## APPENDIX 4: COST ESTIMATE – MECHANICAL, ELECTRICAL, AND PLUMBING COST MATRIX

## **Purpose of this document**

This appendix contains the detailed cost breakdowns for the mechanical, electrical, and plumbing systems. NOTE: these costs are captured in the direct building cost estimate.

## **APPENDIX 4: MEP COST DETAIL**

SYSTEM	CODE COMPLIANT				INSTITUTIONAL				CONCEPT			
	\$/SF OR UNIT COST	TOTAL	25 YEAR BUILDING	50 YEAR BUILDING	\$/SF OR UNIT COST	TOTAL	25 YEAR BUILDING	50 YEAR BUILDING	\$/SF OR UNIT COST	TOTAL	25 YEAR BUILDING	50 YEAR BUILDING
					MECHANI	CAL						
HVAC	\$18.50	\$129,500.00	\$220,150.00	\$310,800.00	\$24.38	\$170,660.00	\$290,122.00	\$409,584.00	\$26.63	\$186,410.00	\$316,897.00	\$447,384.00
PLUMBING	\$11.50	\$80,500.00	\$112,700.00	\$123,970.00	\$13.50	\$94,500.00	\$132,300.00	\$145,530.00	\$20.50	\$143,500.00	\$200,900.00	\$220,990.00
TOTAL MECHANICAL		\$210,000.00	\$332,850.00	\$434,770.00		\$265,160.00	\$422,422.00	\$555,114.00		\$329,910.00	\$517,797.00	\$668,374.00
\$/SF MECHANICAL		\$30.00				\$37.88				\$47.13		
					ELECTRIC	AL						
DISTRIBUTION EQUIPMENT	\$48,600.00	\$48,600.00	\$48,600.00	\$97,200.00	\$48,600.00	\$48,600.00	\$48,600.00	\$48,600.00	\$48,600.00	\$48,600.00	\$48,600.00	\$48,600.00
EMERGENCY DISTRIBUTION	\$1.00	\$7,000.00	\$35,000.00	\$70,000.00	\$22,000.00	\$22,000.00	\$66,000.00	\$132,000.00	\$41,500.00	\$41,500.00	\$41,500.00	\$62,250.00
WIRING AND CONDUIT	\$1.25	\$8,750.00	\$8,750.00	\$8,750.00	\$2.05	\$14,350.00	\$14,350.00	\$14,350.00	\$3.00	\$21,000.00	\$21,000.00	\$21,000.00
INTERIOR LUMINAIRES	\$4.58	\$32,060.00	\$64,120.00	\$128,240.00	\$6.00	\$42,000.00	\$84,000.00	\$126,000.00	\$7.00	\$49,000.00	\$98,000.00	\$147,000.00
LIGHTING CONTROLS	\$1.00	\$7,000.00	\$7,000.00	\$14,000.00	\$1.50	\$10,500.00	\$10,500.00	\$21,000.00	\$2.75	\$19,250.00	\$38,500.00	\$57,750.00
EXTERIOR LUMINAIRES	\$25,000.00	\$25,000.00	\$50,000.00	\$75,000.00	\$25,000.00	\$25,000.00	\$50,000.00	\$75,000.00	\$25,000.00	\$25,000.00	\$50,000.00	\$75,000.00
EXTERIOR LIGHTING CONTROLS	\$850.00	\$850.00	\$1,700.00	\$2,550.00	\$3,600.00	\$3,600.00	\$7,200.00	\$10,800.00	NOTE 1	\$0.00	\$0.00	\$0.00
PLUG LOAD CONTROL	NOT INCLUDED	\$0.00	\$0.00	\$0.00	NOT INCLUDED	\$0.00	\$0.00	\$0.00	NOTE 1	\$0.00	\$0.00	\$0.00
FIRE ALARM	\$1.62	\$11,340.00	\$11,340.00	\$22,680.00	\$1.62	\$11,340.00	\$11,340.00	\$11,340.00	\$1.62	\$11,340.00	\$11,340.00	\$11,340.00
TOTAL ELECTRICAL		\$140,600.00	\$226,510.00	\$418,420.00		\$177,390.00	\$291,990.00	\$439,090.00		\$215,690.00	\$308,940.00	\$422,940.00
\$/SF ELECTRICAL		\$20.09				\$25.34				\$30.81		
					MEP							
TOTAL MEP		\$350,600.00	\$559,360.00	\$853,190.00		\$442,550.00	\$714,412.00	\$994,204.00		\$545,600.00	\$826,737.00	\$1,091,314.00
\$/SF MEP		\$50.09				\$63.22				\$77.94		
					ADDITIONAL S	YSTEMS						
PV SYSTEM	NOT INCLUDED	\$0.00			23 kW SYSTEM	\$113,900.00			113 kW SYSTEM	\$560,000.00		
TOTAL MEP INCLUDING PV SYSTEM		\$350,600.00	\$559,360.00	\$853,190.00		\$556,450.00	\$828,312.00	\$1,108,104.00		\$1,105,600.00	\$1,386,737	\$1,651,314
\$/SF MEP		\$50.09				\$79.49				\$157.94		

Note 1: Included in the lighting estimate.