WESTPORT BOARD OF EDUCATION

FINANCE & FACILITIES COMMITTEE MEETING

PACKET

JUNE 2, 2022
11:00 AM

JUNE 2, 2022
11:00 AM

WESTPORT BOARD OF EDUCATION

FINANCE & FACILITIES COMMITTEE MEETING AGENDA*

(AGENDA SUBJECT TO MODIFICATION IN ACCORDANCE WITH LAW)

WORK SESSION/PLEDGE OF ALLEGIANCE
11:00 a.m., Westport Town Hall Auditorium

ANNOUNCEMENTS ON NON-AGENDA ITEMS

DISCUSSION/ACTION

A. Approval of Minutes
April 29, 2022

Attachment: FF Committee Minutes for April 29_ 2022.pdf

B. LLS Update

Attachment: Long Lots ES High-Low DRAFT Budget_8_ Escalation.pdf
Attachment: Long Lots ES High-Low DRAFT Budget_4_ Escalation.pdf
Attachment: 2022 0601 - Long Lots Draft Budgets and Schedule_draft.pdf
Attachment: Consigli Market Update - April 2022.pdf
Attachment: A.P. Construction 2022 1Q Const Cost Data.pdf
Attachment: Turner Market Conditions Report Q4 2021.pdf
Attachment: 2022-05-31 Long Lots Elementary School Assessment.pdf
Attachment: Westport Long Lots Macro Schedule 6-1-22.pdf

C. CES Update

D. Any Other Items Related to Finance or Facilities

ADJOURNMENT

The meeting can also be viewed on Cablevision channel 79; Frontier channel 6020, and by video stream @www.westportct.gov.

It is the policy of the Town of Westport that all Town-sponsored public meetings and events are accessible to people with disabilities. If you need assistance in participating in a meeting or event due to a disability as defined under the Americans with Disabilities Act, please contact Westport's ADA Coordinator at 203-341- 1043 or eflug@westportct.gov at least three (3) business days prior to the scheduled meeting or event to request an accommodation.

Meeting: April 29, 2022 **Westport Town Hall**

WESTPORT BOARD OF EDUCATION
WORK SESSION
FINANCE AND FACILITIES COMMITTEE MINUTES

Committee Members Present:
Liz Heyer, Committee Chair
Kevin Christie
Robert Harrington

Administrators Present:
Thomas Scarice, Superintendent of Schools
Elio Longo, Chief Financial Officer

PUBLIC SESSION: 9:36 a.m. Westport Town Hall Auditorium

ANNOUNCEMENTS ON NON-AGENDA ITEMS

DISCUSSION/ACTION

Liz Heyer moved to approve the minutes of March 18, 2022; seconded by Kevin Christie, with changes, and passed (3-0-0).

SES Roof Update

SHS Roof Update

LLS Update

CES Update

Capital Improvement Plan Management

Building Projects Status Update

Any Other Items Related to Finance or Facilities

ADJOURNMENT: Kevin Christie moved to adjourn at 10:40 a.m.; seconded by Robert Harrington and passed unanimously.

Respectfully submitted,

Liz Heyer, Chair, Board of Education Finance and Facilities Committee
(Minutes written by Jennifer Caputo)

PROJECT BUDGET

Colliers INTERNATIONAL
PROJECT LEADERS

Westport Public Schools

Long Lots Elementary School Replacement

DRAFT BUDGET FOR NEW LONG LOTS (WITH STEPPING STONES)

Date: **June 1, 2022**

	PROPOSED BUDGET (HIGH RANGE)	PROPOSED BUDGET (LOW RANGE)
8-Year High Enrollment	682	682
$(000) except $/GSF		
New Construction of K-5 Program, GSF	87,300	80,025
Stepping Stones, GSF (Based on Space Summary)	20,721	20,721
Total GSF	108,020	100,745
New Construction $/GSF - Current	$ 450.00	$ 400.00
Stepping Stone $/GSF - Current	$ 450.00	$ 400.00
New Construction $/GSF - Escalated	$ 589.10	$ 523.70
Stepping Stones, $/GSF - Escalated	$ 589.10	$ 523.70
Total Construction w/ site $/GSF	$ 184.47	$ 155.01
Total Project $/GSF	$ 946.55	$ 798.52
I. Building Construction		
A. New Building Construction	$ 39,284.8	$ 32,009.9
B. Stepping Stones Construction	$ 9,324.3	$ 8,288.3
C. Other Construction	$ -	$ -
Total Building Construction	48,609.1	40,298.2
II. Related Construction		
A. Sitework		
1 Earthwork / Site Prep	12,152.3	8,059.6
2 Exterior Improvements		
a. Paving - Asphalt / Concrete / Other	w/ Site prep	w/ Site prep
b. Sidewalks / Paths	w/ Site prep	w/ Site prep
c. Wetlands Mitigation	w/ Site prep	w/ Site prep
d. Landscape & Planting	w/ Site prep	w/ Site prep
e. Athletic / Recreational Surfaces	w/ Site prep	w/ Site prep
f. Fencing / Gates	w/ Site prep	w/ Site prep
g. Retaining Walls	w/ Site prep	w/ Site prep
h. Misc Site Improvements	w/ Site prep	w/ Site prep
B. Site Utility Systems		
1 Water & Wells	w/ Site prep	w/ Site prep
a. Fire Protection	w/ Site prep	w/ Site prep
2 Sanitary Sewage	w/ Site prep	w/ Site prep
3 Storm Drainage	w/ Site prep	w/ Site prep
4 Gas	w/ Site prep	w/ Site prep
5 Steam	w/ Site prep	w/ Site prep
6 Chilled Water	w/ Site prep	w/ Site prep
7 Electric	w/ Site prep	w/ Site prep
8 Data & Communications	w/ Site prep	w/ Site prep
9 Site Lighting	w/ Site prep	w/ Site prep
Total Site Construction	12,152.3	8,059.6
C. Building Demolition	2,700.0	2,160.0
D. Hazardous Materials Removal	w/ Bldg Demo	w/ Bldg Demo
E. Sustainable Elements		
1 Solar Panels / PV Array	Assume PPA	Assume PPA
2 Wind Power Generation	-	-
3 Geothermal Wells	1,000.0	-
4 Rain Garden	-	-
5 Waste Water Treatment Plants	City Sewer	City Sewer
F. GC / CM Mark-ups	w/ construction	w/ construction
Total Related Construction	15,852.3	10,219.6
Subtotal Construction - Current $	64,461.4	50,517.8
III. Escalation - Mid-point Construction (4th Qtr 2025)	19,927.0	15,616.6
Total Construction - Escalated	$ 84,388.4	$ 66,134.4
IV. Furniture, Fixtures & Equipment (FF&E)		
A. Loose Furnishings	1,227.6	1,091.2
B. Playgrounds (Assume 3 total)	850.0	700.0
C. Data / Telecomm Equipment	1,227.6	1,023.0
1. Cabling / Wall Jack / Devices	w/ construction	w/ construction
D. Audio/Visual Equipment	w/ Data	w/ Data
E. Security Equipment	w/ construction	w/ construction
1. Cabling / Wall Jack / Devices	w/ construction	w/ construction
F. Specialty Signage	100.0	50.0
Total FF & E	$ 3,405.2	$ 2,864.2

PROJECT BUDGET

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Date: **June 1, 2022**

		PROPOSED BUDGET (HIGH RANGE)	PROPOSED BUDGET (LOW RANGE)
8-Year High Enrollment		682	682
$(000) except $/GSF			
V.	**Fees and Expenses**		
A.	Fees		
1	Existing Conditions & Space Program	-	-
2	Architect	5,706.6	4,484.9
a	Civil Engineering	w/ architect	w/ architect
b	Landscape Architect	w/ architect	w/ architect
c	Structural Engineering	w/ architect	w/ architect
d	MEP/FP Engineering	w/ architect	w/ architect
e	Interior / Furniture Designer	w/ architect	w/ architect
f	Lighting Consultant	w/ architect	w/ architect
g	Acoustical Consultant	w/ architect	w/ architect
h	Signage Consultant	w/ architect	w/ architect
i	LEED Designer	w/ architect	w/ architect
j	Referendum Services	w/ architect	w/ architect
k	Code Consultant	w/ architect	w/ architect
l	Designer's Cost Estimator	w/ architect	w/ architect
3	Special Consultants		
a	Haz. Mat. Consultant	200.0	150.0
b	Audio / Visual	w/ architect	w/ architect
c	Technology / Security Systems Design	w/ architect	w/ architect
d	Geo-Tech Engineering	w/ architect	w/ architect
e	Traffic Engineer	w/ architect	w/ architect
f	Ecologist / Soil Sample	50.0	35.0
g	Peer Reviews	35.0	25.0
h	Green Building Consultant	w/ architect	w/ architect
i	Storm Water Monitoring	50.0	50.0
4	Project Management	850.0	700.0
5	Building Commissioning	115.0	100.0
6	Owner's Cost Estimator	w/ CM	w/ CM
7	CM Preconstruction Fee	175.0	150.0
8	Owner's Legal Fees	50.0	50.0
9	Site Survey	w/ architect	w/ architect
10	Utility Assessment	50.0	40.0
	Sub-total Fees	7,281.6	5,784.9
B.	Expenses		
1	Owner's Insurance	126.6	99.2
2	Permits	25.0	25.0
a.	Building	w/ Construction	w/ Construction
b.	Town / Site	-	-
3	Printing	15.0	15.0
4	Construction Utilities Use	w/ Construction	w/ Construction
5	Site Borings	w/ architect	w/ architect
6	Materials Testing	150.0	125.0
7	Special Inspections	25.0	20.0
8	Consultant Reimbursables	40.0	25.0
9	Moving / Relocation	100.0	75.0
10	Temporary Space / Operations	25.0	25.0
11	Advertising	20.0	20.0
12	Physical Plant Expenses	20.0	20.0
13	Misc. Expenses	15.0	26.0
14	Financing Costs / Bond Origination	TBD	TBD
15	Site Acquisition	NA	NA
a.	Real Estate Fees	-	-
b.	Closing Costs	-	-
	Sub-total Expenses	561.6	475.2
	Total Fees and Expenses	7,843.2	6,260.1
V.	**Contingency**		
A.	Construction	4,219.4	3,306.7
B.	Owner's Project	2,390.9	1,881.5
	Total Contingency	6,610.3	5,188.2
	Total Project	$ 102,247.1	$ 80,446.9
	Construction Cost vs. Total Project Cost	83%	82%
	Soft Cost vs. Total Project Cost	17%	18%

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New Construction of K-5 Program, GSF	87,300	80,025
Stepping Stones, GSF (Based on Space Summary)	20,721	20,721
Total GSF	108,020	100,745
New Construction $/GSF - Current	$ 450.00	$ 400.00
Stepping Stone $/GSF - Current	$ 450.00	$ 400.00
New Construction $/GSF - Escalated	$ 516.20	$ 458.90
Stepping Stones, $/GSF - Escalated	$ 516.20	$ 458.90
Total Construction w/ site $/GSF	$ 87.81	$ 73.78
Total Project $/GSF	$ 836.05	$ 705.66
I. Building Construction		
A. New Building Construction	$ 39,284.8	$ 32,009.9
B. Stepping Stones Construction	$ 9,324.3	$ 8,288.3
C. Other Construction	$ -	$ -
Total Building Construction	48,609.1	40,298.2
II. Related Construction		
A. Sitework		
1 Earthwork / Site Prep	12,152.3	8,059.6
2 Exterior Improvements		
a. Paving - Asphalt / Concrete / Other	w/ Site prep	w/ Site prep
b. Sidewalks / Paths	w/ Site prep	w/ Site prep
c. Wetlands Mitigation	w/ Site prep	w/ Site prep
d. Landscape & Planting	w/ Site prep	w/ Site prep
e. Athletic / Recreational Surfaces	w/ Site prep	w/ Site prep
f. Fencing / Gates	w/ Site prep	w/ Site prep
g. Retaining Walls	w/ Site prep	w/ Site prep
h. Misc Site Improvements	w/ Site prep	w/ Site prep
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a. Fire Protection	w/ Site prep	w/ Site prep
2 Sanitary Sewage	w/ Site prep	w/ Site prep
3 Storm Drainage	w/ Site prep	w/ Site prep
4 Gas	w/ Site prep	w/ Site prep
5 Steam	w/ Site prep	w/ Site prep
6 Chilled Water	w/ Site prep	w/ Site prep
7 Electric	w/ Site prep	w/ Site prep
8 Data & Communications	w/ Site prep	w/ Site prep
9 Site Lighting	w/ Site prep	w/ Site prep
Total Site Construction	12,152.3	8,059.6
C. Building Demolition	2,700.0	2,160.0
D. Hazardous Materials Removal	w/ Bldg Demo	w/ Bldg Demo
E. Sustainable Elements		
1 Solar Panels / PV Array	Assume PPA	Assume PPA
2 Wind Power Generation	-	-
3 Geothermal Wells	1,000.0	-
4 Rain Garden	-	-
5 Waste Water Treatment Plants	City Sewer	City Sewer
F. GC / CM Mark-ups	w/ construction	w/ construction
Total Related Construction	15,852.3	10,219.6
Subtotal Construction - Current $	64,461.4	50,517.8
III. Escalation - Mid-point Construction (4th Qtr 2025)	9,484.9	7,433.2
Total Construction - Escalated	$ 73,946.3	$ 57,951.0
IV. Furniture, Fixtures & Equipment (FF&E)		
A. Loose Furnishings	1,227.6	1,091.2
B. Playgrounds (Assume 3 total)	850.0	700.0
C. Data / Telecomm Equipment	1,227.6	1,023.0
1. Cabling / Wall Jack / Devices	w/ construction	w/ construction
D. Audio/Visual Equipment	w/ Data	w/ Data
E. Security Equipment	w/ construction	w/ construction
1. Cabling / Wall Jack / Devices	w/ construction	w/ construction
F. Specialty Signage	100.0	50.0
Total FF & E	$ 3,405.2	$ 2,864.2

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V.	**Fees and Expenses**		
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2	Architect	5,027.8	3,953.0
a	Civil Engineering	w/ architect	w/ architect
b	Landscape Architect	w/ architect	w/ architect
c	Structural Engineering	w/ architect	w/ architect
d	MEP/FP Engineering	w/ architect	w/ architect
e	Interior / Furniture Designer	w/ architect	w/ architect
f	Lighting Consultant	w/ architect	w/ architect
g	Acoustical Consultant	w/ architect	w/ architect
h	Signage Consultant	w/ architect	w/ architect
i	LEED Designer	w/ architect	w/ architect
j	Referendum Services	w/ architect	w/ architect
k	Code Consultant	w/ architect	w/ architect
l	Designer's Cost Estimator	w/ architect	w/ architect
3	Special Consultants		
a	Haz. Mat. Consultant	200.0	150.0
b	Audio / Visual	w/ architect	w/ architect
c	Technology / Security Systems Design	w/ architect	w/ architect
d	Geo-Tech Engineering	w/ architect	w/ architect
e	Traffic Engineer	w/ architect	w/ architect
f	Ecologist / Soil Sample	50.0	35.0
g	Peer Reviews	35.0	25.0
h	Green Building Consultant	w/ architect	w/ architect
i	Storm Water Monitoring	50.0	50.0
4	Project Management	850.0	700.0
5	Building Commissioning	115.0	100.0
6	Owner's Cost Estimator	w/ CM	w/ CM
7	CM Preconstruction Fee	175.0	150.0
8	Owner's Legal Fees	50.0	50.0
9	Site Survey	w/ architect	w/ architect
10	Utility Assessment	50.0	40.0
	Sub-total Fees	6,602.8	5,253.0
B.	Expenses		
1	Owner's Insurance	110.9	86.9
2	Permits	25.0	25.0
a.	Building	w/ Construction	w/ Construction
b.	Town / Site	-	-
3	Printing	15.0	15.0
4	Construction Utilities Use	w/ Construction	w/ Construction
5	Site Borings	w/ architect	w/ architect
6	Materials Testing	150.0	125.0
7	Special Inspections	25.0	20.0
8	Consultant Reimbursables	40.0	25.0
9	Moving / Relocation	100.0	75.0
10	Temporary Space / Operations	25.0	25.0
11	Advertising	20.0	20.0
12	Physical Plant Expenses	20.0	20.0
13	Misc. Expenses	15.0	26.0
14	Financing Costs / Bond Origination	TBD	TBD
15	Site Acquisition	NA	NA
a.	Real Estate Fees	-	-
b.	Closing Costs	-	-
	Sub-total Expenses	545.9	462.9
	Total Fees and Expenses	7,148.7	5,715.9
V.	**Contingency**		
A.	Construction	3,697.3	2,897.6
B.	Owner's Project	2,112.5	1,663.3
	Total Contingency	5,809.8	4,560.9
	Total Project	$ 90,310.0	$ 71,092.0
	Construction Cost vs. Total Project Cost	82%	82%
	Soft Cost vs. Total Project Cost	18%	18%

135 New Road
Madison, CT 06443

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Project Leaders

June 1, 2022

Mr. Thomas Scarice
Superintendent
Westport Public Schools
110 Myrtle Avenue
Westport, CT 06880

Subject: ***Long Lots Elementary School Replacement Recommendations and Considerations***

Dear Mr. Scarice:

Contained in this letter is Colliers Project Leaders early recommendations for the Long Lots Elementary School as well a draft schedule and draft high-low budget ranges for a proposed new school. These recommendations take into account many different factors as outlined below.

Based on our experience in multiple districts managing both renovation projects as well as new construction projects, as well as many factors of the existing building and site, Colliers recommendation to the district is to replace the existing facility with a new elementary school. We do so based on the specific criteria listed below.

- As noted in our letter to you dated January 13, 2022, the building envelope (walls, roofs, and slabs) and mechanical systems are severely compromised and past their useful life. Please refer to that letter for further details.
- The existing building layout was originally designed to serve as a middle school and has had multiple additions over its life span. As noted by the QA+M letter dated May 31, 2022, the existing footprint of the building is not programmatically appropriate for an elementary school.
- The existing site, based on preliminary test-fits developed by QA+M, indicates that we can construct a new 108,000 gross square foot school concurrently while the existing school remains in operation. Please note that operations of the school will most likely need to be modified to accommodate construction. We would recommend the use of a construction manager to facilitate proper phasing of the construction.
- Renovation of the facility is feasible however we suspect the renovations would be extensive in nature. We also suspect, based on our experience on past projects, that we would encounter many unforeseen conditions and conditions that are not in compliance with today's construction standards. These conditions would lead to numerous additional costs during construction that we cannot forecast until the building is being partially demolished.
- Renovation of schools, especially elementary schools, have a significant impact on the school operations. Occupied renovations require multiple phases, multiple moves, significant disruption and the need for both construction personnel and school occupants to be in the building at the same time, which is not ideal for elementary schools.

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- Occupied renovations will take longer due to the multiple phases and the need to find swing space within the building. We estimate that that a renovation project could take between 6 and 12 months longer than a new construction project. General conditions for the construction manager typically range from $60k to $80k per month. That's a total of $720k to $960k in additional general conditions costs alone.
- Abatement of hazardous materials in elementary schools while being occupied is very restricted by the Department of Public Health. Typically, abatement cannot occur while students are in the building for obvious safety reasons. In addition, we've found that this places additional stress and concern onto the parents, administration and teachers.
- With respect to constructing a new school, they can be programmatically designed to meet the educational needs of the district as well as be constructed to meet the space needs of the school.
- New schools allow the district to consider all the available building systems being used in schools today to allow not only maximum comfort but also maximum efficiency. Renovation of existing buildings typically restrict the type of systems that can be installed within the existing structure of the building thus limiting the districts choices for systems.
- New schools also allow the district to incorporate all the school safety requirements as needed without being limited by the physical structure and geometry of the building. Vehicular and pedestrian access can also be designed appropriately as well as the playground and other site amenities.
- Typically, with a renovation project, parts of the existing building remain but are not necessarily desirable in a like-new school. Construction of a new school eliminates this undesirable aspect.

Draft Project Budget for a New School

Enclosed for your consideration is a draft budget for construction of a new elementary school that would house grades K-5 as well as the Stepping Stones program. Please note that our draft budget estimates the size of the building based on the enrollment projections, but the final budget will be based upon the approved educational specification yet to be completed.

The low draft budget is approximately $80M and the high draft budget is $102M. The proposed size of the building ranges from 101,000 gross square feet to 108,000 gross square feet. We have assigned a range of $400 per square foot to $450 per square foot for the building only. Please note these values are based on bids received for a comparable new elementary school this past November. The budget includes the abatement and demolition of the existing school but this should be discussed further given considerations to future swing space for Coleytown Elementary School.

A major factor in budgeting projects presently is escalation. We are currently utilizing an eight percent escalation factor carried through the mid-point of construction which is fourth quarter of 2025. This value alone represents $15.6M on the low budget and $20M on the high budget. We have collaborated with some of the construction management firms in the state to confirm the escalation value. Unfortunately, we cannot predict if this will come back down to the rates we've been using over the recent years (4%).

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The draft budgets are total project budgets and also include FF&E (Furniture, Fixtures, and Equipment), Fees and Expenses (e.g., architect fees, hazmat consultant fees, owner's rep fees, commissioning agent, legal, permits, testing, moving fees, etc.) and owner's contingency. Please note we have not included financing costs for bonding of the project as we typically request those from the town financing department for inclusion in the budget.

Assuming a grant funding will be provided by the state, we estimate the district share to range from $73M to $93M. This assumes a 11.07% reimbursement rate (2022 rates), 5 % ineligible costs for the project, and a space standard reduction of approximately 85%. This reduction is an estimated reduction of the reimbursement rate based on the anticipated size of the building compared to the statutory space standard calculation. Such a reduction would reduce the reimbursement rate to 9.43%. This is subject to the final audit by the state.

Project Schedule

Enclosed for your consideration is a draft project schedule. Due to the long duration of the project, we anticipate that with a funding approval in spring of 2023, that the schools can be designed, constructed and occupied by fall of 2026. This assumes a 15-month design phase starting in July 2023 and a 15-month building period followed by miscellaneous site work to follow.

In the draft macro-schedule, we have outlined some of the major components of the pre-grant application and pre-funding approval process. Please note that this process is subject to change but based on our experience with multiple projects, this schedule appears to be fairly reasonable and achievable. It assumes a grant application would be submitted by June 30, 2023.

Next Steps

In order to meet the enclosed schedule, we recommend continuing the due diligence phase of the project with the preparation of preliminary geotechnical studies, a Phase 1 Environmental Site Assessment (required for the grant application), and development of educational specifications.

Should you have any questions regarding this letter and the attachments, please do not hesitate to call me directly.

Sincerely,

Accelerating success.

Colliers
Project Leaders

Charles E. Warrington, Jr., P.E.
Director, Project Management

Attachment – High Low Draft Budgets dated June 1, 2022, Draft Macro-Schedule dated June 1, 2022
cc: Mr. Elio Longo, Chief Financial Officer

Accelerating success.

CONSIGLI
Est. 1905

CONSIGLI MARKET UPDATE: APRIL 2022

Peter Capone, Director of Purchasing & Jared Lachapelle, VP of Pre-construction

The hopeful trend towards price stabilization and supply chain improvements in early 2022 is now complicated by new challenges. The war in Ukraine has reduced the supply of raw materials, port congestion from China to Los Angeles continues to delay shipments on all goods, while new COVID-19 variants have continued, leading to a **forecasted overall escalation of 7-9% in 2022**. But our industry has proven resilient. To support appropriate, proactive planning, we compiled the following information from our subcontractors and vendors across all of our regions, as well as trusted data from the industry.

CURRENT TRENDS

- **Product Availability -** Overall demand for materials will remain high with supply moderately low.
  - A recent Covid-19 outbreak in China is slowing chip manufacturing due to reduced labor resources.
  - The war in the Ukraine has reduced the supply of manufacturing materials such as aluminum, iron ore, nickel, and copper sourced from Ukraine and Russia. It has also put a strain on the production and delivery of materials manufactured throughout Europe, such as security glass from Germany. Normal shipping routes from Asia to Europe have been altered to avoid the war zone, which is adding time to deliveries.
  - Port congestion is showing little signs of improvement. West Coast ports appear to be improving, but this is primarily a cause of shipping vessels diverted to ports on the East Coast. Shipping analysts are reporting that a high volume of vessels are scheduled to depart from Asia within the next couple months which will further add to delays.
- **Pricing Challenges -** Contributing factors to the rising costs of construction pricing include the increased fuel prices raising the cost of production and transportation of materials, sanctions on Russia are affecting the commodity market by driving up prices of raw materials, and wage increases are increasing overall labor costs due to inflation.
- **Labor -** The construction industry continues to stay strong with no immediate signs of slowing. Acquiring workforce, the Northeast in particular, remains an area of concern. Currently, Boston union pipefitters, sheetmetal workers, and insulators are employing upwards of 480 travelers from other states on the east coast from as far as Florida. Many subcontractors, Union and Non-Union, are booking up to capacity for 2022 and focused on 2023 and beyond. These strong backlogs will challenge workforce availability and contunue to drive prices up.

MATERIAL LEAD TIMES

Material	4/1/2022 (fabrication after release)
Mechanical Equip. (Large) ⚠	8 - 11+ months
Mechanical Equip. (Small) ⚠	4 - 6 months
Electrical Equipment (Large) ⚠	11- 13 months
Electrical Equipment (Small) ⚠	4 - 6 months
Roof Materials & Insulation ⚠	6 - 8 months
Electrified Hardware ⚠	8 - 10 months
Elevators	6 months
Lab Casework	4 - 5 months
Steel Joist	3 months
Appliances	4 months
Steel Deck	3 months
Structural Steel	3 months

⚠ *Significant delays*

MATERIAL COST INCREASES

Critical Material	Expected Escalation 2022
Roofing Membranes & Insulation*	10 - 15%
Electrical Equipment	10 - 15%
Mechanical Equipment	8 - 12%
Ductile piping	15%
Lumber	5 - 10%
Gypsum Wall Board & Associated Materials*	5 - 10%
Aluminum	5 - 10%
Finish Door Hardware	3 - 5%
Structural Steel	5%
Copper Wiring/Cabling	5%

*Large manufacturers are not willing to take the risk of price escalation & are refusing to hold prices. As a result, subcontractors are being charged market increases at the time of delivery.

CONSIGLI MARKET UPDATE: APRIL 2022

CONSIGLI
Est. 1905

ITEMS TO WATCH

- **ILWU Contract Negotiations -** International Longshoreman Warehouse Union Contract Negotiation could further disrupt U.S. freight markets. Contract negotiations scheduled for July of this year will affect 22,000 long shoreman working at 79 ports of call.
- **Infrastructure Bill -** The incoming $1 billion, Federal Stimulus funding will place additional burden on the labor workforce. The Economic Development Administration (EDA) will ultimately award 20-30 regional coalitions across the 50 states between $25 and $100 million each to invest in the future of their regional economy. Something to keep an eye on for late 2022 and beyond.
- **Field Labor -** Approximately half of our larger subcontractors are noting that they have 85% of their backlog secured for 2022 and quickly filling for 2023. Understanding windows of availability will become extremely important in order to successfully staff projects with qualified subcontractors. Making it a priority to frequently discuss backlog with preferred subcontractors is recommended.

STRATEGIES FOR RISK MANAGEMENT

THOUGHTFUL PRE-QUALIFICATION.
Conduct pre-bid conversations with subcontractors to assess current capacities and increase the interest in upcoming bid opportunities early.

PRE-PURCHASE & STORE MATERIALS.
Identify high risk materials that should be pre-purchased early to avoid price increases. Negotiate off-site storage with suppliers or increase on-site storage areas. If necessary, consider leasing off-site storage facilities.

PRIORITIZE AND EXPEDITE APPROVALS.
Collaborate with the design team to identify materials that require expedited approvals due to long-lead times or volatile pricing. This will assist in early procurement of materials.

PARTNER THROUGH DESIGN-ASSIST.
Consider using design-assist trades to secure labor, materials, and a collaborative partner to work through current market risks early in the process.

SOURCE ALTERNATE SUPPLIERS.
Collaboratively work with design partners to broaden range of suitable manufacturers and products to insure on time deliveries.

LEVERAGE BUYING POWER.
Bulk purchase and package projects whenever possible to avoid costly piece-meal cost premiums and material delays.

BUY DOMESTIC.
Purchase materials manufactured in the United States to minimize supply chain delays.

MATERIAL DELIVERY VERIFICATION.
Focus on weekly on-site and off-site material verification utilizing technology and plant visits to ensure quality and schedule certainty.

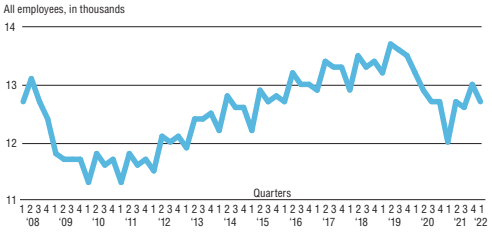
IDENTIFY PEAK MANPOWER.
Define schedule and workforce requirements with subcontractors to receive firm commitments to staff projects.

UTILIZE PRE-FABRICATION.
Identify opportunities to maximize pre-fabrication strategies to take labor off-site and lock in resources and materials earlier in the project.

Construction Cost Data

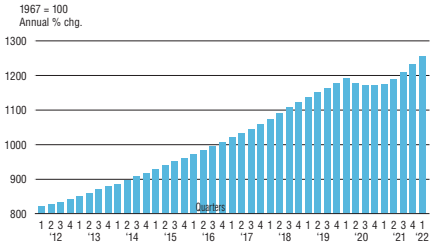
A.P. Construction Company

CT EMPLOYMENT: ARCHITECTURAL & ENGINEERING



Source: U.S. Bureau of Labor Statistics (Department of Labor)

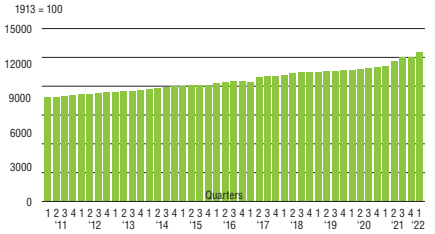
SELLING PRICE INDEX



Source: Turner Construction

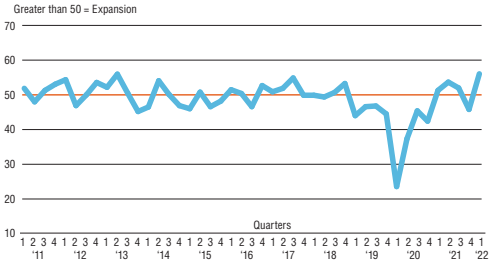
CONSTRUCTION COST INDEX

(Material & Labor)



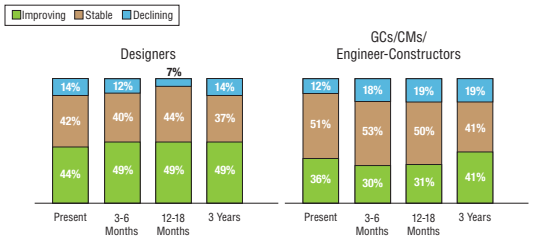
Source: ENR

ARCHITECTURAL BILLINGS INDEX – NORTHEAST REGION



Source: AIA

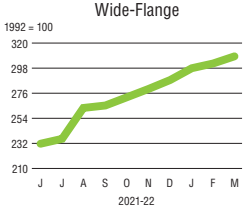
HOW DIFFERENT GROUPS VIEW THE MARKET



Source: ENR

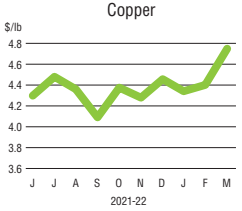
ENR'S MATERIALS PRICE INDICES

Wide-Flange



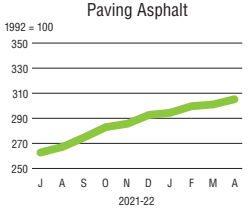
Monthly prices rose 1.8%, with annual escalation at 49%.

Copper



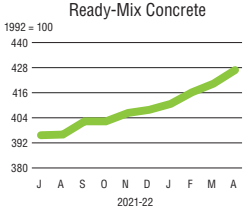
Source: TradeService.net

Paving Asphalt



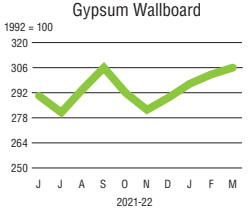
Asphalt prices rose 4.2% this month, while yearly prices are up 22.3%.

Ready-Mix Concrete



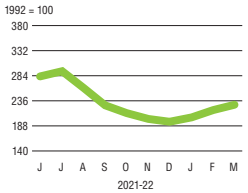
Ready-mix concrete prices increased 1.1% since last month.

Gypsum Wallboard



Monthly prices rose 1.2%, while yearly prices increased 10.8%.

Lumber



Monthly prices increased 4.1%, while yearly prices rose 18.9%.

Source: ENR, except where noted.

3/31/2022

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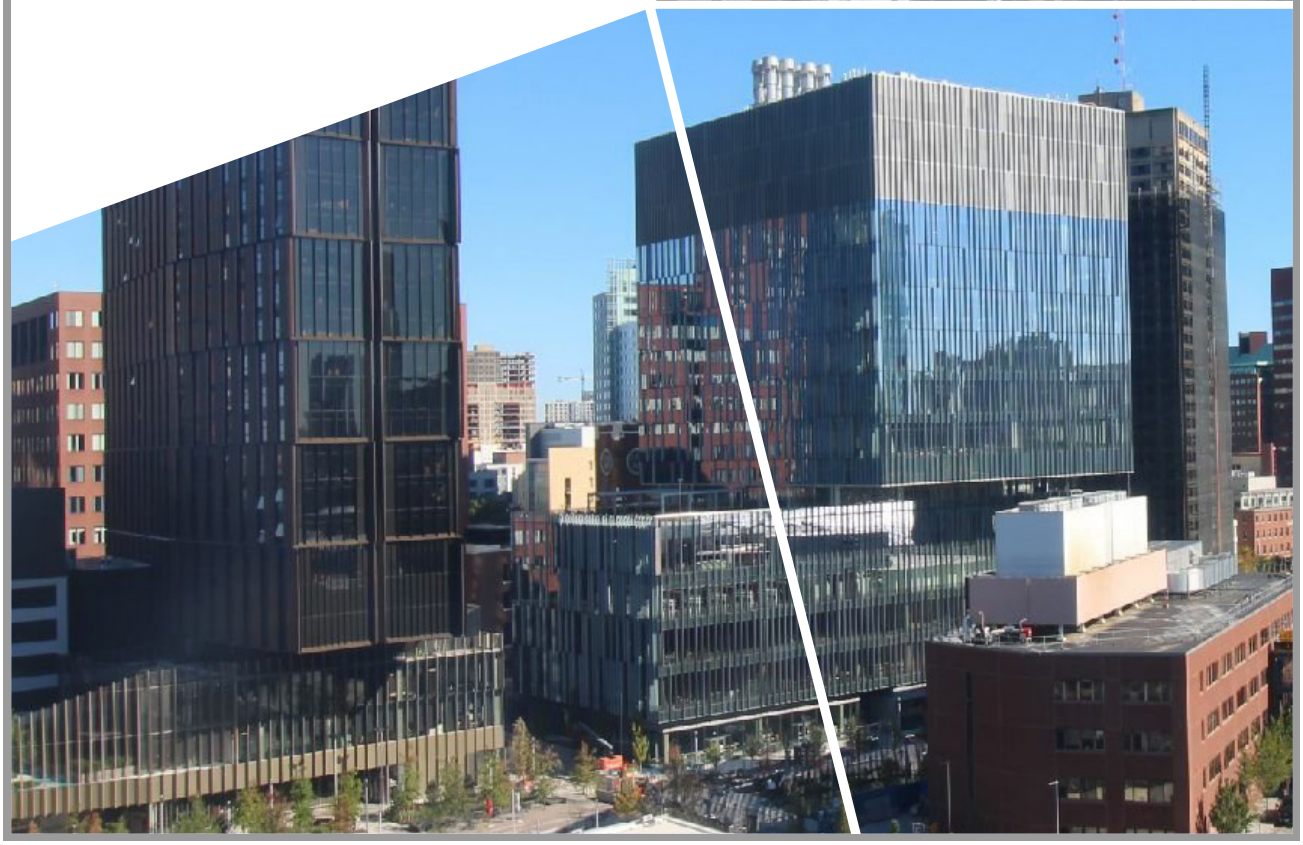
MARKET CONDITIONS

BOSTON Q4 2021

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EXECUTIVE SUMMARY

The second half of 2021 has continued the expansion of the market in the Greater Boston region. This expansion was lead by the lab science sector, both commercial and institutional. This expanding market, along with global and local supply chain and manufacturing challenges, has brought significant challenges to our industry. Further, continuation of the COVID-19 pandemic, variants, and subsequent vaccines have created additional uncertainty to how our industry will react in 2022 and beyond. These challenges and market conditions are described further in this report.

To gain the best possible insight on these conditions and how they impact our markets, we have collected data from owners, architects, trade partners, and equipment suppliers. To further help us understand the current and future climate, we studied job starts, anticipated projects in the future pipeline, material supply chains, and construction price indicators.

2021 had significant escalation in materials and construction pricing, with the market peak of these increases being in late Q3 /early Q4 this year. Although there has been some leveling on the commodities indexes as of late, the very busy subcontractor market currently bidding new projects and forecasted project starts suggest that higher than normal escalation will continue into 2022. The predictability of project schedules will also be challenging with material shortages. The amount of escalation will likely be driven by the number of project starts and the supply chain issues will likely persist with the delayed return to normal. The timeline of recovery will be driven by whether or not there is a tightening of capital driving less demand, and the continuing effect of COVID–19 on manufacturers.

NEW JOB STARTS - GREATER BOSTON

- In the Greater Boston Area, new job starts in 2021 returned to pre-pandemic levels. The largest volume of construction starts was recorded in 2019 and it will be rivaled by the totals from 2021 and very likely be surpassed in 2022. The new construction starts in 2021 have been driven mainly by the lab science sector. This sector has had a significant increase in its share of the market as compared to other sectors. This will continue in 2022, with the vacancy rate in lab / science properties at 0-1%.
- Other sectors that returned in 2021 were institutional and healthcare work. Though not as strong as pre-pandemic, universities and our local area hospitals had projects return to the pipeline, up from the low points in 2020. Office buildings were more modest compared to previous levels and hospitality and high-end residential remained very limited.

AIA ARCHITECTURAL BILLINGS INDEX (Northeast Region)

- As 2021 comes to a close, this year marks one of the most dramatic shifts for the architects business volume. During the 12-month period, a shift from the lowest levels recorded to the highest levels since 2006. This busy pace in the design shops further reinforces the rising volume projections for the construction market in 2022 and 2023.

SOURCEBLUE COST INDEX (formerly Turner Logistics)

- The SourceBlue, formerly Turner Logistics, equipment pricing index continued to show the highest level of escalation since the index was created. This now spans three full quarters of increase, driven by steel pricing, electrical component pricing, and shipping / delivery challenges.

EXECUTIVE SUMMARY

NATIONAL COST INDICES

- Producer Price Index (PPI- WPUID612) = 21.0% from 11/2020 to 11/2021. This number reflects the intermediate demand by commodity type - materials and components for construction. While Lumber has leveled after a very steep increase, steel, aluminum and other building materials have historically high price increases.
- Consumer Price Index (CPI) = 6.8% from 11/2020 to 11/2021. This documents the steepest increase and highest levels of the CPI in the last 13 years.
- Turner's National Cost Index is reporting a national escalation of 1.68% for Q3 of 2021, up from 1.28% in Q2 of 2021. This documents two quarters of significant increase nationally. A pace that would exceed 6% annually.

LOCAL SUBCONTRACTOR SURVEY Q2

- Over the past six months, the subcontractor market spent energy trying to secure backlog for 2022. Many of their estimating departments have gotten busier and they are seeing more project starts than they saw the first half of 2021. A number of them were successful in landing work and are now being selective with choosing the jobs they want. They will do this to fill dips in their backlog and to hold onto their company workers in anticipation for increased workload in 2023.
- The subcontractor market continued to see major increases in materials pricing, as well as impact to lead times. Many that were absorbing these increases in the first half of 2021 are less likely to do so now. Instead, they are passing these increases along without adjusting their OH&P down.
- A few of the trades believe we will continue to see increases in some materials attributed to issues with the supply chain. However, the majority have stated that the major increases have slowed back to historical escalation and have seen some dips in materials costs. We believe the subcontractors will be looking to pass along the material costs and will be qualifying any concerns over availability of certain materials in their proposals.
- Regarding labor availability, many of the union forces are close to 100% working, with not many workers left on the bench. There are a few union agreements that will expire this year and we expect their deals to be similar to the deals finished with the pipefitters and Allied trades earlier this year. As more work is released, we expect that additional travelers will enter the market and that there will be impact to the productivity impacting the way the market prices certain projects.

LOCAL ESCALATION

- The high escalation we saw in 2021 was due to the impacts of the COVID-19 pandemic on materials and supply chain challenges. We project that the supply chain challenges will continue and the escalation for 2022 will remain high. We will keep an eye on the number of project starts, as this will determine how escalation will change.


Massachusetts General Hospital, Cambridge Street Project
Boston, MA

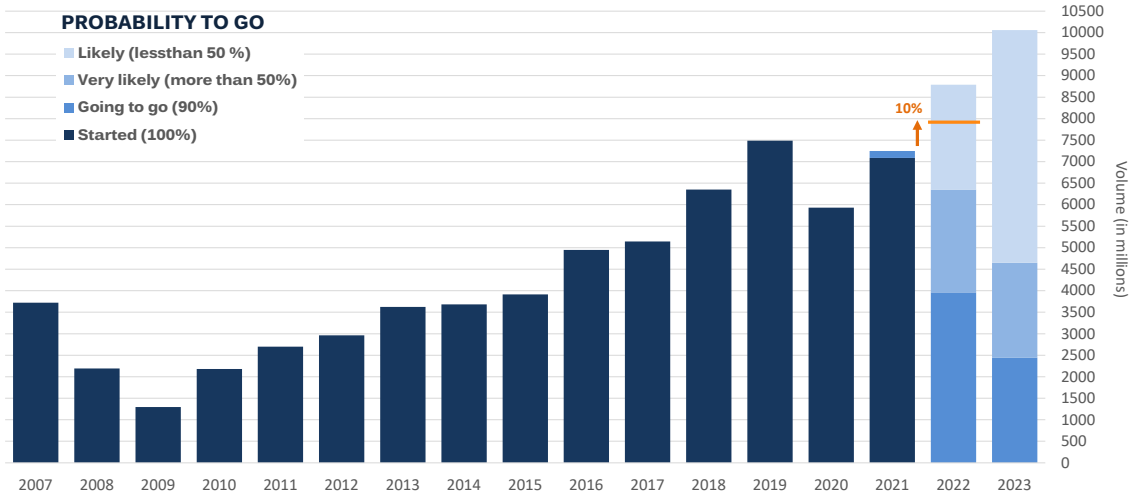
NEW JOB STARTS

The Greater Boston Area

Q4 2021

Project-Specific Study

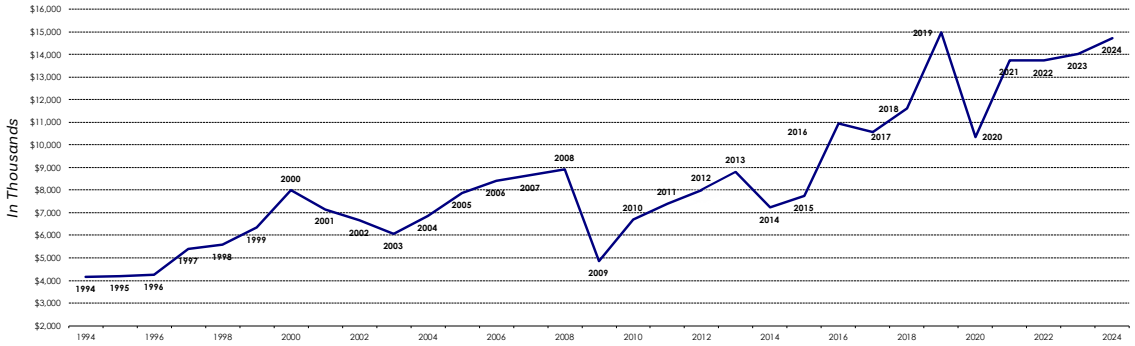
The onset of the COVID-19 pandemic stalled many construction starts in 2020. In 2021, we saw development fears subside as project starts nearly reached 2019's total. Our regional market has been bolstered by investment in life sciences. With many projects returning from the sideline and a healthy pipeline ahead of us, we see construction starts for the Greater Boston Area returning to pre-pandemic levels.



Dodge Study

Q3 2021

Regional Study (MA, NH, ME, RI)



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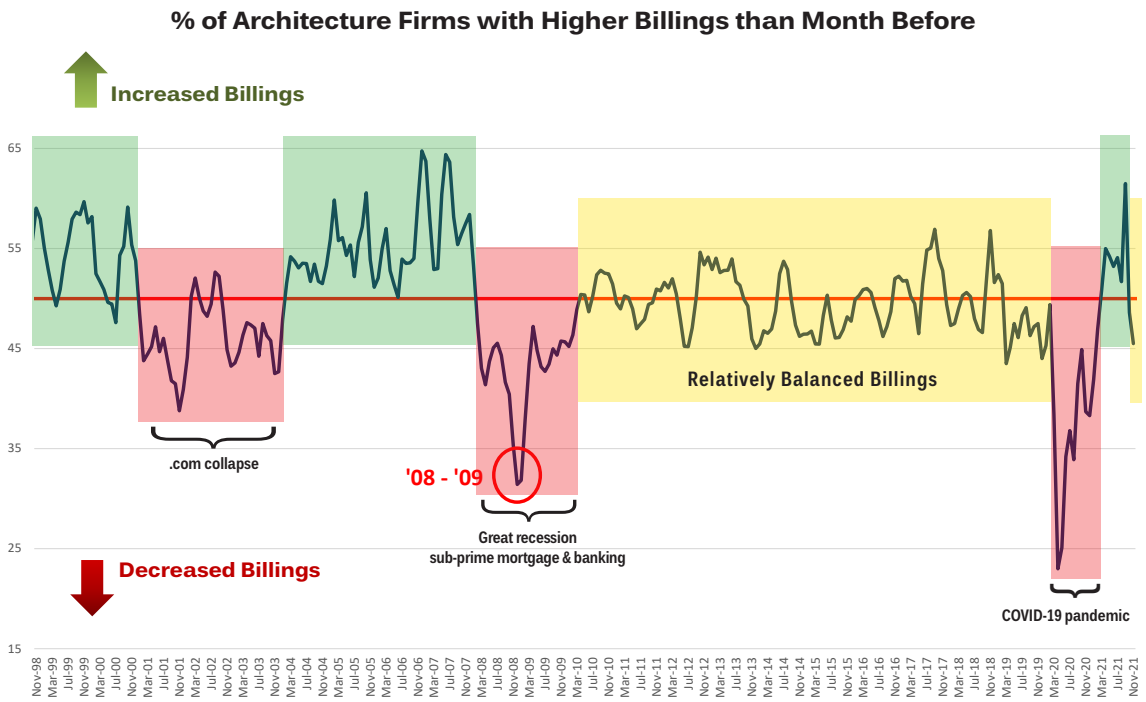
Boston Properties, 325 Main Street
Cambridge, MA

ARCHITECTURAL BILLINGS INDEX

Northeast Region

AIA November 2021

The business volume for architectural services and engineering services has increased significantly in 2021. From historic industry low points in 2020 the increase has been dramatic. This dramatic increase will likely settle into a steady pattern of continued project designs. This is both depicted by the chart below, and from feedback from our local design partners. This design business volume is a significant leading indicator to a busy and well funded construction market. It backs up our project by project construction volume study on the previous pages.



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WS Development, L4 Tower
Boston, MA

SOURCEBLUE COST INDEX
(FORMERLY TURNER LOGISTICS)

SourceBlue is increasing its 2021 Cost Index from 155 to 157. This represents an increase of +7.5% in equipment pricing over 2020.

MEP equipment manufacturers continue to publish price increases. Some recent announcements have been in the +10% to +15% range. Factors contributing to this increase are due to the continued elevated demand from the large data center market segment, significant increases in raw material costs (most notably steel, copper, aluminum, and petroleum products), and increased pricing for global transportation and freight.

Lead times for electrical and mechanical equipment continue to increase across most product lines. Supply chain issues and component shortages are largely responsible for manufacturing delays and missed delivery commitments. HVAC equipment manufacturers are reporting significant production delays due to long lead times of both plastic and stainless steel piping, motor, ECM fans, and PLC components. Similarly, electrical distribution equipment manufacturers and generator manufacturers are extending lead times and quoting price increases due to alternator, microchip (touch panels, displays, amplifiers, microphones), and lug shortages. Light fixture manufacturers are beginning to indicate delays in components from China, particularly drivers. Battery manufacturers are quoting longer lead times from China – lithium ion batteries manufactured in Japan currently have slightly better lead times. Electrical and mechanical equipment field technicians for on-site services such as equipment start-up continue to be in short supply, and we have seen increases in daily rates for these services. On site resources required for complex projects should be secured and scheduled as early as practical.

Year to date industry data for 2021 versus the same time period in 2020 shows electrical equipment orders decreased (-3.3%) and shipments also decreased (-2.3%). For the same time period, mechanical equipment orders increased (+14.7%) and shipments increased (+11.1%).

We will continue to provide updates on price increases and any significant supply chain information as it becomes available.

SourceBlue **Q3 2021**

Estimated Equipment Lead Times
(Varies due to Equipment Sizing)

	Previous Report	Current Report
Cooling Towers	10 - 14 wks	10 - 18 wks
Chillers	20 - 30 wks	16 - 28 wks
Air Handling Units	14 - 42 wks	14 - 45 wks
Generators	18 - 46 wks	19 - 40 wks
Switchgear	14 - 32 wks	20 - 52 wks
Uninterruptible Power Supply	14 - 22 wks	16 - 20 wks

Year	Avg. Index	% Change
2021 (Projected)	157	↑ 7.5%
2020 (Corrected)	146	↑ 2.8%
2019 (Corrected)	142	↑ 3.0%
2018 (Corrected)	138	↑ 3.8%
2017 (Corrected)	133	↑ 3.0%
2016 (Corrected)	129	↑ 1.5%
2015 (Corrected)	127	↑ 1.0%
2014 (Corrected)	126	↑ 2.0%
2013 (Corrected)	124	↑ 2.5%
2012 (Corrected)	121	↓ 3.5%
2011 (Corrected)	117	↓ 2.5%
2010 (Corrected)	114	4.5%
2004	100	Base Year

This index is created using the average content of mechanical and electrical equipment on a new construction project. This index does not necessarily conform to other published indices. Historic records and interpretations of the national index for local market conditions may be obtained by contacting Torry Guardino, tguardino@sourceblue.com or by phone (201) 722-3809.


MassMutual
The Fallon Company, Fan Pier E | MassMutual
Boston, MA

TURNER NATIONAL COST INDICES

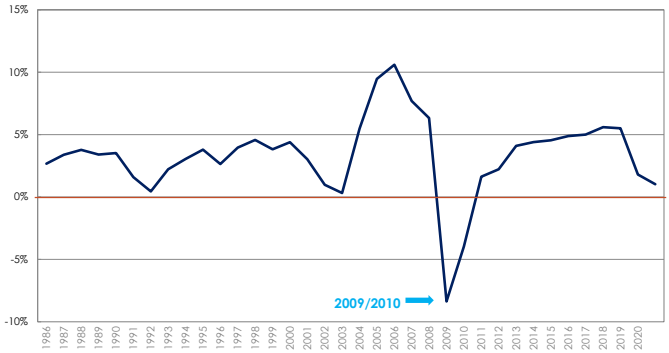
Turner National Report

Q3 2021

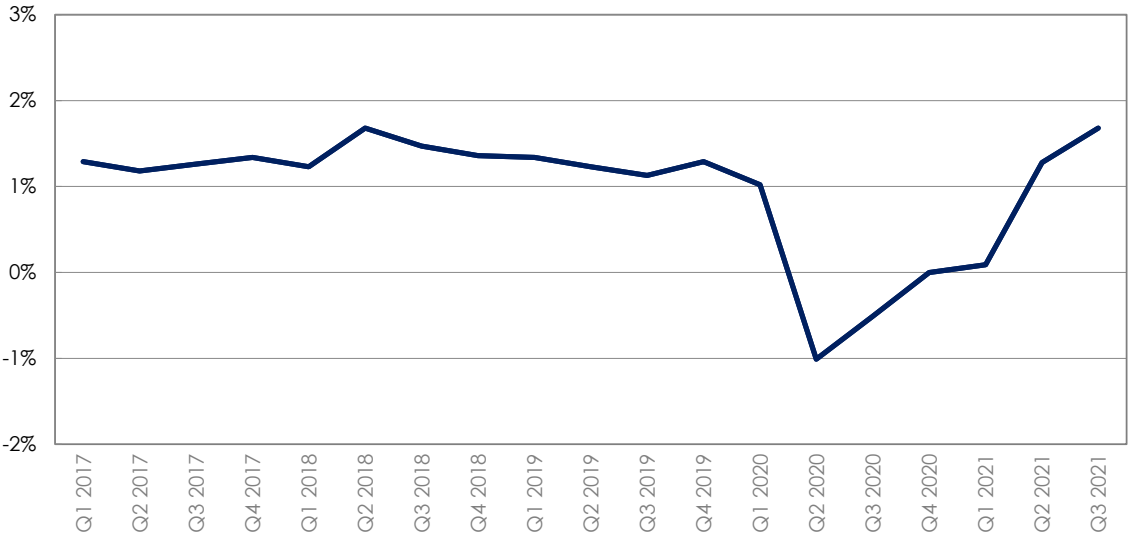
Percent Change in Commercial Vertical Construction

Quarter	Cost Index	Δ %
3rd Quarter 2021	**1207**	**1.68**
2nd Quarter 2021	1187	1.28
1st Quarter 2021	1172	0.09
4th Quarter 2020	1171	0.00
Total for last four quarters		**3.05**

Year Average % Change in Commercial Vertical Construction Cost



Quarterly Average % Change in Commercial Vertical Construction Cost



For a complete Cost Index Report please go to: **www.turnerconstruction.com/cost-index**

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TURNER LOCAL SUBCONTRACTOR SURVEY

Q4 2021

Trade	Trending Escalation	Cost Drivers
Earthwork & Foundations	**5-7%**	Material: **10%** Labor Rates: **3-4%** Aggressiveness to Bid: Less — More (◆ right) Estimating Activity: Slow — Busy (◆ right)
Concrete	**8-10%**	Material: **8-12%** Labor Rates: **3-4%** Aggressiveness to Bid: Less — More (◆ center) Estimating Activity: Slow — Busy (◆ right)
Structural Steel	**6-8%**	Material: **10%** Labor Rates: **2-3%** Aggressiveness to Bid: Less — More (◆ center) Estimating Activity: Slow — Busy (◆ right)
Glass & Glazing / Curtainwall	**5-7%**	Material: **5-10%** Labor Rates: **2-3%** Aggressiveness to Bid: Less — More (◆ right) Estimating Activity: Slow — Busy (◆ center)
Drywall / Exterior Framing	**6-8%**	Material: **5-10%** Labor Rates: **2-3%** Aggressiveness to Bid: Less — More (◆ center) Estimating Activity: Slow — Busy (◆ center)
Elevators	**4-6%**	Material: **5%** Labor Rates: **3-4%** Aggressiveness to Bid: Less — More (◆ right) Estimating Activity: Slow — Busy (◆ right)
Mechanical (HVAC, P, FP)	**10-15%**	Material: **10-15%** Labor Rates: **4-5%** Aggressiveness to Bid: Less — More (◆ center) Estimating Activity: Slow — Busy (◆ right)
Electrical	**7-9%**	Material: **10+%** Labor Rates: **2-3%** Aggressiveness to Bid: Less — More (◆ center) Estimating Activity: Slow — Busy (◆ center)

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TURNER LOCAL SUBCONTRACTOR SURVEY

Q4 2021

Cost Drivers (more details)

In 2021, the Earthwork trade saw pricing increases in PVC pipe, ductile pipe, sheeting, and other steel products. Many of these items doubled in price over the past 12 months. Steel sheeting lead times vary depending on roll dates and availability. On many jobs we are looking to obtain design information early in order to pre-purchase the sheet prior to an earthwork award. Earthwork subcontractors anticipate additional increases of around 10% in 2022 in cost of ductile and PVC products. As the operating engineers and laborers union agreements expire this year, we believe they will be looking to get increases similar to the Allied Trades and MEP trade agreements. Estimating departments are steady and they are looking to secure additional backlog in 2022 and into 2023.

While there have been sizable material price increases to rebar, lumber, and accessories over the course of 2021, subcontractors are reporting that material pricing has begun to stabilize over the past month. Bidders are rolling potential material escalation into their bids, but are not changing their OH&P drastically to be more aggressive. Estimating departments are busy, but not overwhelmed, and are picking favorable jobs to go after. Bidders are pursuing work mostly for the second half of 2022 and into 2023. Currently, the expectation is that material pricing will continue to level out, with only a few confirmed price increases already relayed from vendors. Lead times have mostly stabilized, with some subcontractors noting long leads for larger orders of wire mesh products.

We saw increases in steel products over the past 6 months, however not as substantial as the increases we saw from the end of 2020 to the middle of 2021. The backlog for both fabricators and erectors is close to booked for work requiring steel on the job in 2022. Employment is between 90% and 100%, with only a few iron workers on the bench and erectors are holding onto company guys. They are expecting they will be able to maintain good productivity with their current crews on upcoming work. More aggressive pricing will be focused on projects that require fabrication of materials in late 2022 and a start in the field in the middle of 2023 and later.

In 2021, we saw cost increases of roughly 10% for glass and 20-30% for steel and aluminum. Over the past few months, metals have held steady, but other costs (transportation & costs to convert raw metals into steel/alum shapes) have continued to increase. The curtainwall trade should be procured 18-24 months prior to product needed on site, as lead times for custom extrusions, paint, and glass continue to rise. Subcontractors do not see issues with labor availability and productivity on projects in 2022. For a number of curtainwall subcontractors, estimating departments are steady and have the ability to bid on more work. A number of the fabricators are looking for additional backlog and will be pricing certain projects aggressively.

Drywall contractors saw 10-20% increases in GWB every few months, 20% increases for metal stud every month for the past 6 months, and a cumulative increase of 30-40% for mud, batt insulation, and mineral wool. More standard increases are anticipated over the next 6 months, as contractors are seeing the start of a leveling off going into 2022. Lead times have fluctuated in both directions, some showing a trend towards normalcy. Some products remain harder to get as the housing market has a high demand for drywall and mineral wool. Fluctuations in material pricing have resulted in a more conservative approach to bidding in the short-term, but for real opportunities, bidders are attempting to off-set by reducing labor and overhead in order to remain competitive. We may be trending towards normalcy, but bidders are wary of conditions sliding back due to logistics and the evolving COVID situation.

While the elevator trade has seen some supply chain disruptions for materials, the factories have been able to react accordingly to avoid any impacting lead time increase. However, the high-rise traction elevator equipment out of China has a current lead time of 30 weeks. For our region, overseas equipment has been shipping to east coast ports, avoiding disruption on those products. Pricing and lead times are expected to remain stable over the next 6 months, but a labor contract renewal starting in Q3 of 2022 has not yet been finalized. The labor pool is fully employed and many significant projects are currently booked, but larger elevator contractors are aggressively bidding while smaller ones have consistent backlog and are more selective for the short term.

In 2021, we saw overall HVAC/Plumbing/FP escalation approaching 20-25%, led mainly by a cost increase in and scarcity for materials. As we head into 2022, most subcontractors are in agreement that as demand remains strong, future escalation will be in the range of 10-15%, influenced mainly by supply chain issues, labor shortages, and increase in profit margins. We expect continued escalation for equipment to be around 20-30% for 2022, and expect lead times for all equipment to continue to rise for all of 2022 until all vendors are 3x pre-pandemic lead time durations. Pipe fitters and plumbers union halls are currently operating at close to 100%. In 2023, we expect to see increased labor costs due to a decrease in productivity.

Substantial pricing increases were seen in 2021; equipment (generators, gear, switchboards), light fixtures/controls/components increased 15-25%, while steel pipe/fittings, wire, boxes, and fittings saw 60-65%. PVC products saw the most significant increase, more than doubling in price the past 12 months. Estimating departments remain busy and most have work for 2022 and are looking to fill backlog on projects for 2023 and 2024. With the Local 103 hall close to empty, they are looking to win work to hold onto their company workers in preparation for the increase in volume expected in 2023 and beyond. By maintaining their company workers they believe they can maintain the current productivity and continue to provide competitive pricing. A major concern is the long lead times on equipment, as well as products from overseas (Chinese components), as the shipping and transportation timeline remains unstable.

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TURNER CONSTRUCTION MARKET LEAD TIME STUDY

No delays to <2 weeks | 2 to 4 week delays | 4+ weeks of delay

Q4 2021

Item Description	Typical Lead Time	Current Lead Time
CONCRETE		
Wood Materials	1 week	1-2 weeks
Wire Mesh Products	2 weeks	2-3 months
Formwork Accessories	1 week	2-3 weeks
Stud Rails	3-5 weeks	5-8 weeks
Reinforcing Material	5 days	15 days
Post Tension Material	3-5 weeks	5-8 weeks
Cement	1 week	1 week
STRUCTURAL STEEL		
Decking	16 weeks	26-32 weeks
Small Joists	16 weeks	40-50 weeks
Large Joists	16 weeks	50 weeks
W-Sections (fab'd)	5 - 6 months	7-8 months
Steel Plate	4 - 6 weeks	10 - 26 weeks
EARTHWORK & SPECIAL FOUNDATIONS		
Steel Sheeting (Domestic)	1-2 weeks	cold rolled: 8-10 weeks | hot rolled: 26-28 weeks
Steel Sheeting (Overseas)	12 weeks	cold rolled: 8-16 weeks | hot rolled: 26-28 weeks
Ductile Iron Pipe/Fittings	1 week	8-16 weeks
Plastic Conduit/Pipe	1 week	12-16 weeks
ADS (HDPE Pipe)	1 week	8-16 weeks
Precast	1-2 weeks	2-4 weeks
Casting (Frame & Covers)	2-3 weeks	4-8 weeks (except for Handhole covers - maybe several months)
ROOFING		
Insulation	4-6 weeks	8-9 months
TPO Membrane	1-2 weeks	2-3 months
EPDM Membrane	2-3 weeks	3 months
PVC Membrane	2-3 weeks	3 months
Adhesives	1-2 weeks	2-3 months+
Fasteners	1-2 weeks	6 months
DOORS, FRAMES & HW		
Stile and Rail Wood doors	3-6 weeks	14-18 weeks
Flush Wood Doors	4-6 weeks	15-16 weeks
Residential Grade Doors and Prehungs	7-9 weeks	up to 22 weeks
Hollow Metal Frames	4-5 weeks	19 weeks
Finish Hardware	5-6 weeks	8-10 weeks
EXTERIOR WALL & INTERIOR GLASS		
Aluminum Extrusions	10-12 weeks	18-30+ weeks
Glass	12-16 weeks	16-18 weeks
Laminated Glass	3 weeks	7 weeks
Mineral Wool	2-3 weeks	30 weeks
Steel Shapes & Coil	4 weeks	18-20 weeks
PVC Extrusions	10-12 weeks	16-18 weeks
Silicon Gaskets	6 weeks	10-12 weeks
Cladding (Alum Plate + Sheet)	4-6 weeks	10-12 weeks
Silicon, Hardware, General	4-6 weeks	8-10 weeks
Paint	2-3 weeks	10-12 weeks

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Item Description	Typical Lead Time	Current Lead Time
GWB / ACT		
Paint & Caulking	1 - 3 days	2 - 3 weeks
Drywall	1 week	4 weeks
Mud	2-5 days	4 weeks
Wood	2-4 weeks	2-4 weeks
Metal Studs	1 week	4 weeks
Batt Insualtion	1-2 weeks	4 weeks
Ceiling Grid & Ceiling Tiles	2-4 weeks	2-4 weeks
Specialty Products - Metal Tiles, Linear Metal, Wood Ceilings	12 weeks	18 weeks
SPECIALTIES		
Toilet Partitions	4 weeks	4 weeks
Accessories	4 weeks or Less	4 weeks or Less
Shades	3-4 weeks	3-4 weeks
Fire Extinguishers	1-2 weeks	1-2 weeks
Operable Partitions (Corbin Hufcor)	8 -10 weeks	12 - 16 weeks
Appliances	2 - 4 weeks	10- 12 weeks
Metal Based Products (Handrails, wall protection)	3-4 weeks	6-8 weeks
Shade Pockets	3-4 weeks	6-8 weeks
Lockers	8-10 weeks	12-16 weeks
Access Flooring (with finished floor)	5 - 6 weeks	16 weeks+
ELEVATORS		
MRLs	14-16 weeks	16-24 weeks
High Speed	24-28 weeks	24-34 weeks
Low Rise	12-14 weeks	14-16 weeks
PIPE & FITTINGS		
Copper Pipe & Fittings	1-2 weeks	Depends on size can be 4-weeks
Steel Pipe & Fittings	1-2 weeks	4 weeks
PVC Pipe	1-2 weeks	6-8 weeks
HVAC EQUIPMENT		
AHU's (custom)	16-20 weeks	48-52 weeks
Pumps	6-8 weeks	12-14 weeks
Valves	1-2 weeks	8 weeks
Major Equipment (Chillers, Boilers, etc...)	8-10 weeks	20 weeks
PLUMBING FIXTURES & EQUIPMENT		
Plumbing Fixtures / Specialty Valves	6-8 weeks	20 weeks with imports extended
Water Heaters	2-4 weeks	20 weeks
Drainage Pumps / Ejectors	10-12 weeks	20 weeks
Fiberglass/ Acrylic Showers	10-12 weeks	18-20 weeks
Kohler Toilets (fancy / residential)	6-8 weeks	15-20 weeks
Touchless Faucets & Flush Valves	6-8 weeks	20 weeks
FIRE PROTECTION & EQUIPMENT		
Fire Pump	8-12 weeks	16-20 weeks
Steel Pipe & Fittings	1-2 weeks	2-4 weeks
Valves (FCVA's, FDV's, Dry valves, PA valves)	1-4 weeks (depending on valve)	2-8 weeks (depending on valve)
PA Panels & Detection Devices	2-4 weeks	16-20 weeks
Flexible Sprinkler Heads	1 week	3-6 weeks
ELECTRICAL		
Lighting (Standard Fixtures)	4-6 weeks	6-10 weeks
Lighting (Custom / Linear Fixtures)	8-10 weeks	16-20 weeks
Lighting Controls	8-10 weeks	10-12 weeks
Generator	10-20 weeks	24-30 weeks
ATS	10-20 weeks	18-24 weeks
Fire Alarm Components	2-5 weeks	6-10 weeks
Gear	6-10 weeks	12-20 weeks
Steel Pipe & Fittings	A few days	2-4 weeks
PVC Pipe	A few days	2-4 weeks
Wire	A few days	3-6 weeks, MI 20 weeks
Boxes and Fittings	A few days	2-4 weeks
Switchboards	6-10 weeks	12-20 weeks

LOCAL ESCALATION

Material Escalation

BLS BUREAU OF LABOR STATISTICS U.S. DEPARTMENT OF LABOR **November 2021**

The Bureau of Labor Statics shows an average material escalation of 21.0% change over the past 12 months. This number reflects the intermediate demand by commodity type - materials and components for construction.

The all items index rose 6.8% for the 12 months ending November, the largest 12-month increase since the period ending November 1990. The index for all items less food and energy rose 4.6% over the last 12 months, the largest 12-month increase since the period ending August 1991. The energy index rose 30% over the last 12 months, and the food index increased 5.3%.

These historic increases bring the possibility for broad based inflationary pressures. With the CPI and PPI at highs not seen in 30+ years, it is likely that in 2022 the federal reserve will increase interest rates to take on inflation. While this threat of inflation can create rising interest rates and a tightening of investments, we have not experienced a change in business fluidity. Again, this is driven locally by heavy investment in lab science.

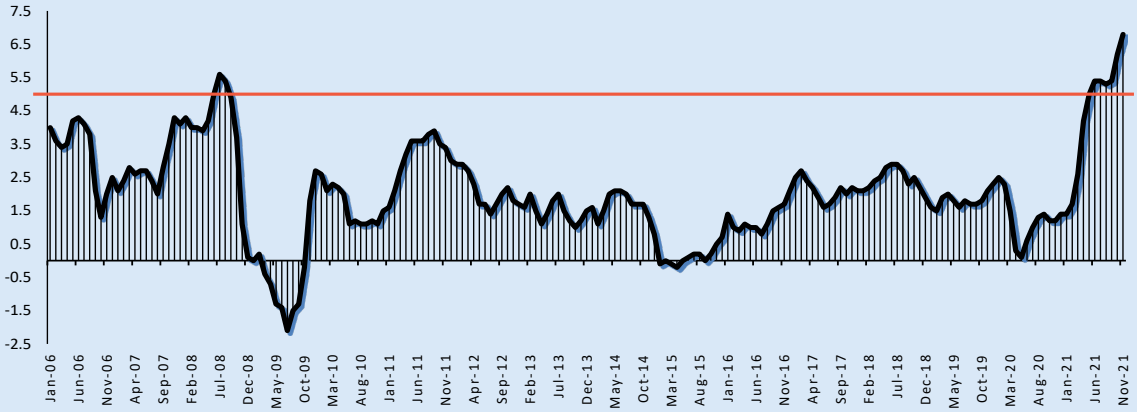
BLS Series ID	Material	12-month % Change
WPU102501	Aluminum mill shapes	41.1%
WPU1311	Flat glass	8.4%
WPU102502	Copper & Brass Mill Shapes	37.8%
WPU1017	Steel mill products	141.6%
WPU133	Concrete products	8.4%
WPU137	Gypsum products	20.9%
WPUSI004011	Lumber and plywood	12.2%
WPU1394	Paving mixtures (asphalt)	6.2%

Producer Price Index (WPUID612)
Average Material Escalation: 21.0%

Consumer Price Index (CPI)
6.8% / year escalation

Consumer Price Index Over the Past 15 Years

Consumer prices accelerated at their fastest pace in nearly 40 years with the CPI hitting 6.8% in November. Over the last month the Federal Reserve has changed its stance on inflation and retired it's description as transitory. The tapering of asset purchases has increased and they are now projecting a minimum of two rate hikes in 2022.



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LOCAL ESCALATION

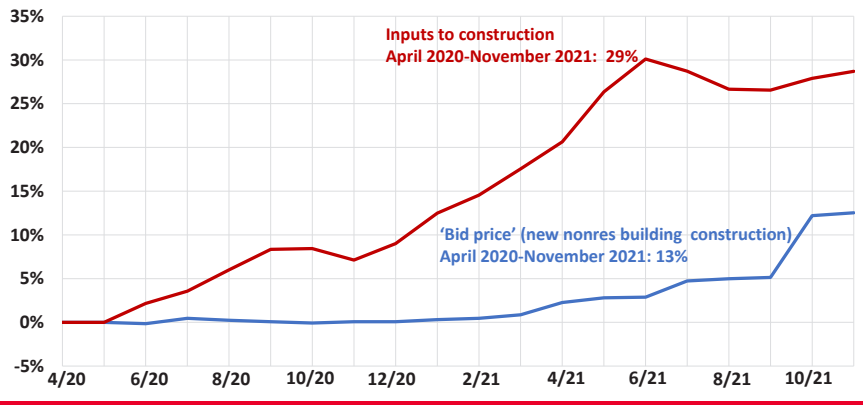
Commodity Index & Construction Pricing

November 2021

13%

Input costs for general contractors have soared by 13% from April 2020 to November 2021. This chart shows the input costs have been absorbed prior to March 2021.

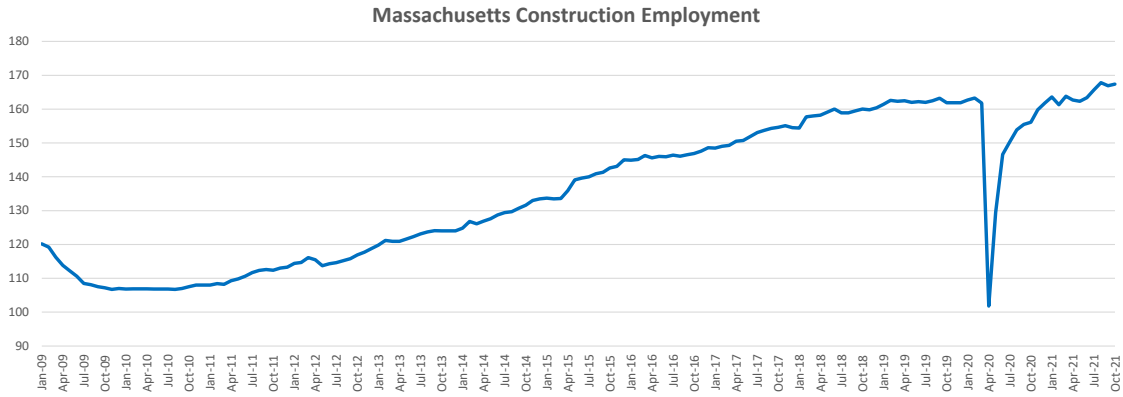
cumulative change in PPIs, April 2020 -November 2021 (not seasonally adjusted)



1 | Source: Bureau of Labor Statistics, producer price indexes, www.bls.gov/ppi

Construction Employment

Construction employment has been dramatically effected by the COVID-19 pandemic. In 2020, we were focused on how this workforce "comes back to work." There has been increased demand and increased work, which has resulted in the highest construction employee numbers we have seen in quite some time, just above what they were prior to the pandemic.



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LOCAL ESCALATION

Local Market

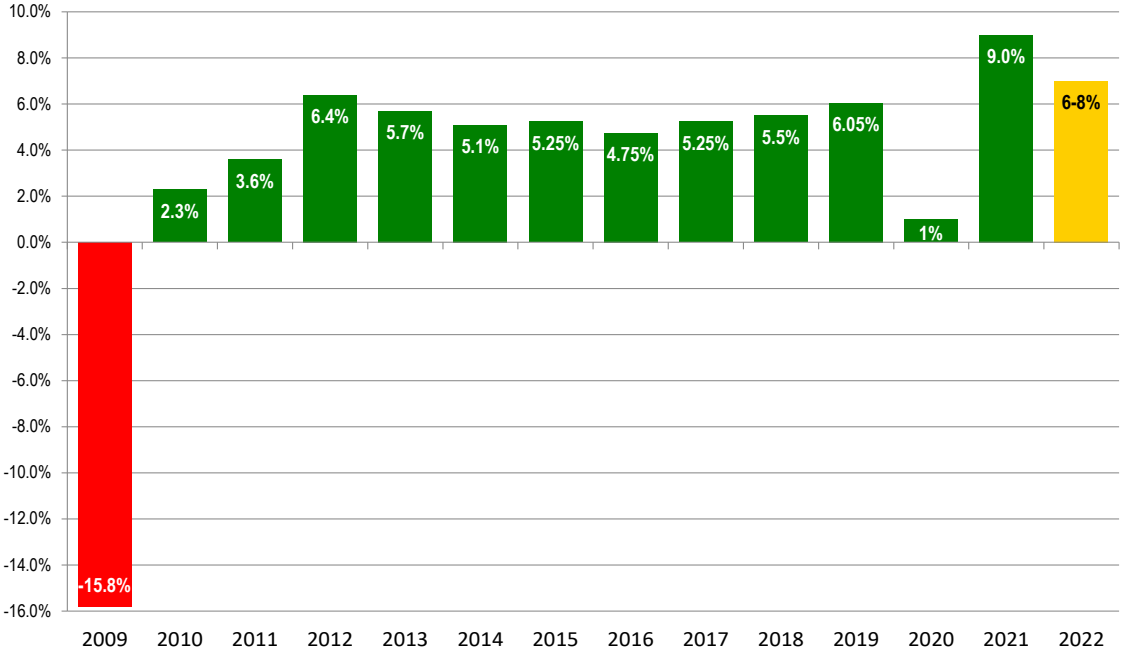
Q4 2021

In 2021, we experienced the highest escalation documented in the last decade. This is due to the impacts of the COVID-19 pandemic on commodity materials that become products in the construction industry, along with supply chain challenges, and the increasing construction volume in our market. The projection looking forward is for this to continue. The supply chain challenges will continue and the increasing volume will challenge the industry's ability to supply the necessary workforce. This will stress productivity, and the future pipeline of projects will keep trade contractors full to capacity.

The escalation for 2022 will remain high. How high will depend on the number of project starts, and the very hard to predict anomalies that can occur in such a fragile supply chain.

Variance from Previous Quarter	
Material	↗
Labor	↔
Market Conditions	↗
Overall	↗

Greater Boston Area Year to Year Local Escalation



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COLLIERS INTERNATIONAL MARKET STATISTICS

Q3 2021

Colliers

OFFICE MARKET

Submarket/Class	Total Inventory SF	Direct Availability	Sublease Availability	Availability Rate	Availability Rate Previous	Net Absorption Current	Net Absorption YTD	Under Construction	Deliveries YTD	Avg Direct Asking Rent (FSG)
Boston										
Back Bay	13,379,652	838,391	308,524	8.6%	10.0%	196,496	199,180	-	-	$67.60
Downtown	34,251,697	4,700,798	1,296,382	17.5%	17.2%	(113,773)	(706,001)	772,422	-	$64.33
Allston / Brighton	758,521	33,952	47,056	10.7%	10.7%	-	(6,862)	-	-	$55.00
Charlestown	2,067,701	274,395	265,956	26.1%	27.6%	29,641	(208,846)	-	-	$47.14
Crosstown	504,000	40,230	10,997	10.2%	11.0%	4,243	2,950	-	-	$41.00
Fenway / Kenmore	1,918,948	36,854	16,940	2.8%	3.1%	6,059	88,037	275,000	-	$53.00
North Station	2,245,004	292,162	134,663	19.0%	21.2%	48,475	100,502	1,715,212	-	$54.26
Seaport	9,556,423	992,891	509,092	15.7%	16.7%	98,594	(485,305)	730,000	-	$60.80
South Station	1,256,141	209,971	7,367	17.3%	20.3%	37,510	(9,855)	660,000	-	$53.47
TOTAL	65,938,087	7,419,644	2,596,977	15.2%	15.7%	307,245	(1,026,200)	4,152,634	-	$62.66
Cambridge										
Alewife Station / Route 2	1,681,993	163,141	92,972	15.2%	12.6%	(44,752)	(2,353)	-	-	$74.12
East Cambridge	8,842,083	428,176	263,673	7.8%	9.5%	150,477	116,135	420,000	-	$90.51
Harvard Square / Mass Ave	1,817,408	95,127	72,170	9.2%	9.2%	-	(27,783)	-	-	$79.71
TOTAL	12,341,484	686,444	428,815	9.0%	9.9%	105,725	85,999	420,000	-	$85.12
Suburbs										
Inner Suburbs	5,377,085	653,256	168,047	15.3%	15.8%	25,656	54,689	379,312	-	$36.51
Route 128 North	7,056,551	1,244,690	61,151	18.5%	16.5%	(15,835)	(1,573)	220,000	154,000	$23.24
Route 128 Northwest	17,595,526	2,297,656	263,677	14.6%	14.2%	(59,686)	(237,366)	-	-	$30.91
Route 128 Mass Pike	20,726,606	2,866,143	608,663	16.8%	16.4%	(69,199)	108,515	253,810	-	$38.23
Route 128 South	16,159,772	2,217,015	325,652	15.7%	15.6%	(17,257)	(134,789)	116,334	-	$24.85
Route 495 North	18,740,522	4,062,098	542,466	24.6%	25.5%	175,340	(61,591)	220,000	-	$19.62
Route 495 West	19,435,736	3,691,436	656,048	22.4%	23.1%	145,681	43,897	-	150,000	$20.19
Route 495 South	3,196,097	432,791	90,623	16.4%	16.6%	7,308	(98,071)	-	-	$20.68
Worcester	1,988,183	352,702	100,000	22.8%	21.8%	(20,000)	11,291	-	-	$23.47
TOTAL	110,276,078	17,817,787	2,816,327	18.7%	18.8%	172,008	(314,998)	1,189,456	-	$25.81
TOTAL	188,555,649	25,923,875	5,842,119	16.8%	17.1%	584,978	(1,255,199)	5,762,090	304,000	

LAB MARKET

Market	Square Feet (SF) Supply	Direct SF Available	Sublease SF Available	Vacancy*	Current Absorption	YTD Absorption
Boston	5,842,522	18,048	-	0.3%	264,219	609,966
Financial District	102,567	-	-	0.0%	-	-
Allston / Brighton	203,922	-	-	0.0%	32,811	19,000
Charlestown	773,475	-	-	0.0%	-	57,781
Crosstown	521,000	-	-	0.0%	-	-
Fenway / Kenmore	2,339,047	-	-	0.0%	-	-
Seaport	1,843,511	18,048	-	1.0%	231,408	533,185
South Station	59,000	-	-	0.0%	-	-
Cambridge	12,804,859	1,272	-	0.0%	27,617	233,621
Alewife Station / Route 2	1,358,621		-	0.0%	28,889	148,783
East Cambridge	11,364,151	1,272	-	0.0%	(1,272)	84,838
Harvard Square / Mass Ave	82,087	-	-	0.0%	-	-
Suburbs	13,414,878	142,330	130,182	2.0%	570,089	1,125,805
Inner Suburbs	1,524,906	-	8,000	0.5%	49,674	120,387
Route 128 North	515,850	-	-	0.0%	-	-
Route 128 Northwest	3,774,697	46,196	96,050	3.8%	109,899	218,558
Route 128 Mass Pike	2,265,782	28,595	-	1.3%	205,385	350,621
Route 128 South	440,927	7,299	16,531	5.4%	8,817	(16,531)
Route 495 North	1,838,794	31,363	-	1.7%	109,915	340,515
Route 495 West	1,927,925	28,877	9,601	2.0%	73,910	99,766
Route 495 South	200,000	-	-	0.0%	-	-
Worcester	925,997	-	-	0.0%	12,489	12,489
TOTAL	**32,062,259**	**161,650**	**130,182**	**0.9%**	**861,925**	**1,969,392**

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QA+M architecture

June 1, 2022

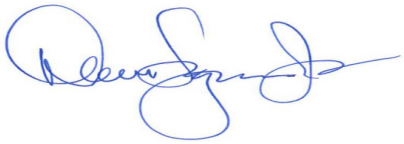
Mr. Thomas Scarice
Superintendent of Schools
Westport, Connecticut

Re: Long Lots Elementary School and Coleytown Elementary School– assessment of viability for Renovate Like New status.

Mr. Scarice,
As you requested, I have toured both Long Lots Elementary School and Coleytown Elementary School. Based on these walk throughs, and with the information provided to me (existing Long Lots assessments and Coleytown floor plans), I offer my professional opinion for each school as follows:
Concerning Long Lots Elementary School, it is my professional opinion that a Renovate Like New project would not be cost effective or practical compared to constructing a new facility on the existing site. There are numerous envelop deficiencies that have been noted in previous reports (and are very clear visually), mechanical systems are beyond their current life expectancy and the existing construction would make replacement with modern, efficient systems very difficult. As the building was originally designed as a middle school, portions of the existing area are not programmatically appropriate for an Elementary school. Also, knowing there is the potential that the existing building continue to be used as swing space for future projects, it would be my recommendation that a new Elementary School be constructed. Attempting to Renovate and brings the facility to like new condition would require a long construction process with multiple phases, and this will not necessarily provide a facility that is as efficient (cost wise or from a programmatic standpoint) as a new facility.

Concerning Coleytown, having only performed a walk through/visual inspection and not having any assessment reports to review, I do feel this facility has more potential for as a Renovate like New project. While the available site of Coleytown is smaller than at Long Lots, knowing the student population is intended to remain at a similar level to current and that during a renovation project the school can be moved off site, additions and full renovations would provide a more effective way to update the facility to be more efficient and effective programmatically. This assessment of Coleytown was made with limited information, so I would recommend further analysis of the existing systems and structure take place before making a final decision regarding a Renovate like new process for Coleytown.

Sincerely,



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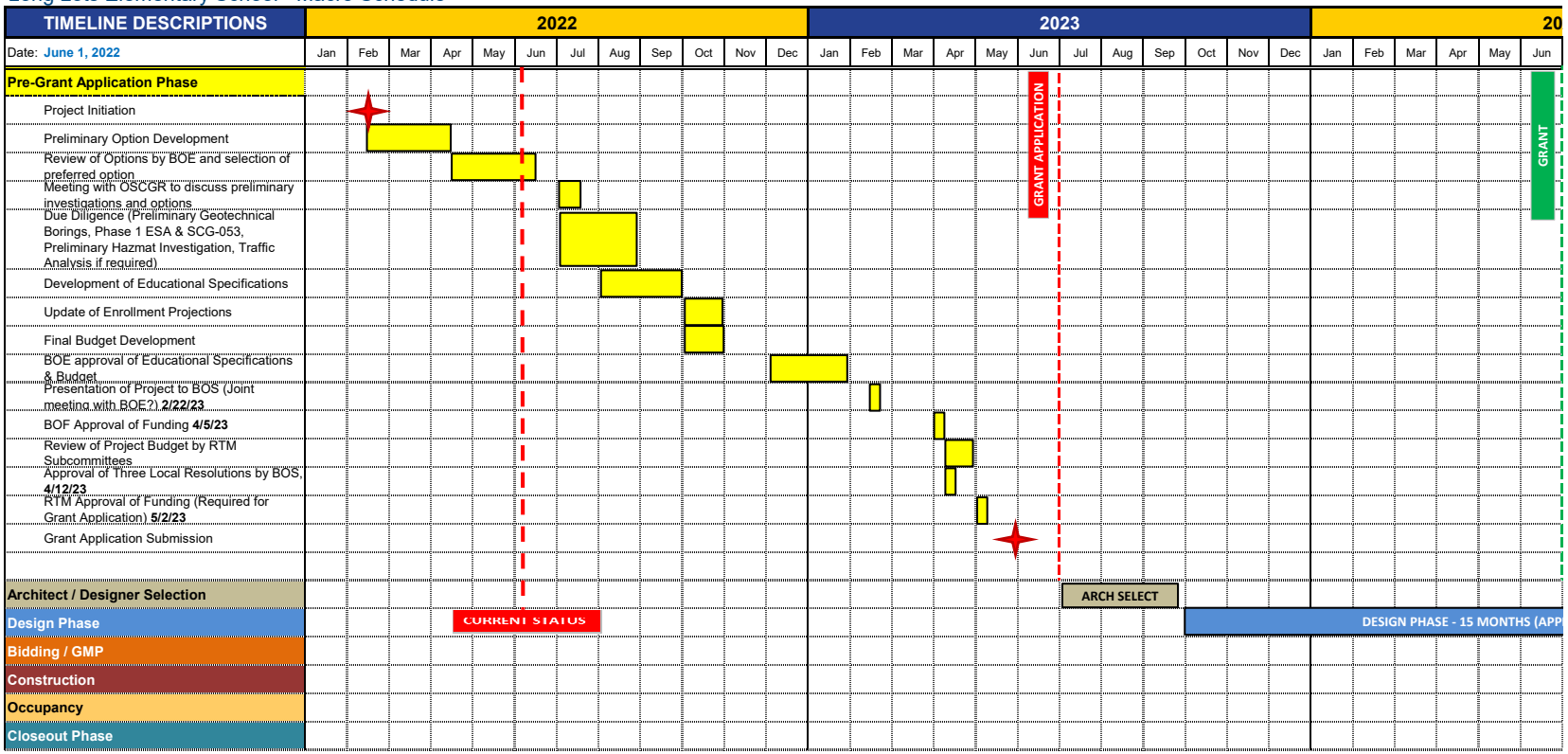
PROJECT SCHEDULE

DRAFT ONLY

Colliers INTERNATIONAL PROJECT LEADERS

Westport Public Schools

Long Lots Elementary School - Macro Schedule



PROJECT SCHEDULE

DRAFT ONLY

Colliers INTERNATIONAL PROJECT LEADERS

Westport Public Schools

Long Lots Elementary School - N

TIMELINE DESCRIPTIONS	24						2025												2026											
Date: June 1, 2022	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Pre-Grant Application Phase																														
Project Initiation																														
Preliminary Option Development																														
Review of Options by BOE and selection of preferred option																														
Meeting with OSCGR to discuss preliminary investigations and options																														
Due Diligence (Preliminary Geotechnical Borings, Phase 1 ESA & SCG-053, Preliminary Hazmat Investigation, Traffic Analysis if required)																														
Development of Educational Specifications																														
Update of Enrollment Projections																														
Final Budget Development																														
BOE approval of Educational Specifications & Budget																														
Presentation of Project to BOS (Joint meeting with BOE?) **2/22/23**																														
BOF Approval of Funding **4/5/23**																														
Review of Project Budget by RTM Subcommittees																														
Approval of Three Local Resolutions by BOS, **4/12/23**																														
RTM Approval of Funding (Required for Grant Application) **5/2/23**																														
Grant Application Submission																														
Architect / Designer Selection																														
Design Phase	ROXIMATE)																													
Bidding / GMP							BIDDING																							
Construction										CONSTRUCTION - SUBSTANTIAL COMPLETION (15 MONTHS)																				
Occupancy																														
Closeout Phase																														