ENGINEERING COST	DATE PREPARED:	SHEET 1 OF 3
ACTIVITY AND LOCATION: Chief of Misson Residence, Lima, Peru	CONSTRUCTION CONTRACT NO.	IDENTIFICATION NUMBER
PROJECT TITLE: CMR Roof Replacement (Local Labor)	ESTIMATED BY: CHECKED BY:	AE CONTRACT NUMBER
	STATUS OF DESIGN: Construction Documents	ESTIMATE UPDATED

024100	DEMOLITION	$	$	$
030100	MAINTENANCE OF CONCRETE	$	$	$
035216	LIGHTWEIGHT INSULATING CONCRETE	$	$	$
071416	COLD FLUID APPLIED WATERPROOFING	$	$	$
074113	METAL ROOF PANELS	$	$	$
075200	MODIFIED BITUMINOUS MEMBRANE ROOFING	$	$	$
076000	FLASHING AND SHEET METAL	$	$	$
099100	PAINTING	$	$	$
099653	ELASTOMERIC COATINGS	$	$	$
230510	MECHANICAL/ELECTRICAL	$	$	$
	SUBTOTAL	$	$	$

DIVISION 1 GENERAL REQUIREMENTS 15% OVERHEAD AND PROFIT	$
SUBTOTAL	$
GENERAL CONTRACTOR MARKUP	
CONSTRUCTION COST	$
PRICE PER SQUARE FOOT	$

ENGINEERING COST ESTIMATE	Date prepared:	SHEET 2 0F 3
CMR Roof Replacement (Local Labor)	Estimated by	Checked by

	ITEM DESCRIPTION	QUANTITY No.	Unit	MATERIAL UNIT COST	MATERIAL TOTAL	LABOR UNIT COST	LABOR TOTAL	COMBINED UNIT COST	COMBINED TOTAL
024100									
	DEMOLITION								
	Remove existing Terra Cotta roofing system	14505	sf	$ -	$ -	$	$	$	$
	Dumpsters	20	ea	$	$	$	$ -	$	$
	Remove existing metal roof	200	sf	$ -	$ -	$	$	$	$
	024100 SUBTOTAL				$		$		$
030100									
	MAINTENANCE OF CONCRETE								
	Replace deteriorated areas	75	sf	$	$	$	$	$	$
	Provide surface repairs	175	sf	$	$	$	$	$	$
	030100 SUBTOTAL				$		$		$
035216									
	LIGHTWEIGHT INSULATING CONCRETE								
	Tapered insulating concrete (includes insulation)	14505	sf	$	$	$	$	$	$
	035216 SUBTOTAL				$		$		$
071416									
	COLD FLUID APPLIED WATERPROOFING								
	Perimeter Waterproofing	3800	sf	$	$	$	$	$	$
	071416 SUBTOTAL				$		$		$
074113									
	METAL ROOF PANELS								
	Roof panels (.040 or Sim)	200	sf	$	$	$	$	$	$
	Underlayment (self-adhering mod bit)	200	sf	$	$	$	$	$	$
	Rosin sheet		sf	$	$	$	$	$	$
	Hat channel	200	sf	$	$	$	$	$	$
	Fasteners and accessories	200	sf	$	$	$	$	$	$
	74113 SUBTOTAL				$		$		$

ENGINEERING COST			Date prepared:				SHEET	3 0F 3
CMR Roof Replacement (Local Labor)			Estimated by		Checked by			
ITEM DESCRIPTION	QUANTITY No.	Unit	MATERIAL UNIT COST	TOTAL	LABOR UNIT COST	TOTAL	COMBINED UNIT COST	TOTAL
075200								
MODIFIED BITUMINOUS MEMBRANE ROOFING								
Install 2-Ply modified bitumen membrane	14505	sf	$	$	$	$	$	$
Install SBS stripping membrane	1000	lf	$	$	$	$	$	$
Install 2-Ply SBS base flashing	800	sf	$	$	$	$	$	$
Install 1-Ply modified bitumen membrane (Vapor Barrier)	14505	sf	$	$	$	$	$	$
Walkway pads (mod bit)	300	lf	$	$	$	$	$	$
	075200 SUBTOTAL			$		$		$
076000								
FLASHING AND SHEET METAL								
Penetration flashing	50	ea	$	$	$	$	$	$
Misc. counterflashing	300	lf	$	$	$	$	$	$
Expansion joint cover	200	lf	$	$	$	$	$	$
Underlayment (self-adhering mod bit) edges and coping	1600	sf	$	$	$	$	$	$
Sheet metal skirt flashing	250	lf	$	$	$	$	$	$
	076000 SUBTOTAL			$		$		$
099100								
PAINTING								
Misc Exterior Painting (per Coat)	1960	sf	$	$	$	$	$	$
Prep surface prior to painting	1960	sf	$	$	$	$	$	$
	99100 SUBTOTAL			$		$		$
099653								
ELASTOMERIC COATINGS								
Acrylic Elastomeric Coating	14505	sf	$	$	$	$	$	$
	99653 SUBTOTAL			$		$		$
230510								
MECHANICAL/ELECTRICAL								
Remove and reinstall electrical/mechanical equiptment	1	ls		$ -	$	$	$	$
	230510 SUBTOTAL			$ -		$		$ -
Division I General Conditions								
Bonds, Insurance, and Warranty		ls						$
Interior Protection		ls						$
Mobilize and Demobilize		ls						$
Submittal Process		ls						$
Material Storage and Protection		ls						$
DBA Insurance Premium		ls	$ -	$ -	$ -	$ -	$ -	$
Superintendent, Proj. Mgr.	640	hrs	$ -	$ -	$	$	$	$