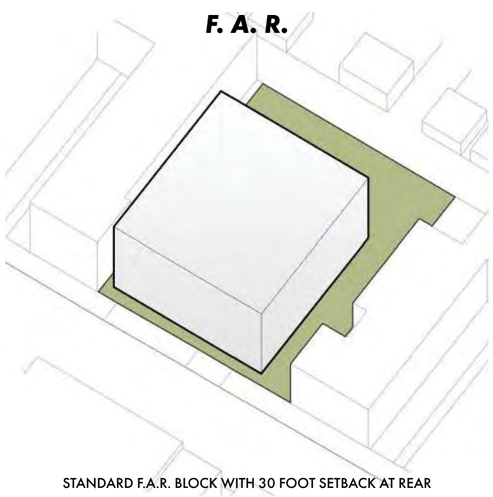
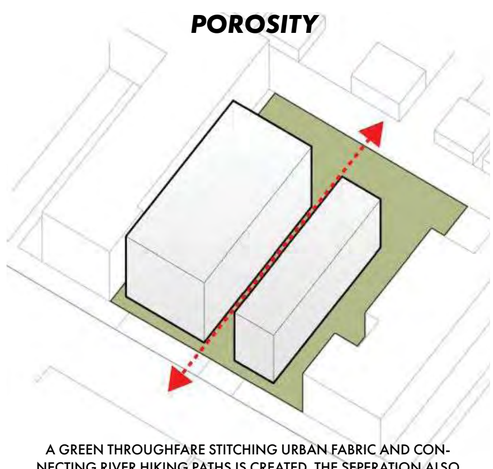
Tackling affordable housing in an urban context by mobilizing modular construction methods, ***RIVER MODULAR*** seeks to stitch the urban fabric with materials and a color palate that responds and respects the traditional masonry vernacular, while softening the interior courtyard with environmentally responsible recycled wood planks that minimize sound transmission and help lighten up the inner courtyard. Roofs drain onto a regionally sourced stone paving that channels stormwater to a raingarden, where it can filter organically and offer the courtyard a green oasis for residents to meditate around. The modular construction offers a shorter construction schedule, better quality control, and insulation values. The modules are stacked on top of each other, undulating on the courtyard facing side to break up the massing, offer cross ventilation, and allow eyes on the public realm. The development connects the residents to each other, the community, and the natural trails along the river banks.

F. A. R.



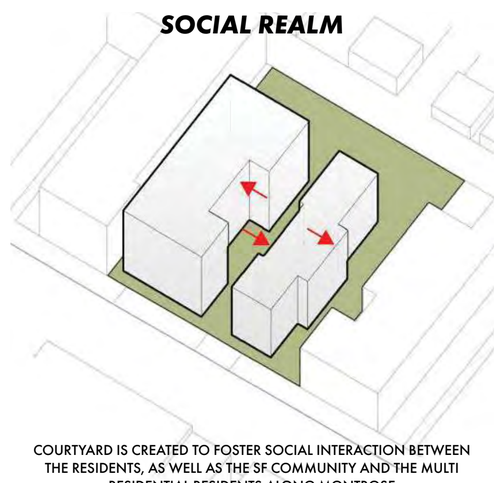
STANDARD F.A.R. BLOCK WITH 30 FOOT SETBACK AT REAR

POROSITY



A GREEN THROUGHFARE STITCHING URBAN FABRIC AND CONNECTING RIVER HIKING PATHS IS CREATED. THE SEPERATION ALSO HELLPS IN DAYLIGHTING AND CROSS VENTILATION

SOCIAL REALM

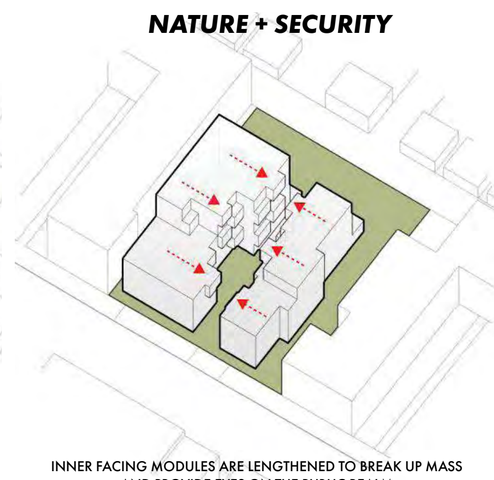


COURTYARD IS CREATED TO FOSTER SOCIAL INTERACTION BETWEEN THE RESIDENTS, AS WELL AS THE SF COMMUNITY AND THE MULTI RESIDENTIAL RESIDENTS ALONG MONTROSE

STREETSCAPE

FRONTAGE ALONG STREET IS LOWERED IN RESPONSE TO EXISTING STREETSCAPE HEIGHTS AND TO LIMIT SHADOWS ON BUILDINGS DIRECTLY NORTH

NATURE + SECURITY



INNER FACING MODULES ARE LENGTHENED TO BREAK UP MASS AND PROVIDE EYES ON THE PUBLIC REALM

PRINCIPLES FOR A NEW URBAN HOUSING TYPOLOGY

CONNECTIVITY

THE PROJECT SEEKS TO STITCH THE URBAN FABRIC BY ACTING AS A GATEWAY CONNECTING THE NEIGHBORHOOD TO THE RIVER THEREBY BREAKING STIGMAS AGAINST ALLEYS MAKING THEM MORE ACCESSIBLE, MONITORED AND SAFE.

1. RIVERBANK NEIGHBORS PARK CAN POTENTIALLY CONNECT TO THE NORTH SHORE CHANNEL BIKE & PEDESTRIAN TRAIL THAT LEADS TO EVANSTON
2. POTENTIAL NEIGHBORHOOD JETTY FOR RECREATIONAL BOATING
3. PEDESTRIAN FRIENDLY 'MEWS' THAT CONNECT NEIGHBORHOOD TO THE RIVER
4. THE HOUSING MASS IS STRATEGICALLY SPLIT TO CREATE A GATEWAY CONNECTING THE STREET TO THE MEWS LEADING TO THE RIVER. THE AXIS IS CAREFULLY DESIGNED THE BALANCE PRIVACY OF THE RESIDENTS AND CREATING A NEIGHBOURHOOD AMENITY.
5. THE PROJECT COMPLETES A SEAMLESS CONNECTION BETWEEN HORNER PARK AND THE TRAILS ALONG THE EAST BANK OF THE RIVER.

SUSTAINABILITY

THE PROJECT ASPIRES TO BECOME A BEACON OF SUSTAINABILITY AND A TOOL FOR THE COMMUNITY TO UNDERSTAND THE BENEFITS OF ENERGY CONSERVATION, STORMWATER MANAGEMENT & DAYLIGHT IN EVERYDAY LIFE. FOLLOWING ARE THE SUSTAINABLE BUILDING DESIGN PRACTICES THAT HELP ACHIEVE THE GOAL.

1. GREEN ROOF HELP COLLECT STORMWATER AND REDUCE HEAT ISLAND EFFECT
2. WATER CISTERNS TO STORE GRAY WATER FOR LANDSCAPING
3. PV PANELS TO OFFSET ELECTRICITY COSTS IN PEAK PERIODS AND HELP HEAT WATER
4. RAINGARDEN TO HELP DEAL WITH STORMWATER OFF SOLID SURFACES
5. BUILDING MASSING AS A STRATEGY AGAINST UNWANTED SHADOWS ON ADJACENT PROPERTIES
6. SUN SHADING STRATEGIES ON FENESTRATIONS FACING THE SOUTHERN EXPOSURE
7. RECYCLED WOOD AND CORRUGATED STEEL FOR ENVELOPE CLADDING
8. PREFABRICATED MODULES USING RECYCLED MATERIALS FOR FINISHES

WALKABILITY

CONTEXT & CONVENIENCE ARE ESSENTIAL FACTORS THAT INFLUENCE THE PROGRAM AND HOUSING UNIT TYPES. THE PROJECT IS CONVENIENTLY LOCATED ALONG BUS, TRAIN & BIKE TRANSIT ROUTES. FOLLOWING IS A CONVENIENCE SUMMARY MAKING IT A LUCATIVE REALESTATE FOR INVESTORS & THE PROFORMA.

1. BUS STOP AT WESTERN AVE - 6 MIN
2. TRAIN AT ROCKWELL ST - 7 MIN
3. DIVVY BIKE STATION - 3 MIN
4. CAR SHARING - 5 MIN
5. GROCERY - 4 MIN
6. SCHOOL - 5 MIN
7. CLINIC - 3 MIN
8. PARK HOUSE - 5 MIN
9. DAY CARE - 5 MIN

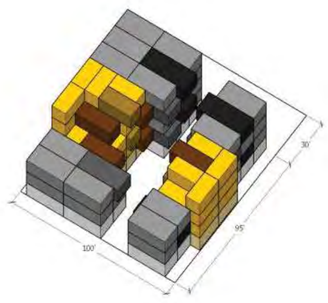
*1/4TH MILE WALK TAKES APPROXIMATELY 6 MINS.

SOCIAL WELLBEING

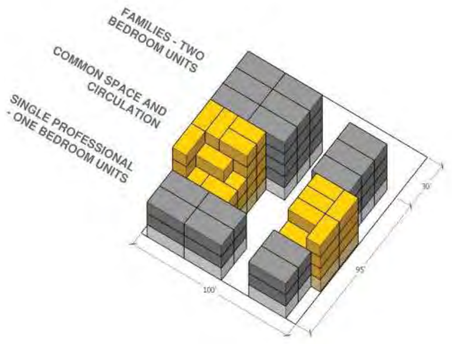
PEOPLE WHO LIVE IN SPACES THAT GIVE THEM A GREATER SENSE OF CONTROL OVER THEIR SURROUNDINGS, AND ENVIRONMENTS THAT FEEL SAFE ARE MORE LIKELY TO BUILD POSITIVE AND MEANINGFUL SOCIAL CONNECTIONS. ACCESS TO NATURE IS STRONGLY LINKED TO POSITIVE COMMUNITY BUILDING AND RESIDENT ENGAGEMENT.

1. INWARD FACING WINDOWS IN THE COURTYARD OFFER COMMUNAL EYES ON THE PUBLIC RELM, MAKING THE AREA MORE SECURE AND SAFE.
2. CREATION OF SEMI PUBLIC PEDESTRIAN WALKWAY THAT IS OPEN TO THE COMMUNITY AND THE RESIDENTS ALIKE TO PROMOTE CASUAL SOCIAL ENCOUNTERS.
3. STRATEGIC LIGHTING SOURCES ON THE PUBLIC PEDESTRIAN WALKWAY OFFERS SECURITY AT NIGHT
4. RAISED WINDOW SILLS AT UNITS ON THE GROUND FLOOR FOR INCREASED PRIVACY AND SECURITY
5. FLEX SPACES AND INSIDE/OUTSIDE COMMUNAL SPACES FOR INCREASED INTERACCTION BETWEEN PRESIDENTS AND THE COMMUNITY

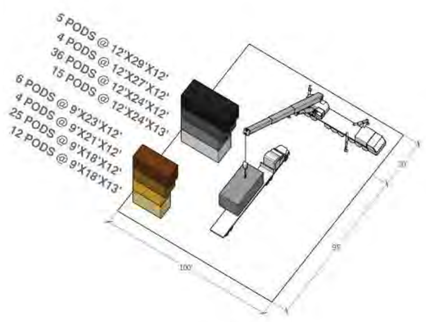
FINAL MODULE ARRANGEMENT [VARIED MODULE LENGTHS]

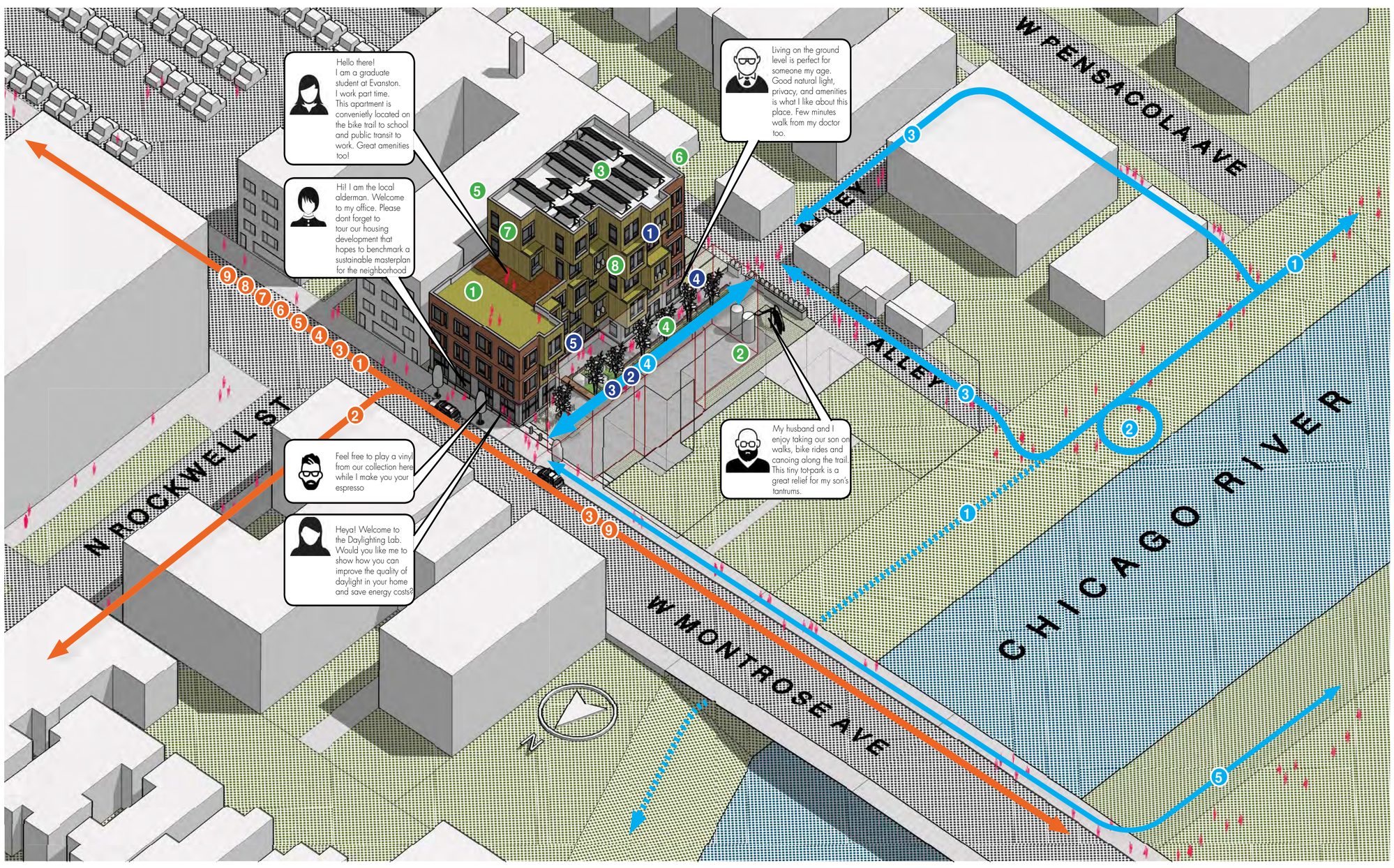


INITIAL MODULE ARRANGEMENT [CONSISTANT MODULE LENGTHS]



TYPICAL CONSTRUCTION + MODULE COUNT

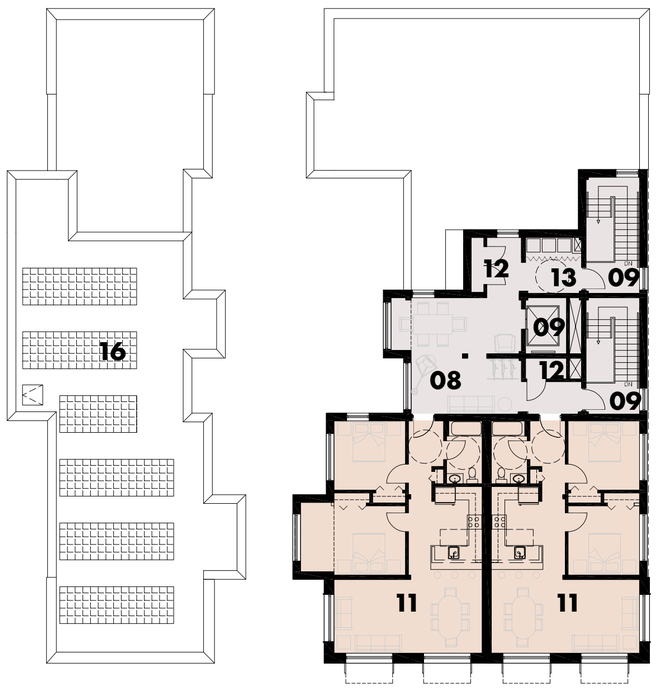




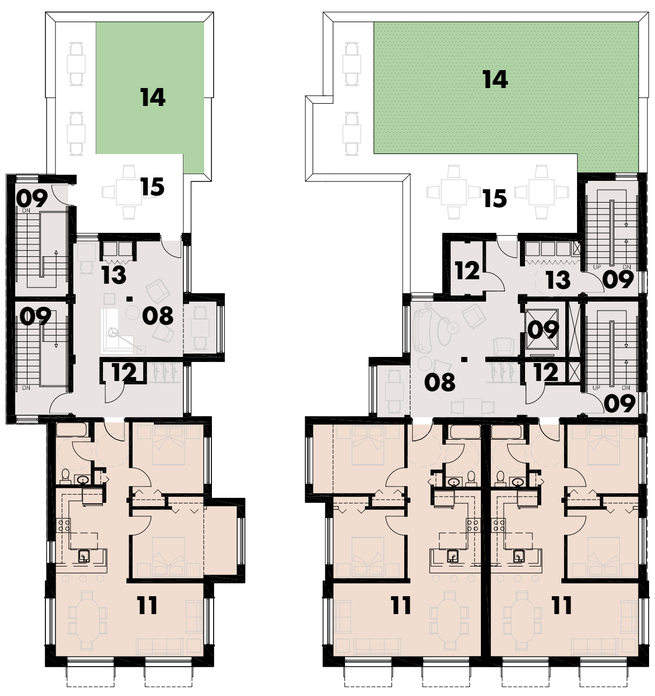
RIVER MODULAR - A Missing Middle Development

2567-2577 W. Montrose Avenue, Chicago

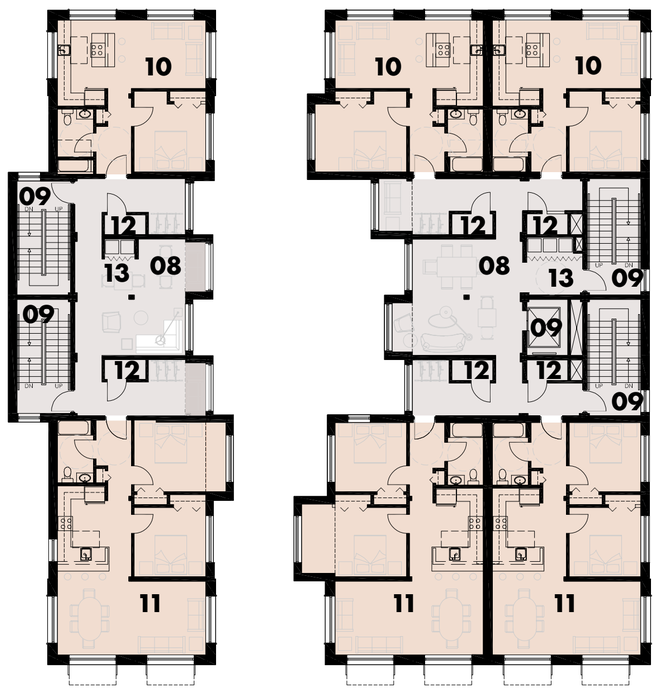
SCALE: 1/16" = 1'-0"



5TH FLOOR



4TH FLOOR



2ND + 3RD FLOOR

SITE + GROUND FLOOR

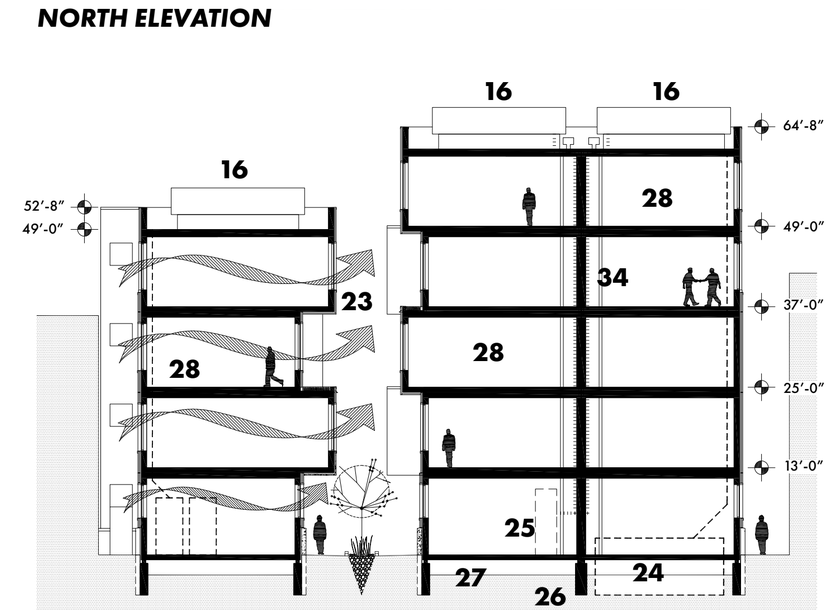
VIEW FROM MONTROSE AVENUE

SOUTH ELEVATION

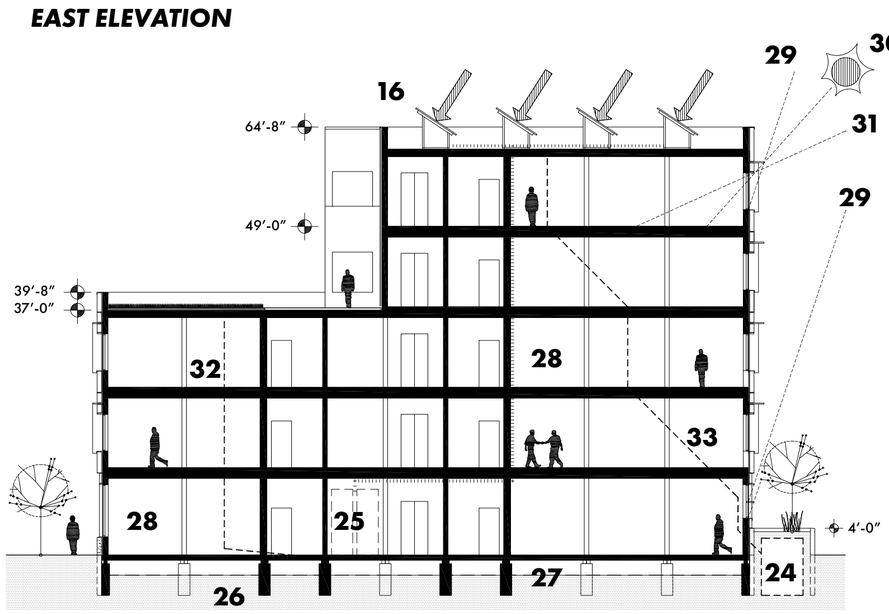
WEST ELEVATION

NORTH ELEVATION

EAST ELEVATION



TRANSVERSE SECTION



LONGITUDINAL SECTION

E. COURTYARD ELEVATION - NTS

W. COURTYARD ELEVATION - NTS

KEY

01 - Rain Garden
02 - Parking = (6) Onsite; (4) Offsite
03 - Bicycle Rack
04 - Unconditioned Storage/Trash
05 - Planters
06 - Playground
07 - Commercial Unit
08 - Common Area
09 - Vertical Circulation
10 - One Bedroom Unit
11 - Two Bedroom Unit
12 - Unit Storage + Bike
13 - Laundry
14 - Green Roof
15 - Roof Deck
16 - Photovoltaic Panels
17 - Terra Cotta Rainscreen
18 - Corrugated Metal Panels
19 - Cast in Place Concrete @ Building's Base
20 - Wood Plank Rainscreen
21 - Downspouts w/ Thru Wall Scupper
22 - Perforated Shading and Sun Screens
23 - Cross Ventilation
24 - Rain Cistern
25 - Photovoltaic Battery
26 - Isolated Footings
27 - 36" Crawl Space
28 - Prefabricated Modular Unit
29 - Summer Solstice
30 - Fall/Spring Solstice
31 - Winter Solstice
32 - Roof Runoff to Rain garden
33 - Roof Runoff to Cistern
34 - Utility Chase

VIEW FROM ALLEY

VIEW FROM PASSAGE ENTRY AT MONTROSE