Tisbury School Extension

Preliminary Proposal

February 4, 2013
Impact Platform Overview
Project Frog’s Impact | Make healthier, greener schools accessible to all

- A low-cost, high-performance, 1- and 2-story platform designed specifically for the k-12 market

- Lower costs achieved through standardization, integration of additional pre-fab components, and the basic flexibilities and configurations required of the market

- 7-8 months from design through completion—shortens typical project timelines by over four months

- 50% more energy efficient than the most stringent codes
Project Frog’s Impact | Interior Classroom
<table>
<thead>
<tr>
<th>Metric</th>
<th>Description</th>
<th>Standard Modular</th>
<th>Project Frog</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ceiling height</td>
<td>Effective clear height</td>
<td>8’ – 9’</td>
<td>11’4” 15’8”</td>
</tr>
<tr>
<td>Ceiling noise reduction coefficient</td>
<td>% of sound energy absorbed by a surface</td>
<td>0.50 – 0.70</td>
<td>0.95</td>
</tr>
<tr>
<td>Daylight autonomy</td>
<td>% of daytime hours when electric lighting not required</td>
<td>0 – 20%</td>
<td>75 – 85%</td>
</tr>
<tr>
<td>Window solar heat gain</td>
<td>% of solar radiation transmitted through glass</td>
<td>40%</td>
<td>27%</td>
</tr>
<tr>
<td>Energy Performance</td>
<td>Energy consumption relative to code (Title 24)</td>
<td>0 – 15% better</td>
<td>40 – 60% better</td>
</tr>
<tr>
<td>Classroom interior lighting</td>
<td>Type, efficiency and life of lighting</td>
<td>Florescent 10,000 hrs 70 – 90 lumen/watt</td>
<td>LED 40,000 hrs &gt;100 lumen/watt</td>
</tr>
<tr>
<td>View Windows</td>
<td>% of classroom floor area with direct line of sight to view glazing</td>
<td>60 - 90%</td>
<td>100%</td>
</tr>
<tr>
<td>Natural Ventilation</td>
<td>Use of outside air for ventilation and cooling</td>
<td>Varies</td>
<td>100%</td>
</tr>
</tbody>
</table>
13,000 SF BLDG - 8 Classrooms (720 sf each)

Upper Floor: 6,468 sf
Total GSF: 12,936 sf

Lower Floor: 6,468 sf
Total GSF: 12,936 sf
16,500 SF BLDG – 12 Classrooms (720 sf each)
Tisbury School Extension | Conceptual Exterior Elevation

Impact
Cost and Schedule
# Preliminary Cost Summary

<table>
<thead>
<tr>
<th>Building Summary</th>
<th>Gross Square Feet</th>
<th>Cost per Sf.</th>
<th>Total Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Frog Building Kit &amp; Install</td>
<td>15,000 gsf</td>
<td>$140</td>
<td>$2,100,000</td>
</tr>
<tr>
<td>General Contractor</td>
<td>15,000 gsf</td>
<td>$160</td>
<td>$2,400,000</td>
</tr>
<tr>
<td><strong>Total Construction</strong></td>
<td><strong>15,000 gsf</strong></td>
<td><strong>$300</strong></td>
<td><strong>$4,500,000</strong></td>
</tr>
<tr>
<td>Balance of Soft Costs</td>
<td>6-8%</td>
<td></td>
<td>$270,000 - $360,000</td>
</tr>
</tbody>
</table>

Estimated Frog Kit and InField construction cost for a 15,000 sf. Two story Double Loaded Classroom Building in Martha’s Vineyard. Frog will seek additional input from local GC’s once the design intent and project needs are made clear.
**Scope of Work Summary** | Impact Inclusions & Exclusions

**Frog Kit**
- Frog Kit Panels; Exterior solids walls w/ insulation, Panelized Glazing & Integrated sunshades, Floor and roof decking, beams & columns, interior partition framing
- Standing seam insulated roofing panels
- All fasteners required for Frog Kit
- HVAC equipment & prefabrication
- Lighting Controls, LED Light Fixtures & Lamps
- In wall electrical devices & wiring
- Coordination drawings for Architect of Record and Structural Engineering of Building
- Shipping to jobsite

**General Contracting Services (On-Site Work)**
- Perimeter footing and grade beam foundation system with slab on grade.
- Concrete topping slab at 2 story options
- Installation of Frog Kit
- Rough carpentry, Cabinetry and millwork
- Exterior waterproofing and cladding
- Membrane roofing system at flat roofs, gutters and downspouts
- Doors & Finish Hardware, Louvers & Vents
- Exterior cladding, Caulking and sealants/waterproofing
- Gypsumboard ceiling and wall finishes as required, Interior painting, Batt insulation at interior non-load bearing partitions
- Flooring & bases, Acoustical ceilings
- Elevator & Stairs at 2 story options
- Fire Sprinklers
- HVAC: Installation of prefabricated equipment skids, line set piping from censor(s) to fan coils and ventilation systems.
- Electrical: F&I panels, install lighting, final connection of prewired and installed devices in wall panels, F&I electrical panels and main feeders.

**Not Included**
- Site work, landscaping & utilities
- Landscaping & Civil Engineering Fees
- Furniture, Fixtures & Equipment
- 6% of Soft Costs for Site Adapt and custom TI and engineering, etc.
- Restroom Modules & Plumbing Systems

* Subject to confirmation during product prototyping
Impact Schedule | 6-7 months from purchase to completion*

1. **Project Frog**
   - Design / Permit: 8 weeks
   - Site Work / Foundation: 9 weeks
   - Manufacturing: 6-9 weeks
   - Frog Kit Install: 7-8 weeks

2. **Trad’l**
   - Permit Set Dev.+ Permit: 16 weeks
   - Site Work / Foundation: 9 weeks
   - Trad’l: 16 weeks
   - TI: 6 weeks
   - TI: 8 weeks

Staff Recruitment, Lesson Planning, GC $ Saved: 120 days

*Schedule reflects 10,000 square foot school