



Wednesday, August 20, 2008

COST ESTIMATE FOR ENGINEERING DESIGN SERVICES

Project name and location: Pre-School at 850 masonic Ave, Albany, CA

Project Description: Seismic Shear Bracing Design in Crawl Space, Foundation and Specifications

Scope of Services: The proposed services are limited to as described below:

1. Verify existing site and construction details
2. Design cripple wall bracing for earthquake and wind loads per 2007 CBC and 2006 IEBC (International Existing Building Code that allows to use 75% of the 2007 CBC design value for seismic load.
3. Design foundation for west wall and interior pad footing that are missing. Reconnect or provide new interior footing.
4. Design one transverse shear wall and footing under interior middle wall. Connect floor framing to the new footing.
5. Provide plan, connection details, specifications. Design concrete pad under HVAC unit in crawl space. Design new sump-pump pit with filter fabric and drain rock.
6. No shear wall design in main floor level.
7. No soil report is available. We will establish design parameters based on CBC criteria where no soil report is available.
8. Provide electronic and hard copies of our plan and calculations

Job estimate

Task	Time hr.	Rate \$/hr.*	\$
Site information	4	110	440
Conceptual design Seismic load design	2	110	220
Wind load design	6	110	660
Develop connections bet floor and cripple walls	6	110	660
New west wall footing and interior post footing	4	110	440
New shear wall and footing in transverse direction in crawl space possibly under wall in main floor	4	110	440
Connection bet interior girder to post to foundation	5	110	550
Concrete pad under HVAC units	5	110	550
Design new sump-pump details	2	110	220
Details, Drawings & Specifications	2	110	220
Administrative Engineering	28	110	3080
Sub-tot - Eng Design	72		7688
Response to plan check review	4	110	440
Construction phase meeting, RFI, memorandum,	14	110	1540

Engg
observation

Total

90

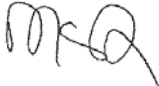
9668

Print, copies, etc

\$150

* This an average rate for Sr. and Jr. Engineers and draft person.

Respectfully submitted by:



Bishwendu K. Paul, S.E. 3093 Exp 9/09
President