

# — Eco-Share House —

Sustainable, communal, academic housing for eight

Before we begin, we would like to take a moment to acknowledge that we are currently residing on the unceded ancestral homelands of the Methow people. Our project addresses land that has been stewarded by the Indigenous people of the Methow Valley since time immemorial.

### **The Need**

- A sustainable, "Eco-Share" house located in the Valley and designed with the needs of both students and the community in mind.
- Provide housing for up to eight students while also modeling ecological housing design, filling some housing needs for local residents, and functioning as a community learning and gathering space.



Image: Dwell's favorite Outdoor Tree Photos <u>https://www.dwell.com/favorites/browse/photos/6527036876204335104?filter=6268417501073629189,6</u> <u>268811587396554794</u>

### **The Principals**

1. Sustainable design and environmentally responsible construction

2. Supportive and resilient intra-house community

3. Thoughtful and meaningful land stewardship



1. Interviews

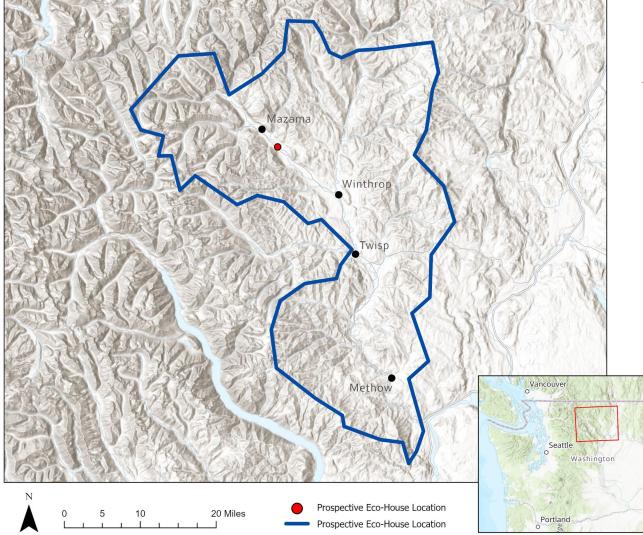
**Special Thanks:** Joshua Porter, Leyland Whittaker, Sarah Thomas, Elizabeth Hayes

2. Class Design Clinic

3. Research

### **The Context**





Methow Valley (blue) and prospective house location (red) within Washington State.

Data: USFS, ESRI, USGS



Leyland Whittaker's prospective Eco-Share house property (red) within the Methow Valley (blue).

Data: USFS, ESRI, USGS, NASA

20



Property map illustrating Lee Whittaker's "River to Raven" concept.

### **Sustainable Design- Construction and Efficiency**

- Southern aspect with sunshades for passive climate control
- Above ground design for flood resilience
- Lower-priority rooms & spaces used as "Insulation"
- Zonal electric "mini-split" heat & A/C
- On-site solar



Image: ArchDaily https://www.archdaily.com/800289/lean-to-house-warc-studio/583b5e7ee58ecebc930000e1 -lean-to-house-warc-studio-photo?next\_project=no

### **Sustainable Design-Livability**

- Open-plan communal spaces
- Emphasis on natural light
- Spatial and acoustic separation of shared and private spaces



Image: Hanson Fine Building https://www.hansonfinebuilding.com/projects/residential/wallingford-residence-2/

### **Sustainable Design-Concepts**



#### Image: ArchDaily

https://www.archdaily.com/800289/lean-to-house-warc-studio/583b5e7ee 58ecebc930000e1-lean-to-house-warc-studio-photo?next\_project=no



Image: North River Architecture https://nriverarchitecture.com/catskills-passive-house-concept

### **Intra-House Community**

- House Values Statement
- Cohort Specific Contract
- Community Committees
- Scheduled House Meetings
- Cozy Interior
- Provided Games and Instruments
- House Upkeep
- Connection to McKinney Ridge



### House Values Contract

A Philosophy

A Catalyst of Change

A Space of Education

A Model of Sustainability & Stewardship

### **Cohort Specific Contract**

- Cleaning and upkeep of home
- Company/visitors
- Noise/quite time
- Conflict resolution

- Allergies and dietary restrictions
- Personality types (Myers-briggs)
- Shared vs. communal food

### **Community Committees**

- Garden committee
- Greenhouse committee
- Communal meal committee
- Cleaning committee
- Community well-being committee
- Sustainability Committee

### House Meetings

- Bi-weekly
- After a communal meal
- Anonymous submission box
- Mediator if needed

### **Cozy Interior**

- A large sectional couch
- A plethora of blankets and cushions in the living area
- Soft fabrics
- Non-overhead lighting
  - Lamps
  - String lights
- Plants
  - Also serves as stewardship of the home
- Local and student art
  - Contributes to sense of place
  - Supports local community



Image: Dwell's favorite Living Photos https://www.dwell.com/favorites/browse/photos/6133532462333800448?filter=6268417501073629187



Image: Dwell's Favorite Living Photos https://www.dwell.com/favorites/browse/photos/6565690667007303680?filter=6268417501073629187



Image: Barcelona, Day One https://www.dwell.com/collection/6133686252158631936/6133686197968224256

### **Games and Instruments**

- Yard games
  - croquet, corn-hole
- Board games
   Chess, Settlers of Catan, Ticket to Ride
- Sports equipment

   volleyball, soccer ball
- Local recreation Equipment
  - o bikes, river tubes, kayaks, paddle boards

### Support Local Businesses

- The Methow Valley Senior Center Rummage Room
  - <u>https://methownet.com/senior\_center.html</u>
- Winthrop Mountain Sports
- Cascades Outdoor Store
- Goat's Beard Mountain Supply



http://www.winthropmountainsports.com/ind ex2.html



https://cascadesoutdoorstore.com/



https://goatsbeardmountainsupplies.co m/

### **Musical Instruments**

#### • Guitar

- Mandolin
- Banjo

Music assists in developing social identity, connecting with others, maintaining well being, experiencing and expressing spirituality, maintaining positive esteem, feeling competent and independent, and helps avoid feelings of isolation and loneliness - Oxford Handbook of Music Psychology

- Bongo
- Cymbal

### PLAY DANCE EXPRESS

### **Communal Meals**

- Voluntary sign up
- 3x week goal
- All members of house welcome
- Allergies and dietary restrictions
- Leftovers saved for missing members
- Provided food staples:
  - Oil
  - Salt and Pepper
  - Flour
  - Dry beans

### **Kitchen and Dining Space**

- Multiple fridges
- Ample cabinet space
- Quality pots and pans
- Large dining table
- Open kitchen



Image: Barrel-Vaulted Ceilings Cap an Architect's Off-Grid Retreat in Mexico <u>https://www.dwell.com/article/casa-terreno-fernanda-canales-arquitectura-572177fd/65656906642810</u> 06080



Image: Modern Massive Wood Dining Tables That Will Amaze You https://www.topdreamer.com/modern-massive-wood-dining-table



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### House Upkeep

- Dishes
- Personal belongings in communal spaces
- Sweeping
- Garbage/recycling/compost
- Dusting
- Vacuuming (if there is carpet)
- Bathrooms
- Refrigerator

- Chore chart
- Chore wheel

### House Calendar & Event Board

- Community events
- House meetings and meals
- Chalk wall



Image: How to Create a Chalkboard Wall: 12 Top Tips and ideas <u>https://www.realhomes.com/advice/how-to-create-a-chalkboard-wall</u>

### Connection with McKinney Ridge River To Raven

- Cohousing community
- Restoration project
- Wood fire stove
- Art pieces



Image: McKinney Ridge Neighborhood https://methowhousingtrust.org/mazama





### Meaningful Stewardship

- Welcoming outdoor space
- Communal garden
- Local stewardship opportunities



### **Welcoming Outdoor Space**

- Gathering spaces
  - Playing fields 0
  - Private places 0
  - Firepit Ο
  - Pizza oven Ο
  - Shaded areas  $\bigcirc$

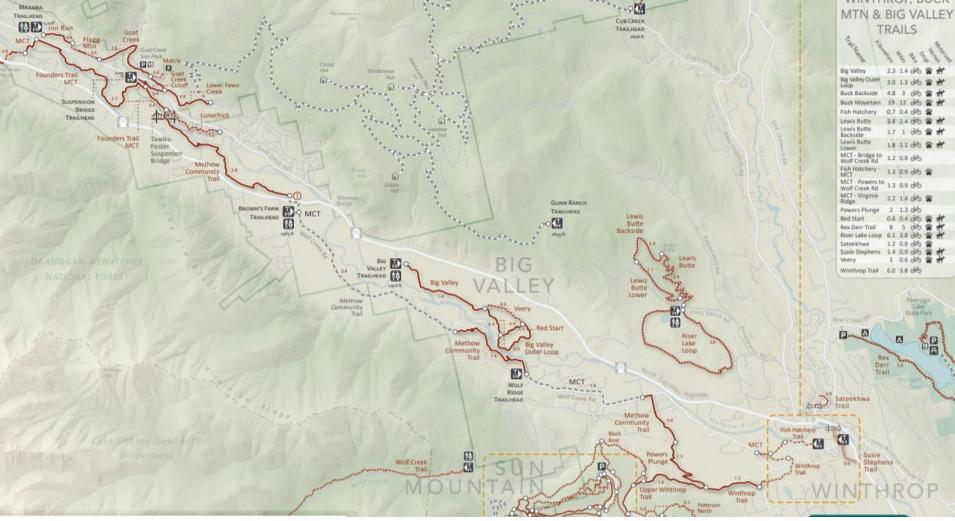


https://www.tripadvisor.com/LocationPhotoDirectLink-g58794-d3176282-i 299738489-Twisp River Suites-Twisp Washington.html



https://www.pinterest.com/pin/82683343138080621

http://www.greenhome123.com/product/heavy-duty-cast-ir on-outdoor-patio-fire-pit-cauldron-with-cover-moon-starssky/



https://d3mgmy22owj503.cloudfront.net/40/500040/files/MT-SUMMER-TRAILS-2020-AVENZA.pdf

### **Communal Garden**

- Less than ¼ area
- Cover crops
- Located near water source
- Located near greenhouse
- Garden shed
- No animals
- Compost bins



http://www.classroominbloom.org/food



https://www.hgtv.com/outdoors/landscaping-and-h ardscaping/does-compost-bin-need-bottom



composting-bin/

### **Native Plants**

- Serviceberry
- Kinnikinnik
- Oceanspray
- Mock Orange
- Buffaloberry



Holodiscus discolor



Amelanchier alnifolia



Arctostaphylos uva-ursi



Philadelphus lewisii



Shepherdia canadensis

### **Stewardship**

- Native plant propagation
- Salmon restoration (in partnership with the Yakama Nation)
- Game cameras
- Bird surveys
- Forest management
- Education outreach
- Trail building
- Weed control
- Phenology stations

DATE	DOY	LOCATION	OBSERVER	EVENT
3/5/2020		ELC	Lindsay McCord	Lots of deer activity close to campus
3/6/2020		Marblemount	• Lindsay McCord	Calf born on farm just upriver from Diobsud Creek Bridge. Coyote observed eating the placenta in the field.
3/8/2020		Skagit River	Lindsay McCord	Eagle pairs hanging out around nest sites all up and down the Skagit River
3/17/2020		Marblemount	Sarah Meyer	Mergansers on the Skagit
3/17/2020		Marblemount	Lindsay McCord	Robins are in abundance and observed mating in the Confluence Garden
3/17/2020		Marblemount	Lindsay McCord	First day over 60 degrees of 2020
3/19/2020		Marblemount	Lindsay McCord	Red Breasted Sapsuckers drumming in the Confluence Garden
3/19/2020		Marblemount	Lindsay McCord	Most trees have buds ready to burst
3/14/2020		Marblemount	Lindsay McCord	Common Snowdrop flowering
3/15/2020		Marblemount	Tanner Johnson	Beaver tracks on Confluence Beach
3/19/2020		Marblemount	Sarah Meyer	Bees active
3/19/2020		Diobsud Creek	Lindsay McCord	Willow is flowering and leafing out, an abundance of fresh beaver chews where the power line road meets Diobsud Creek
3/20/2020		Hamilton	Molly Harrigan	Salmonberry flowering and Mullein's return
3/19/2020		ELC	Katie Manz	River Otter at dusk observed from the Pennisula Trail
3/22/2020		Marblemount	Lindsay McCord	2 Turkey Vultures soared over Confluence Garden. First ones observed back in the valley this spring!
3/24/2020		Marblemount	Lindsay McCord	Grouse are drumming quite consistently
3/23/2020		Marblemount	Lindsay McCord	Periwinkles flowering on lawn
3/25/2020		Marblemount	Lindsay McCord	Salmonberry flowering and Mullein's return
3/25/2020		Marblemount	Lindsay McCord	Bald Eagles have been noticiably absent upriver.
3/28/2020		Baker Lake	Lindsay McCord	Fresh Artist's Conks are fruiting!
3/28/2020		Marblemount	Lindsay McCord	Two Barred Owls calling back and forth for about an hour around 11pm from the direction of Diobsud Creek.
4/4/2020		ELC	Zoe Wadkins	Diurnal wind return around 1pm every day
4/5/2020		Marblemount	Zoe Wadkins	Common Blue and Downy Yellow Violets in full bloom
4/5/2020		Marblemount	Zoe Wadkins and Justin Daniels	Rufous Hummingbirds return to Upper Skagit
4/10/2020		ELC	Zoe Wadkins	Large, cinnamon colored Black Bear grazing on grass in Buster Brown
4/10/2020		ELC	Zoe Wadkins	Flowering Red Currant in bloom

#### Observations by students at the North Cascades Institute, early spring 2020

## **Thank You**