SEED MIXED-USE MULTIFAMILY

Existing Conditions

McKinney Manor Home

Interstate 81

Introduction Architecture Construction Engineering Energy Finance Conclusion
Revitalization Plans

1. Rethink 81
2. Syracuse Surge
3. Syracuse Housing Authority Redevelopment
Design Goals

- Environmental Impact
- Health & Wellbeing
- Affordability
- Resiliency
- Operations & Maintenance
- Replicability

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Intended Occupants

Marketing Strategies

- 39% (14 Units) - Market Rate ($22,565+)
- 61% (22 Units) - Below Market Rate (-$22,565)
- 53% - Level 1 ($0 - $12,150)
- 20% - Level 2 ($12,150 - $17,358)
- 27% - Level 3 ($17,358 - $22,565)

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Floors 2 - 5

1 Bedroom - 711 sf.
2 Bedroom - 936 sf.

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Two Bedroom Unit
One Bedroom Unit
Shared Space/Amenities
Commercial Space
Mechanical Space
**Foundation Detail**

**First Floor to Second Floor Connection**

**Parapet Detail**

- **0°F - 12°F**
- **12°F - 30°F**
- **30°F - 40°F**
- **40°F - 54°F**
- **55°F - 70°F**
Air Sealing and Compartmentalization

<table>
<thead>
<tr>
<th>PHIUS+ Multifamily</th>
</tr>
</thead>
<tbody>
<tr>
<td>Whole-Building air tightness:</td>
</tr>
<tr>
<td>Dwelling unit compartmentalization:</td>
</tr>
</tbody>
</table>
RenewAire HE Series ERV
- Dual Premium Efficiency Motors
- MERV 13 Filter
- AHRI Certified

CERV II ERV
- Smart Control
- Monitoring
- Heat Pump

Duct Sealing
- Simple Process
- Extremely Low VOC Sealant
- Longevity
Daikin SmartSource
- ¾ to 1 ton system

Space Heating and Cooling

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47.5%

Water Reduction from LEED Baseline
Grasshopper DIVA Simulation

Sensored Occupancy-Zoned Lighting System

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Lighting
Solar Car Port
- Size: 208.8 kw
- Production: 253,976 kWh/year
- Cost: $750,000
- Cost With Incentives: $386,920 ($1.85/Watt)
### Energy Modeling

<table>
<thead>
<tr>
<th>Description</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Net Source EUI:</td>
<td>33.6 kBTU/ft²</td>
</tr>
<tr>
<td>Net Site EUI:</td>
<td>10.6 kBTU/ft²</td>
</tr>
<tr>
<td>Annual Electric consumption:</td>
<td>487,761 kWh</td>
</tr>
<tr>
<td>Annual Electric production:</td>
<td>335,872 kWh</td>
</tr>
<tr>
<td>Annual Water consumption:</td>
<td>11.38 million gal.</td>
</tr>
</tbody>
</table>

#### HERS® Index

- **Existing Homes**
  - 0
- **Standard New Home**
  - 100
- **ENERGY STAR® Home**
  - 85

**SyRACUSE ENERGY SOLUTIONS**

- **HERS® Rating**
  - -17.5
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SEED MIXED-USE MULTIFAMILY

Finance

SEED Building Cost

- Demolition: 22%
- Site: 29%
- Structure: 9%
- MEP: 4%
- Finishes: 22%

$9,131,315
$158/ Sq. Ft.

SEED Financing

- Public Grant: $1.4 m
- Private Grant: $1.0 m
- Tax Credit: $1.3 m
- Loans: $5.3 m
- Rebates: $0.2 m

Percent of Building Cost

$9.1 m

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Community Impact

27 City blocks remade

1000+ Public housing units transformed

118 Acres covered

City blocks remade
Public housing units transformed
Acres covered