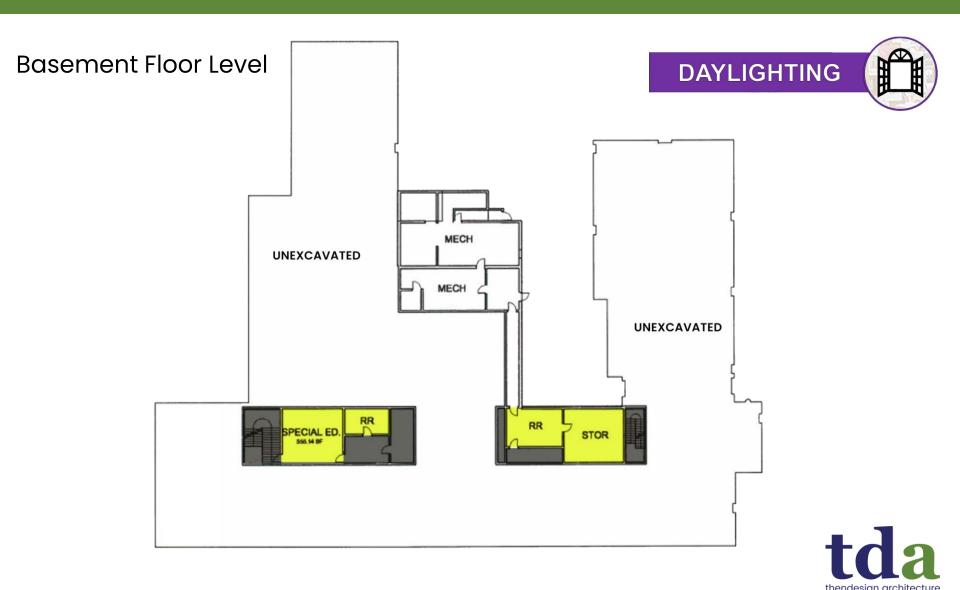
"In one school district, students with the most daylighting in their classrooms progressed 20% faster on math tests and 26% faster on reading tests when compared to students in the least daylit classrooms."

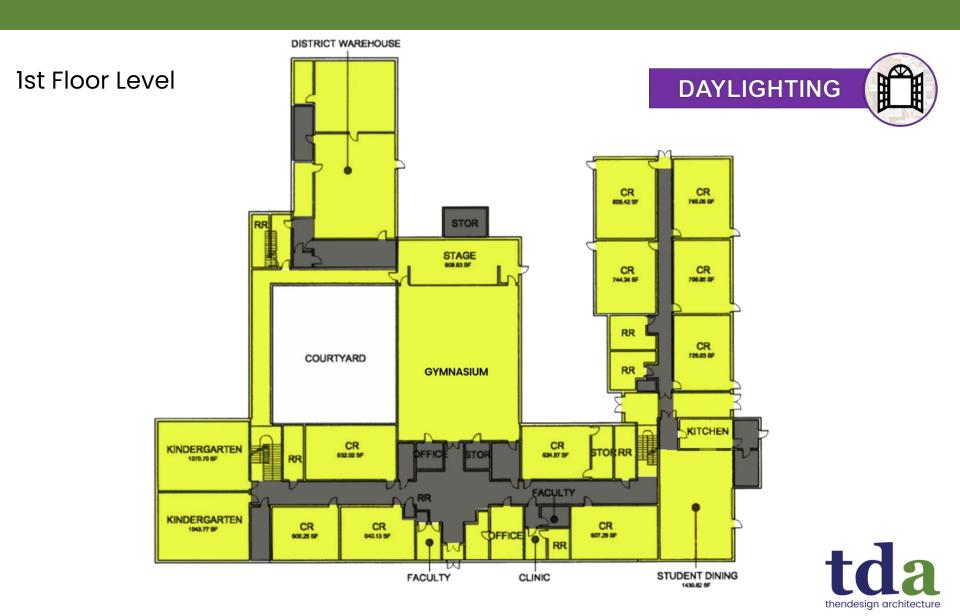
Daylighting in Schools: Improving Student Performance and Health at a Price Schools Can Afford, 2000

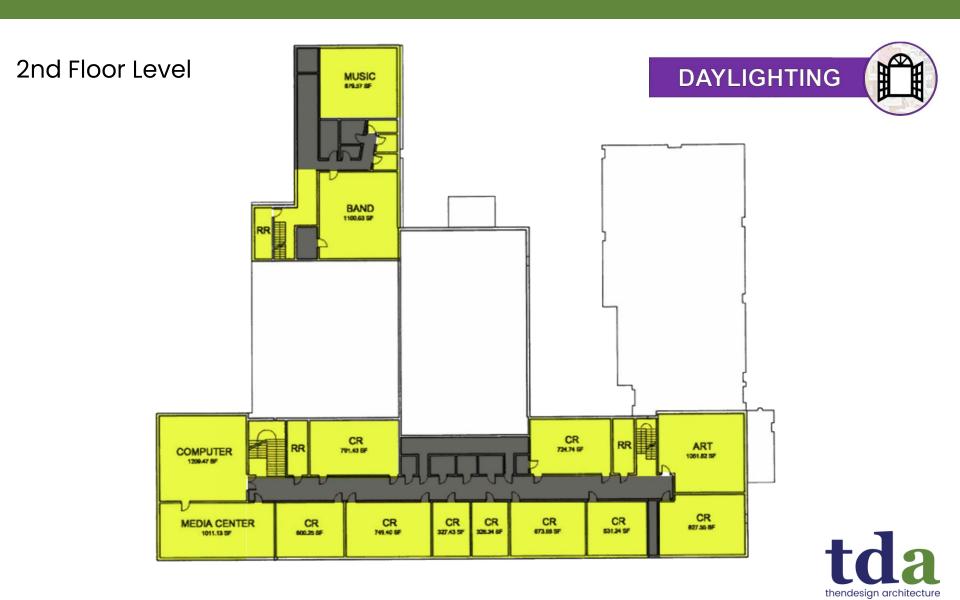
## DAYLIGHTING











#### Kingsville Elementary – Safety & Security

"Employing CPTED [Crime Prevention Through Environmental Design] concepts in new school construction and renovations can make substantial improvements, ranging from reconfiguring main entranceways to funnel visitors into the office to enhancing hallway supervision with improved line-of-sight, and reducing bullying by putting restroom sinks in a common area on the outer portion of the bathrooms so adults can better supervise kids washing their hands after using the facilities,"

School Safety A Shared Responsibility, Justine Brown, October 2015

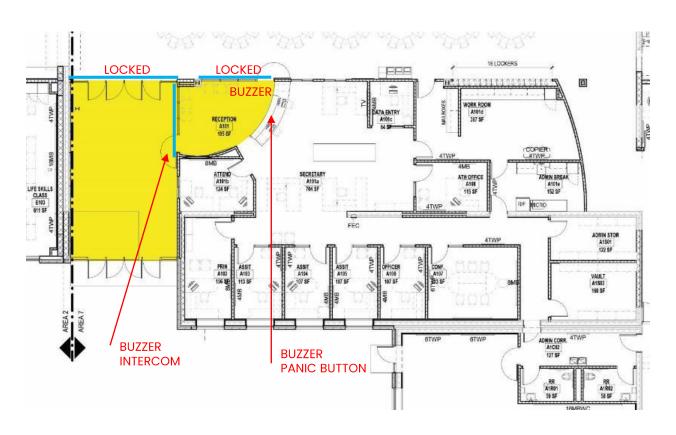






#### **PASSIVE DESIGN**

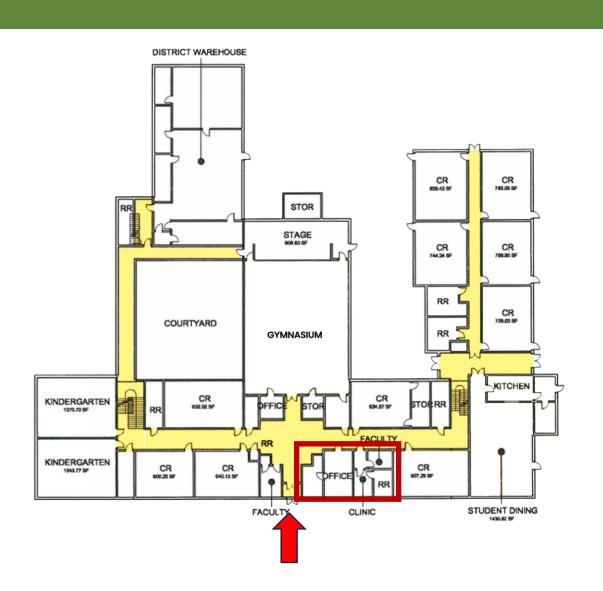
Secure entry vestibule



LAMINATED SECURITY GLAZING



#### Kingsville Elementary – Safety & Security



- Main office is not connected to main entrance
- A secure vestibule is not present at main entrance
- Corridors have a lot of twists and turns which can limit visual observation
- Restroom design does not provide sinks in a common area on the outer portion of the bathrooms so adults can better supervise kids



#### Kingsville Elementary – Safety & Security



- Main office is not connected to main entrance
- A secure vestibule is not present at main entrance
- Corridors have a lot of twists and turns which can limit visual observation
- Restroom design does not provide sinks in a common area on the outer portion of the bathrooms so adults can better supervise kids



#### Kingsville Elementary – Site



#### Kingsville Elementary – Summary

- The overall renovation cost has increased beyond cost to rebuild at the same square footage
- The site has 10 acres and is provided with greenspace that is suitable for outdoor learning
- Typical classrooms are undersized compared to State standards.
   All of the large group spaces are undersized as well, including but not limited to the gymnasium, kitchen, student dining, etc.
- The school has a generous amount of daylight most teaching/learning spaces are provided with natural light.
- Corridors wind and bend this limits staff visual supervision. The facility lacks security/safety features in the restroom design to inhibit opportunities for bullying and there is no secure vestibule entrance for enhanced security control.



# Agenda

Planning Timeline & Recap

Guiding Principles & Word Cloud

Kingsville School Assessment & Educational Adequacy Study

Braden School Educational Adequacy Study

Next Steps / Questions



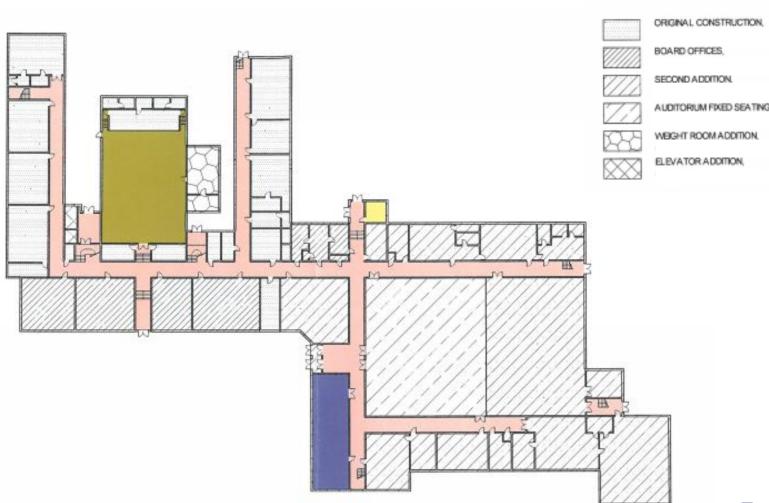
#### **Braden Middle School**





- Acres: 28.16 acres
- SF = 112,338 SF
- Original Construction: 1928
- Additions: 1939, 1947, 1990
- Enrollment: 429
- Grades: 6-8
- Building Capacity: 797 students

#### **Braden Middle School**





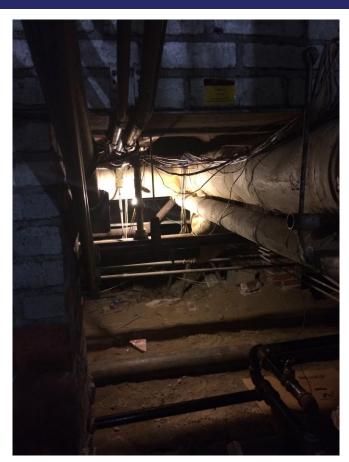
	<i>Item</i>	Rating	TMP 2008 Assessment with 2019 Cost Set		TDA April 2019 Assessment Validation Update	Delta:
A.	Heating System	3	\$3,931,830.00		\$3,931,830.00	\$0.00
B.	Roofing	3	\$657,499.60		\$777,986.20	\$120,486.60
C.	Ventilation / Air Conditioning	2	\$25,000.00		\$25,000.00	\$0.00
D.	Electrical Systems	3	\$1,935,233.04	П	\$1,823,245.74	(\$111,987.30)
E.	Plumbing and Fixtures	2	\$488,483.00	Ī	\$877,830.00	\$389,347.00
F.	Windows	3	\$790,160.00		\$790,160.00	\$0.00
G.	Structure: Foundation	1	\$0.00		\$25,000.00	\$25,000.00
H.	Structure: Walls and Chimneys	2	\$147,097.50		\$604,249.50	\$457,152.00
1.	Structure: Floors and Roofs	2	\$19,057.50		\$19,057.50	\$0.00
J.	General Finishes	3	\$2,949,588.10		\$4,083,491.04	\$1,133,902.94
K.	Interior Lighting	3	\$730,197.00		\$730,197.00	\$0.00
L.	Security Systems	3	\$207,825.30		\$532,501.30	\$324,676.00
	Emergency/Egress Lighting	2	\$112,338.00		\$112,338.00	\$0.00
N.	Fire Alarm	3	\$252,760.50		\$252,760.50	\$0.00
Ο.	Handicapped Access	3	\$385,817.60		\$818,317.60	\$432,500.00
P.	Site Condition	3	\$711,489.00		\$736,489.00	\$25,000.00
Q.	Sewage System	1	\$0.00		\$0.00	\$0.00
R.	Water Supply	2	\$500.00		\$500.00	\$0.00
S.	Exterior Doors	3	\$91,000.00		\$91,000.00	\$0.00
T.	Hazardous Material	3	\$50,420.00		\$50,420.00	\$0.00
	Life Safety	3	\$819,712.16		\$819,712.16	\$0.00
	Loose Furnishings	3	\$538,846.00		\$686,127.00	\$147,281.00
W.	Technology	2	\$1,011,042.00		\$1,011,042.00	\$0.00
	Subtotal:		\$15,855,896.30		\$18,799,254.54	\$2,943,358.24
X.	Construction Contingency / Non Construction Costs		\$3,873,643.03		\$4,592,714.28	\$719,071.25
	Total		\$19,729,539.33		\$23,391,968.82	\$3,662,429.49
Т	Total Cost (regional cost factor applied (104.88%)):		\$20,692,340.85		\$24,533,496.90	\$3,841,156.05

Cost to Replace Reno/Replace Ratio \$28,880,976.42 72% \$28,880,976.42 **85%** 

tda thendesign grichitecture



Reduced roof replacement – recent replacement in 1939 addition in 2018



Water penetration in crawlspace







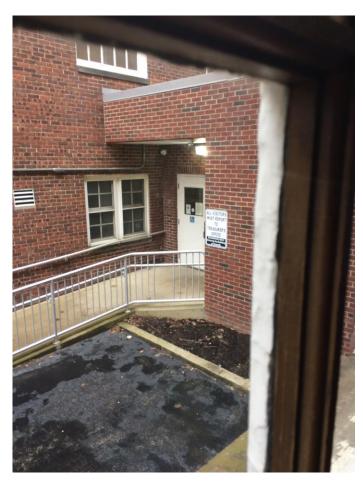
Plaster repairs/refinishing needed



Dated / worn auditorium finishes







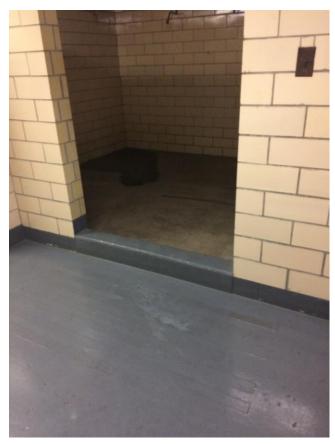
**ADA** entrance



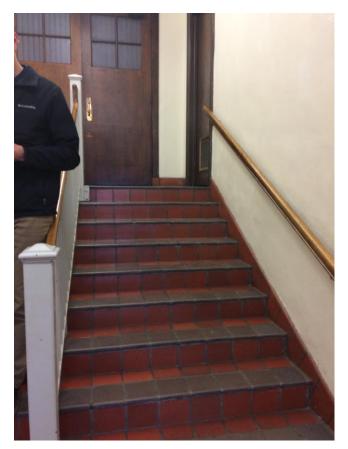
Removal of floor mounted urinals will require patching







ADA barrier in shower room



Stairs at gym entrance prohibit ADA access





### **Educational Adequacy**



SIZE









### Braden Middle School – Current Landscape







### Braden Middle School – Current Landscape







### Braden Middle School – Current Landscape







### Braden Middle School – Size & Flexibility



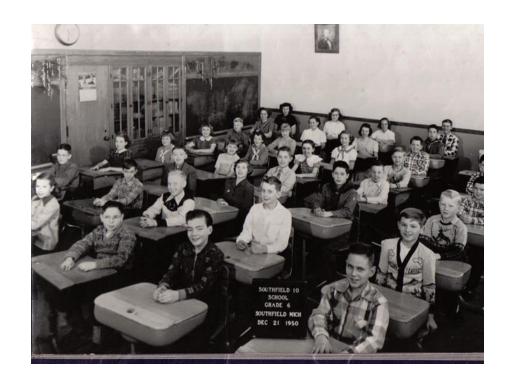
SIZE

and Flexibility

Student retention is 5% with a lecture format,

50% with a discussion format and

70% with a practice by doing format.

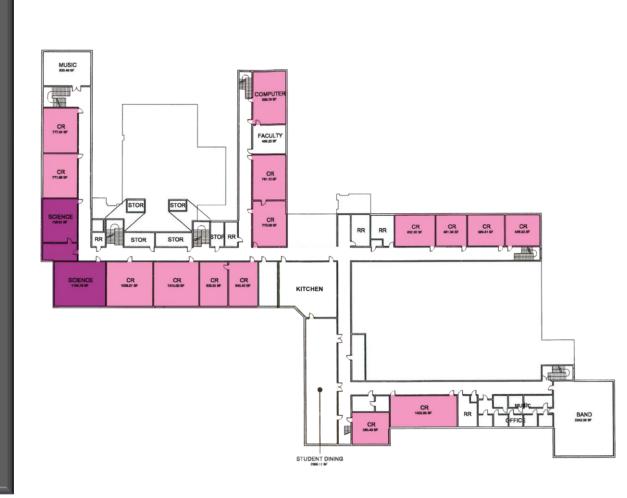






# Braden Middle School – Capacity & Space Study of Classrooms

- Average standardclassroom size is 800 SFslightly undersized
- Average classroom
   lacks flexibility between
   rooms they are static
- Lack of small group, remedial instruction, and teacher & student collaboration spaces
- Science Classrooms vary in size from 756-1145 SF compared to the 1,200 recommended by the OSDM

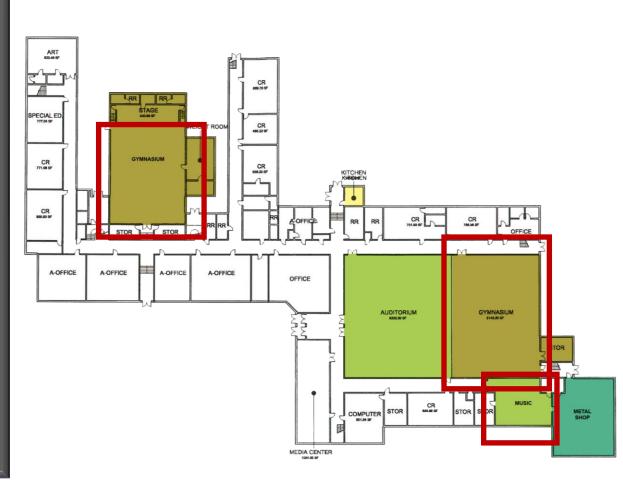


Second Floor Level



#### Braden Middle School – Capacity & Space Study – Large Group Space

- OSDM recommends a 7,000 SF
   gym. Our main gym is only 3,668
   SF, but the Aux. Gym is 5,145 SF
   and doubles as Aud. Stage
- The school features an auditorium which is an uncommon feature in a MS
- Former shop has been converted into a music room

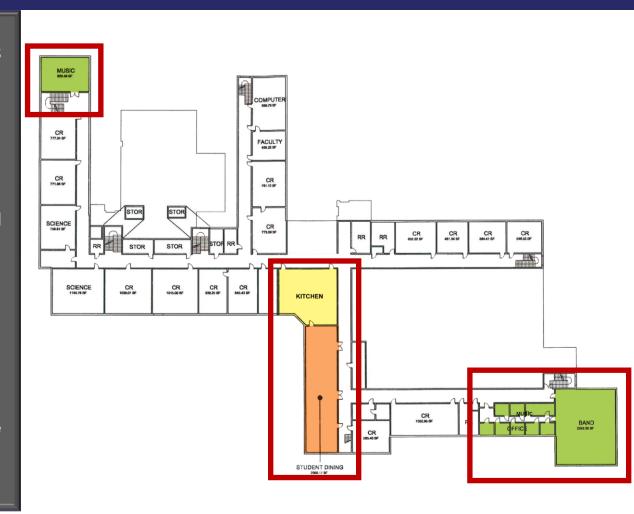


First Floor Level



# Braden Middle School – Capacity & Space Large Group Space

- OSDM recommends a 7,000 SF gym. Our main gym is only 3,668 SF, but the Aux. Gym is 5,145 SF and doubles as Aud. Stage
- The school features an auditorium which is an uncommon feature in a MS
- Former shop has been converted into a music room
- The kitchen and student dining are located on the 2<sup>nd</sup> floor – which is not ideal for deliveries
- Band and Music are on polar ends of the school, however, both are adequately sized for the enrollment (and additional band room located on 1st floor as well)



Second Floor Level



# Braden Middle School – Capacity & Space Study

	EXISTING SF	OFCC RECOMMENDED SF	DIFFERENCE
CLASSROOMS	avg 800	900	-100
MEDIA CENTER	1,584	1,502	-82
STUDENT DINING	2,000	3,000	-1,000
KITCHEN	1,697	1,502	+195
PRIM. GYMNASIUM	3,668	7,000	-3,332
AUX. GYMNASIUM	5,145	N/A	+5,145
SCIENCE	varies 756 - 1145	1,200	- 444 to -55



# Braden Middle School – Capacity & Space Study



"In one school district, students with the most daylighting in their classrooms progressed 20% faster on math tests and 26% faster on reading tests when compared to students in the least daylit classrooms."

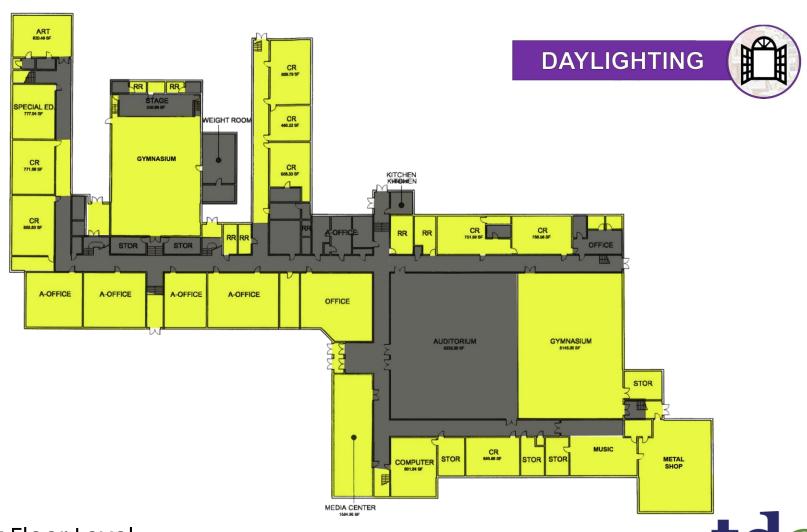
Daylighting in Schools: Improving Student Performance and Health at a Price Schools Can Afford, 2000

### DAYLIGHTING





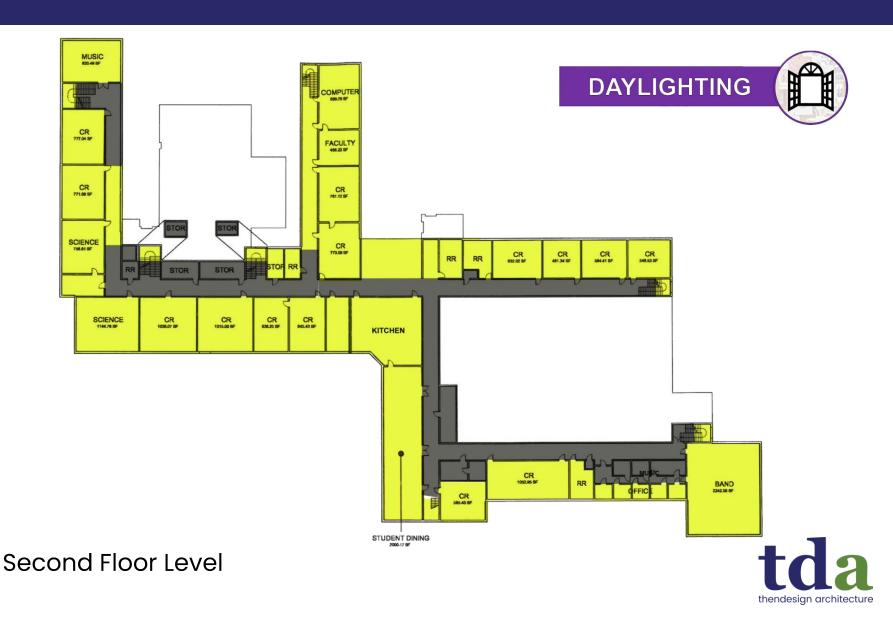
### Braden Middle School – Daylighting



thendesign architecture

First Floor Level

### Braden Middle School – Daylighting



#### Braden Middle School – Safety & Security

"Employing CPTED [Crime Prevention Through Environmental Design] concepts in new school construction and renovations can make substantial improvements, ranging from reconfiguring main entranceways to funnel visitors into the office to enhancing hallway supervision with improved line-of-sight, and reducing bullying by putting restroom sinks in a common area on the outer portion of the bathrooms so adults can better supervise kids washing their hands after using the facilities,"

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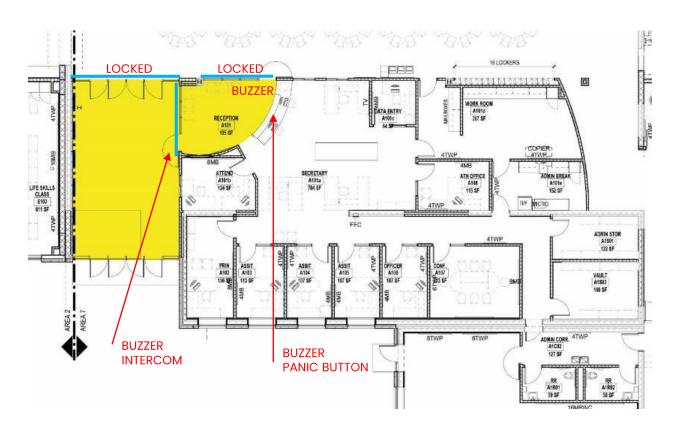






#### **PASSIVE DESIGN**

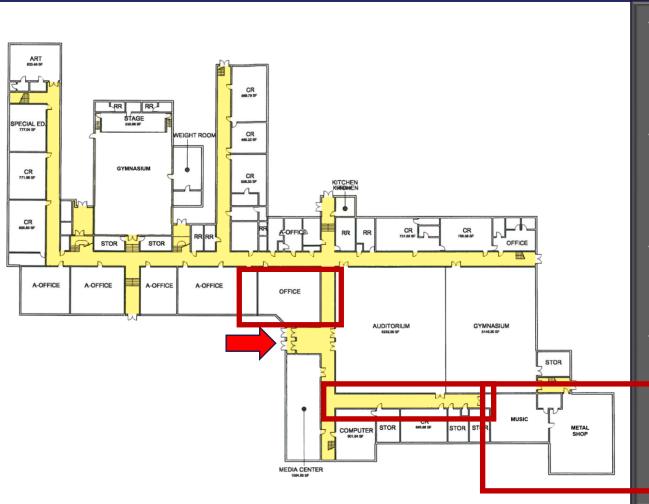
Secure entry vestibule



LAMINATED SECURITY GLAZING



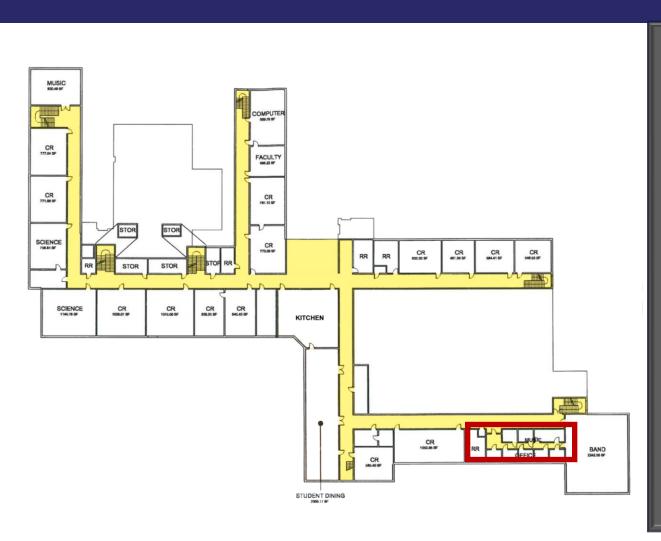
### Braden Middle School – Safety & Security



- Main office is adjacent to main entrance, but a secure vestibule is not present
- Corridors have a lot of twists and turns which can limit visual observation
- Dead end corridors are present on both first and second floors
- To gain access to the old metal shop from the inside of the building, you must pass through the music room



### Braden Middle School – Safety & Security



- Main office is adjacent to main entrance, but a secure vestibule is not present
- Corridors have a lot of twists and turns which can limit visual observation
- Dead end corridors are present on both first and second floors
- To gain access to the old metal shop from the inside of the building, you must pass through the music room



#### Braden Middle School – Site



#### Braden Middle School – Summary

- All major systems in the building require replacement due to age and condition. The buildings multiple levels and areas with a few steps in-between spaces make it very challenging to meet ADA
- The site has 28+ acres and is provided with greenspace that could accommodate new construction without impacting existing structures or fields
- Typical classrooms are slightly undersized compared to State standards. Many large group spaces are undersized as well, but the building sports a 690 seat auditorium plus 2 gyms.
- The school has a generous amount of daylight all teaching/learning spaces are provided with natural light.
- Corridors wind and bend this limits staff visual supervision. The facility lacks security/safety features in the restroom design to inhibit opportunities for bullying and there is no secure vestibule entrance for enhanced security control.

# Agenda

Planning Timeline & Recap

Guiding Principles & Word Cloud

Kingsville School Assessment & Educational Adequacy Study

Braden School Educational Adequacy Study

Next Steps / Questions



### Next Steps / Questions

- Set Next Meeting: December 2019
   Topic: Ridgeview ES Data, Jeopardy Game, Treasurer's Report
- January April 2020 Master Planning

\*Reminder: All information will be posted on the 'Facilities Master Planning' page on the School District website







