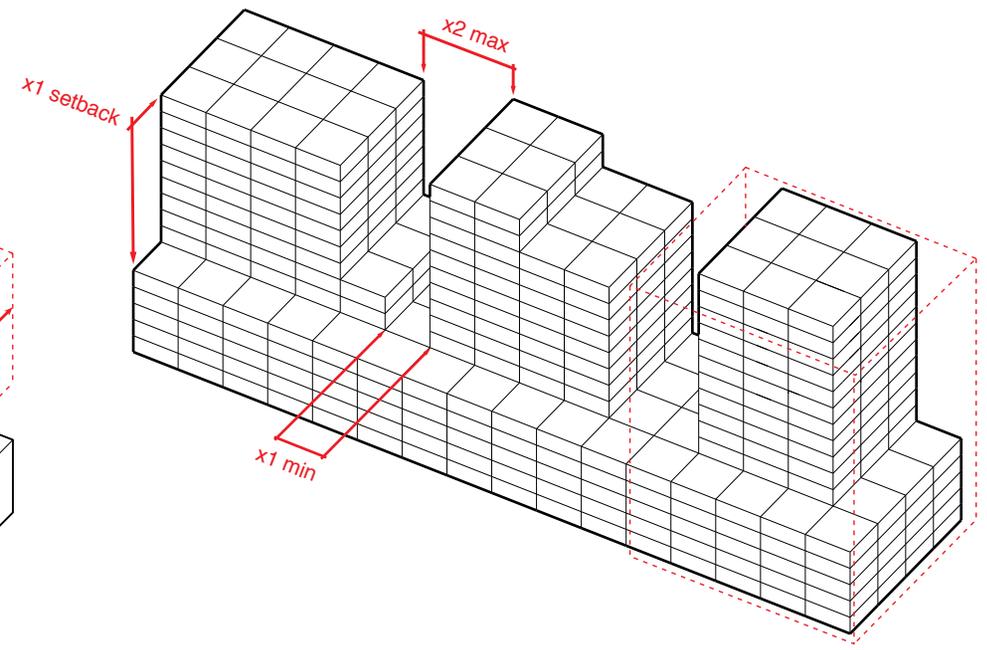
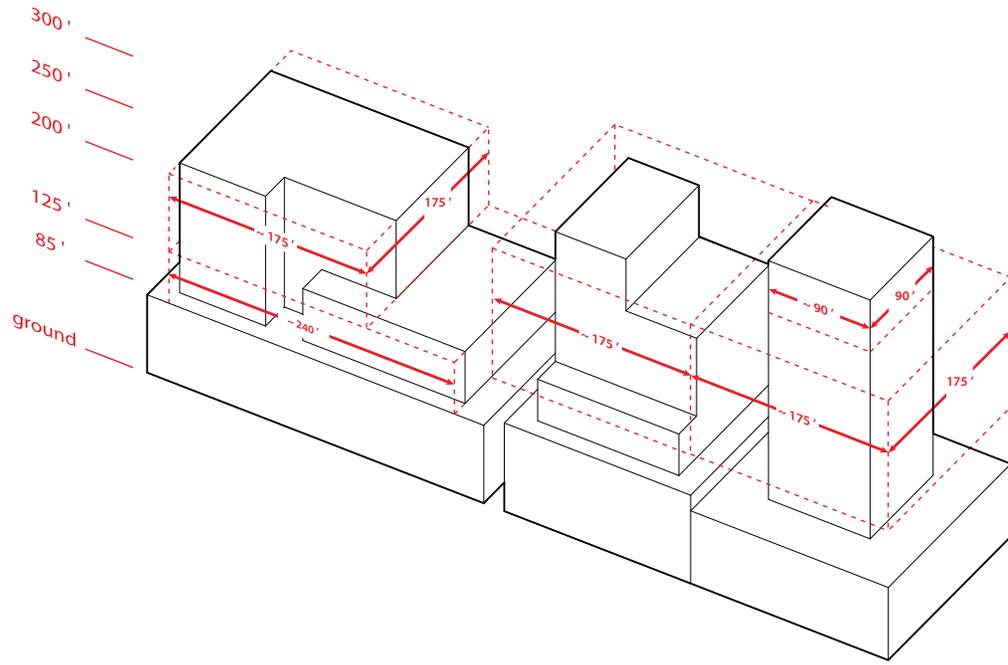
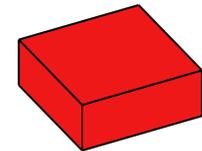
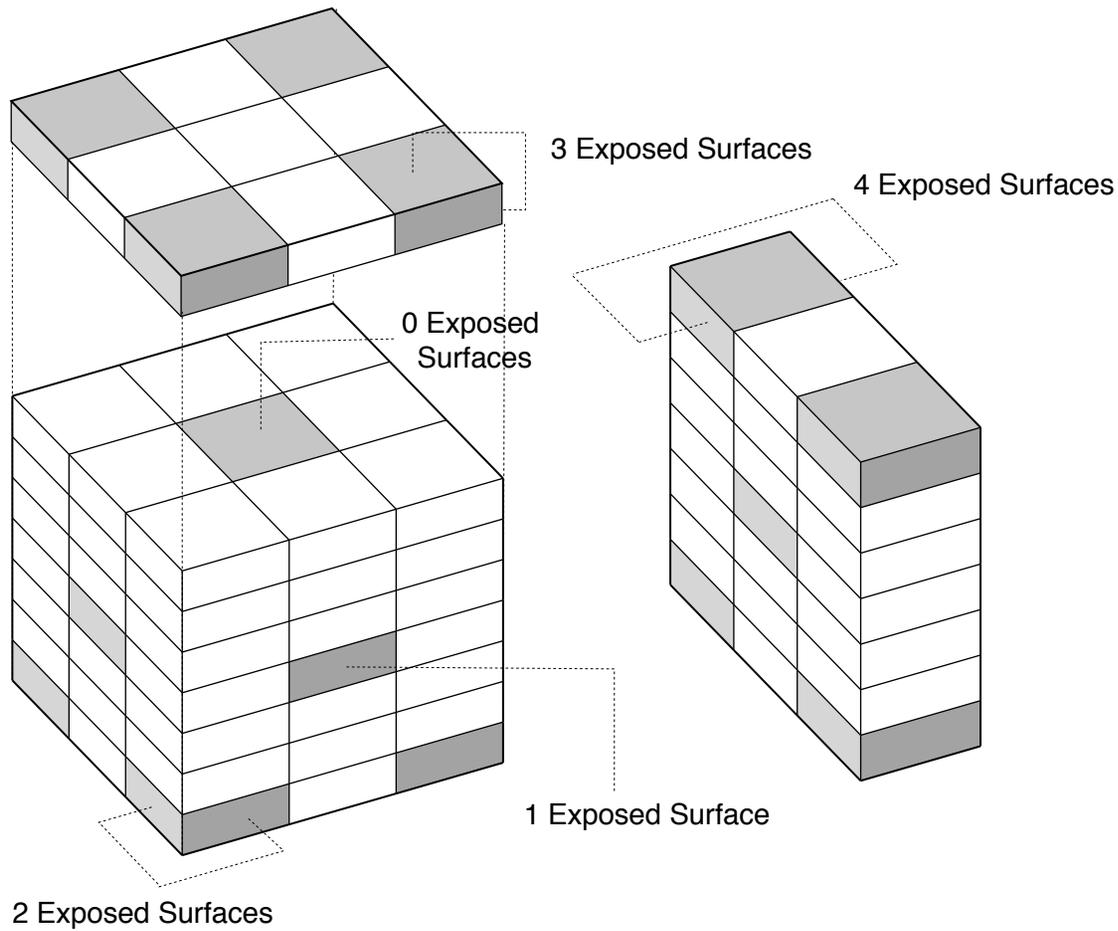
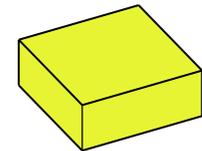


***KENDALLEGOS!***<sup>®</sup>

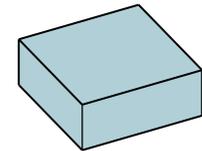




**Commercial Schedule**  
 WWr: 80%  
 131.39 kWh/m<sup>2</sup>



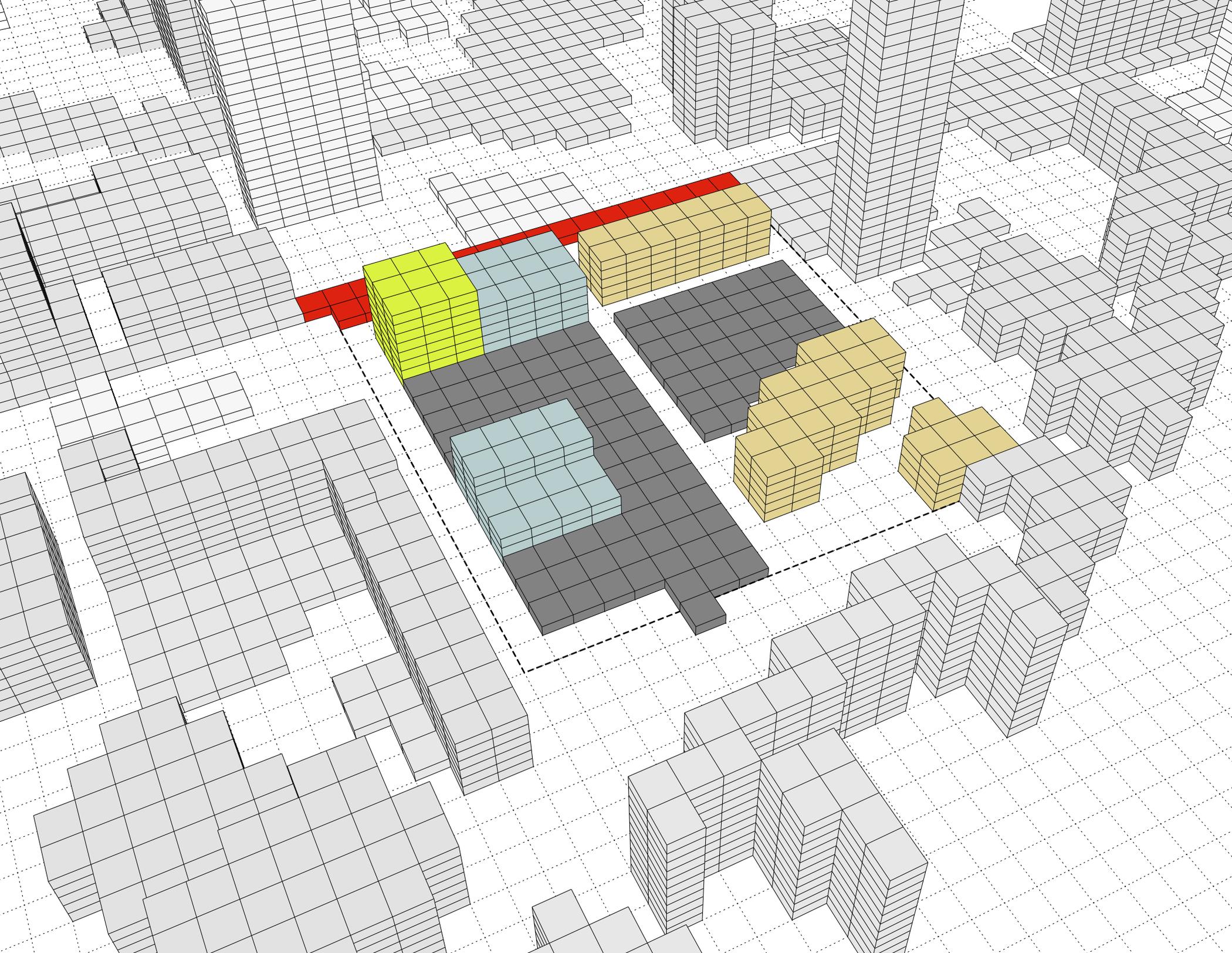
**Residential Schedule**  
 WWr: 35%  
 171.87 kWh/m<sup>2</sup>

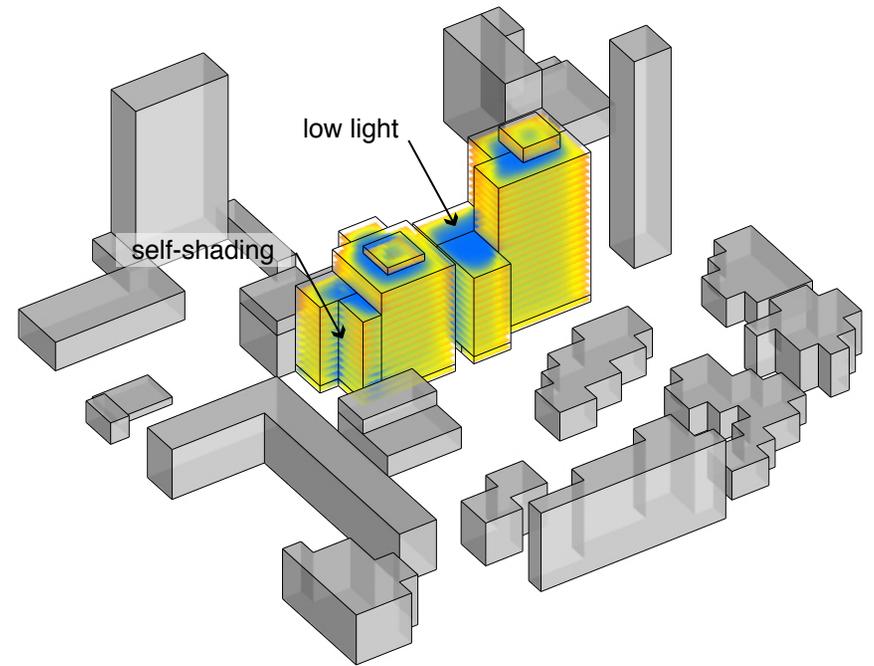
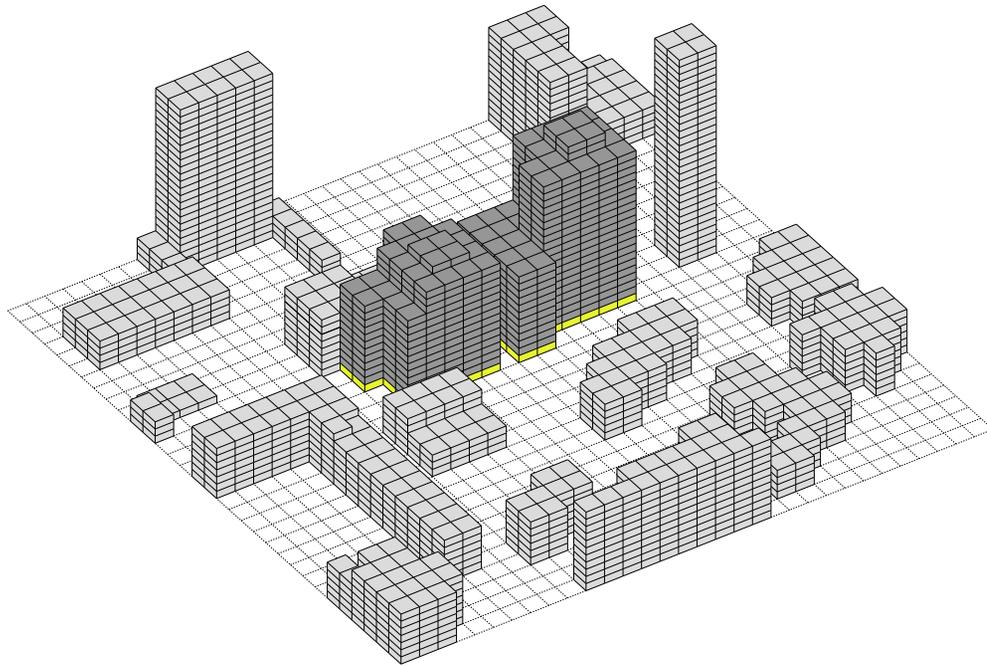


**Office Schedule**  
 WWr: 45%  
 131.39 kWh/m<sup>2</sup>

Avg kWh = (  $\sum$  kWh/m<sup>2</sup> ) / 17







57% Daylit at 300 lux

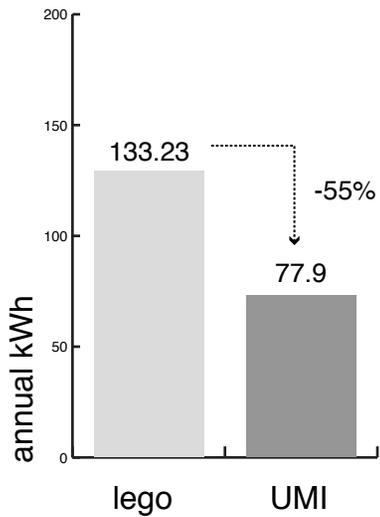
**SCENARIO 1**

**KEY ASSUMPTIONS:**

ASHRAE 90.1 standard for comparisons  
wwr held constant at 35% and 65% (retail)  
gross floor area held constant

residential schedule + weekends  
office schedule (8am - 6pm)

**KEY FINDINGS:** 55% discrepancy



**CONSTRUCTION COST: \$58,040,824**

*Per Lego: \$59,165*

**“This is about  
gentrification”**

**“high-tech industry wants to come to  
Cambridge because of graduate students,  
not because of commercial buildings”**

**“public distortion”**

**“someone who isn’t a scientist  
has no reason to go to Kendall  
Square”**

**“we have a responsibility to  
cluster growth in Kendall Square”**

**“MIT doubles down  
on Kendall Square  
redevelopment”**

**“It’s people versus money”**

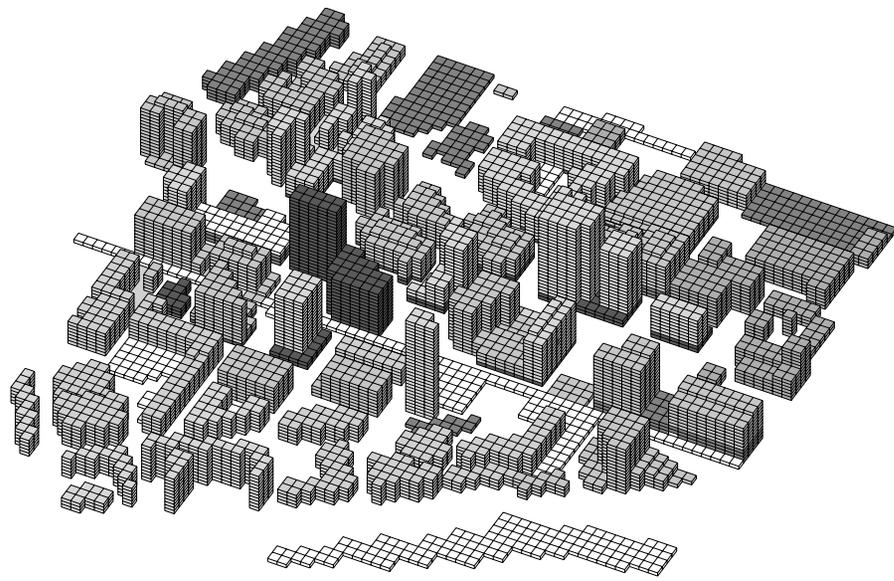
**“Yes, in my  
backyard!”**

**“Land for MIT campus de-  
velopment in Cambridge is  
unique and irreplaceable”**

# Variant A: A Commercial Office Focused Plan to Optimize Economic Value

[K2C2 Plan]

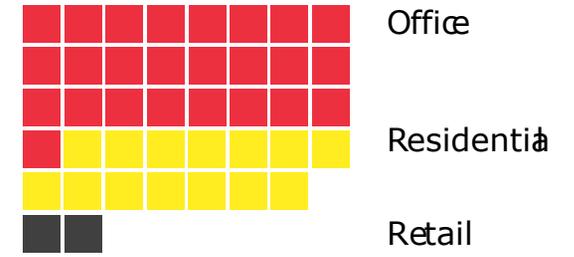




Variant A LEGO Model

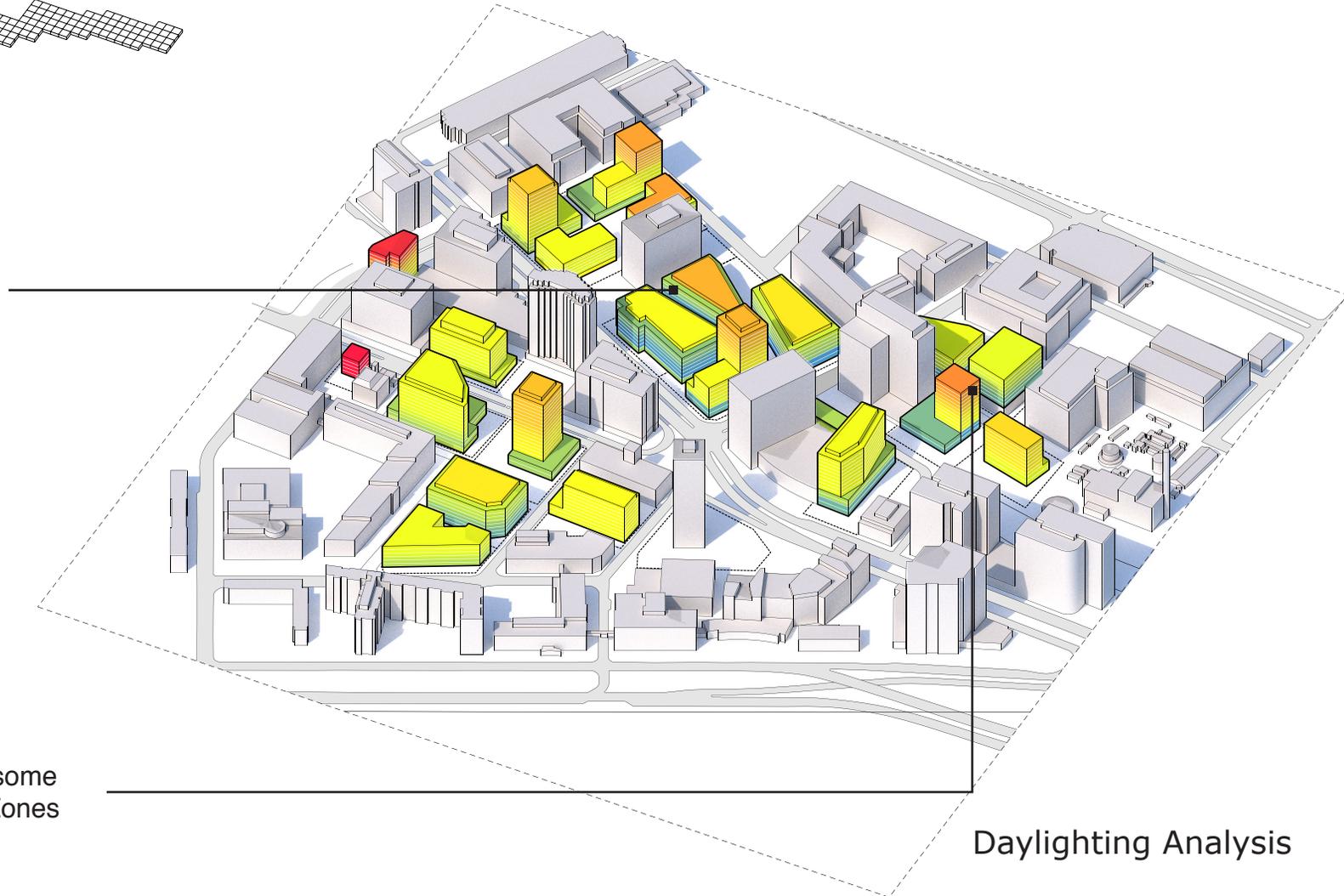
### Gross Floor Area by Program

□ = 10,000 m<sup>2</sup>



Problematic Deep Floorplates

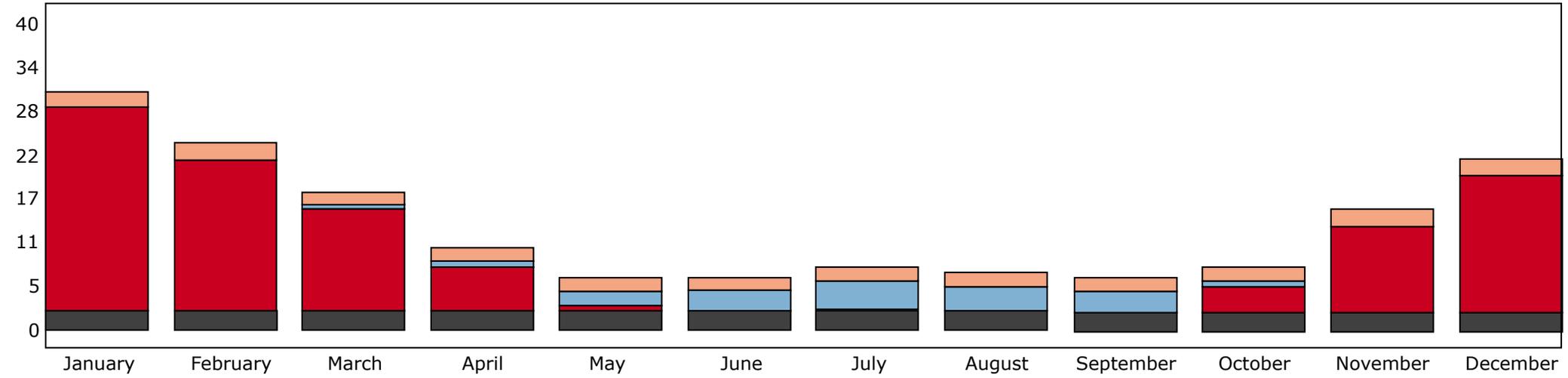
Troublesome Shady Zones



Daylighting Analysis

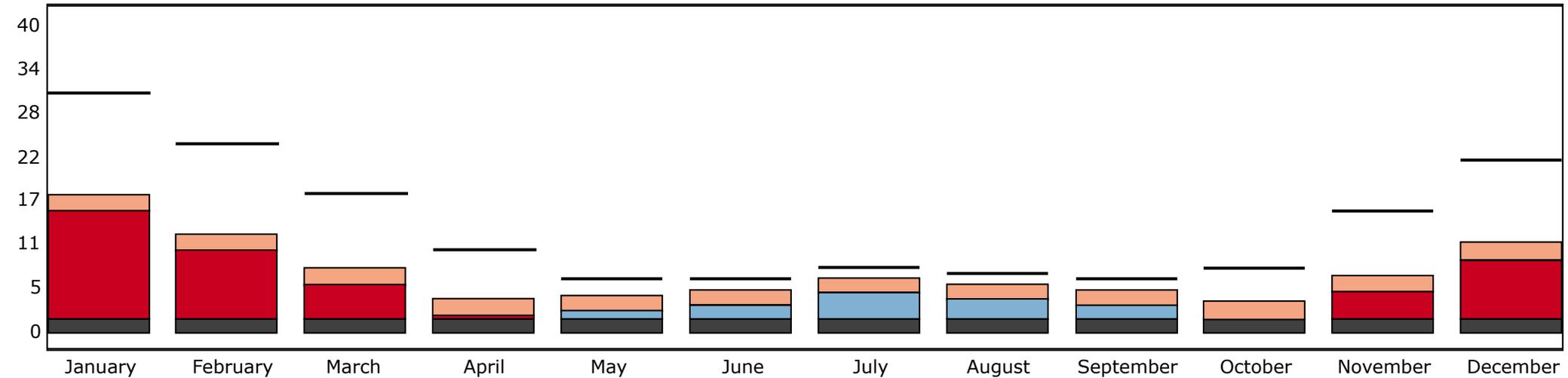
# Energy Performance

Office

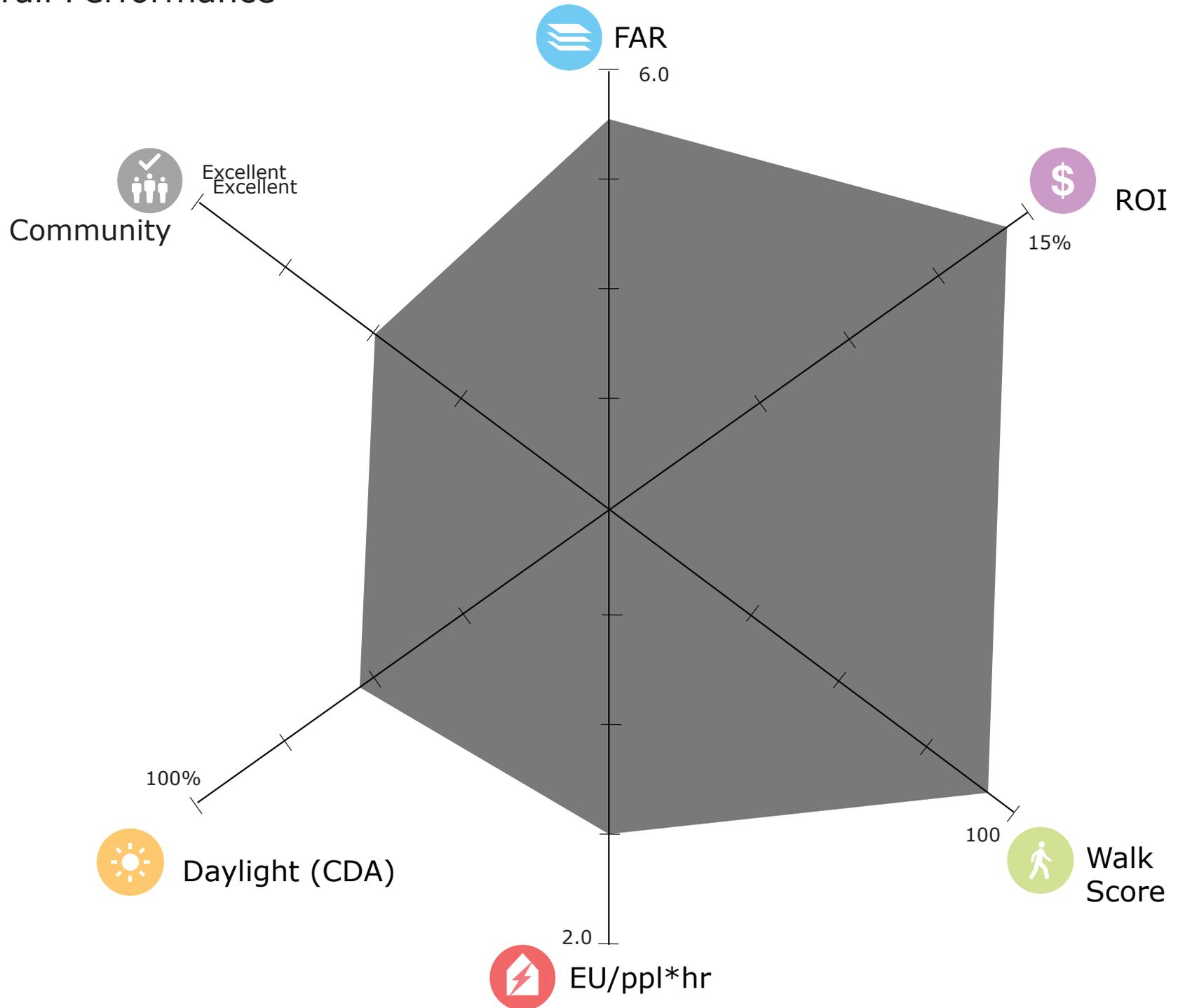


- Heating
- Lighting
- Cooling
- Equipment

Residential



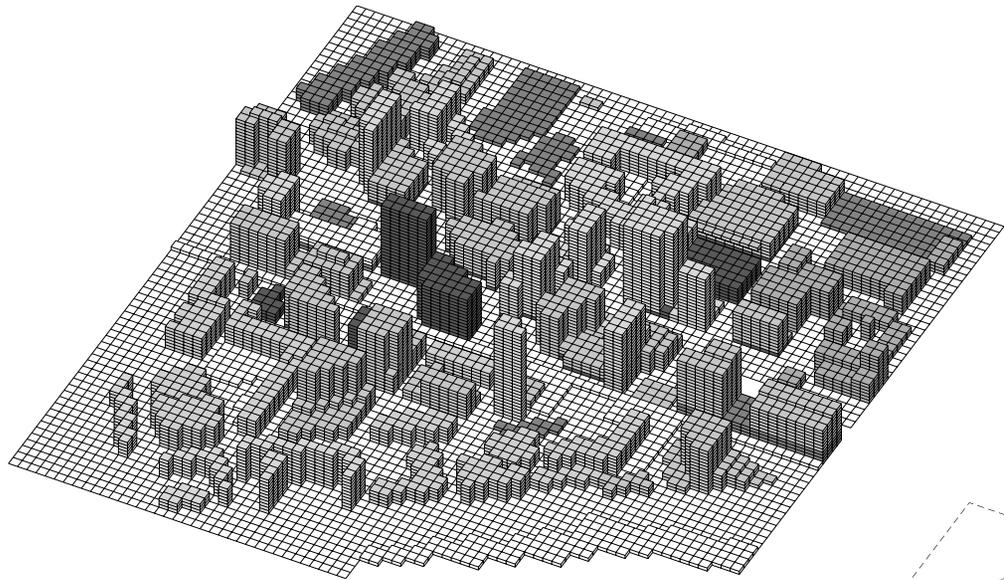
# Overall Performance



# Variant B: A Residential Focused Plan to Provide More Housing Options

[CBT Plan]

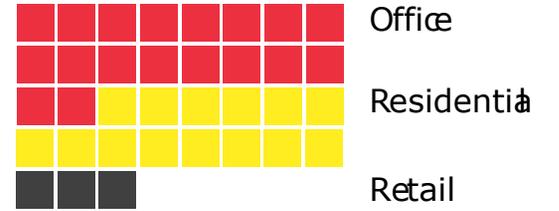




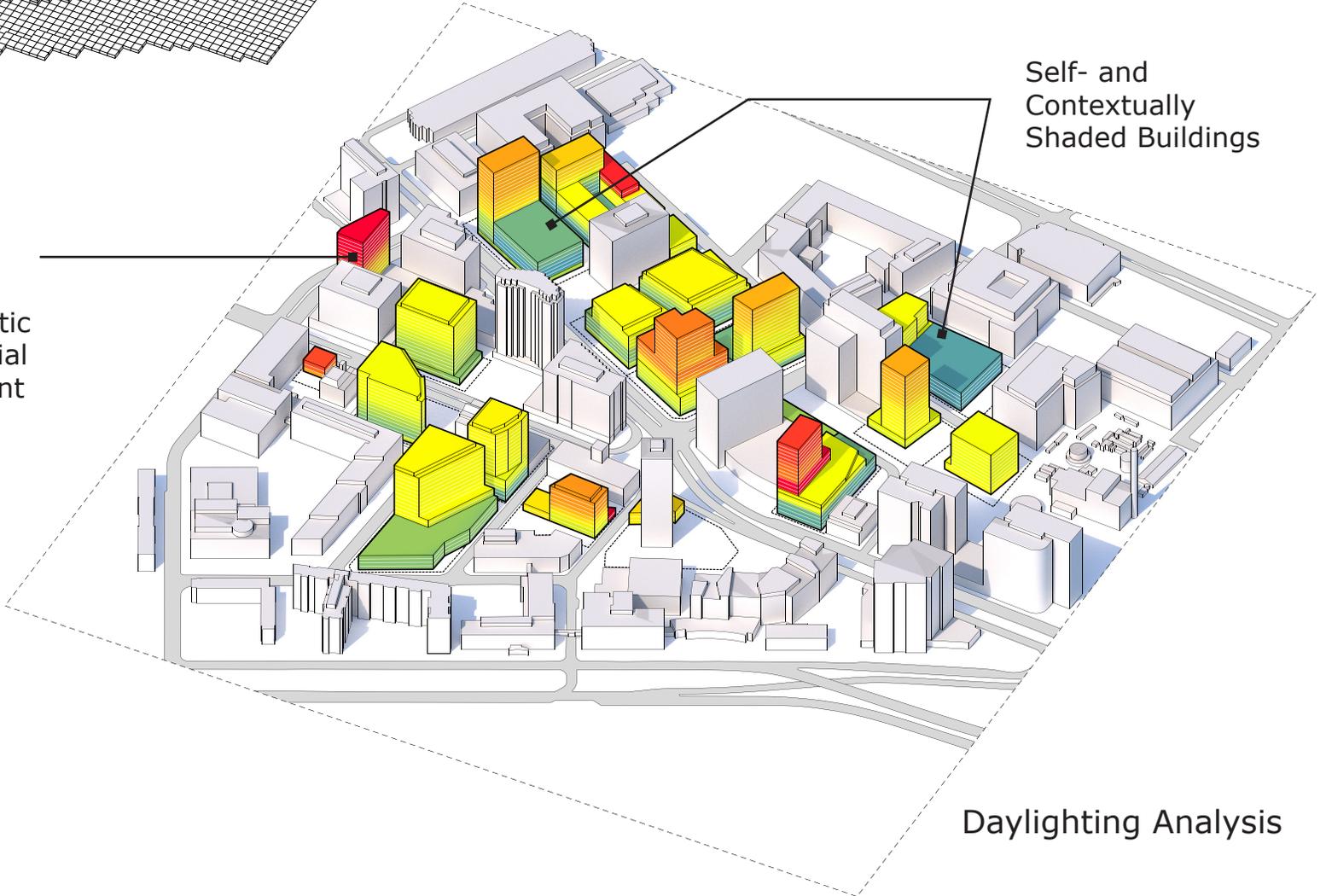
Variant B LEGO Model

### Gross Floor Area by Program

□ = 10,000 m<sup>2</sup>



Narrower Floorplates  
Characteristic  
of Residential  
Development

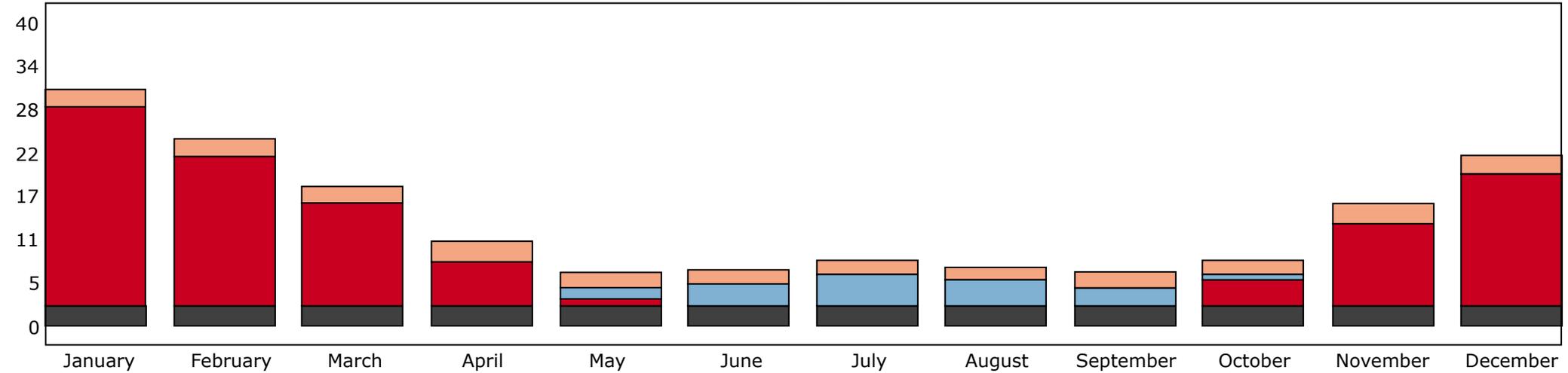


Self- and Contextually Shaded Buildings

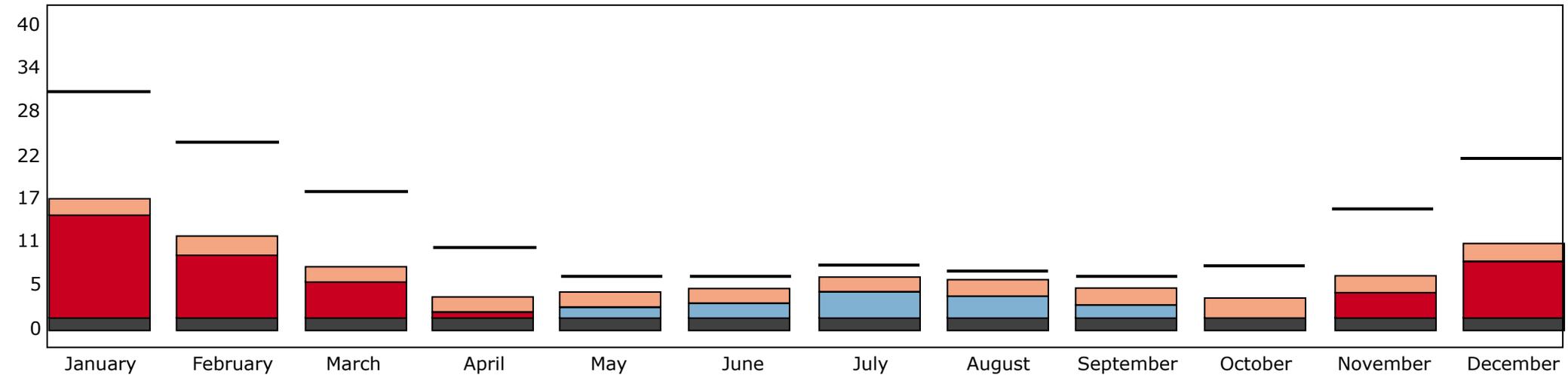
Daylighting Analysis

# Energy Performance

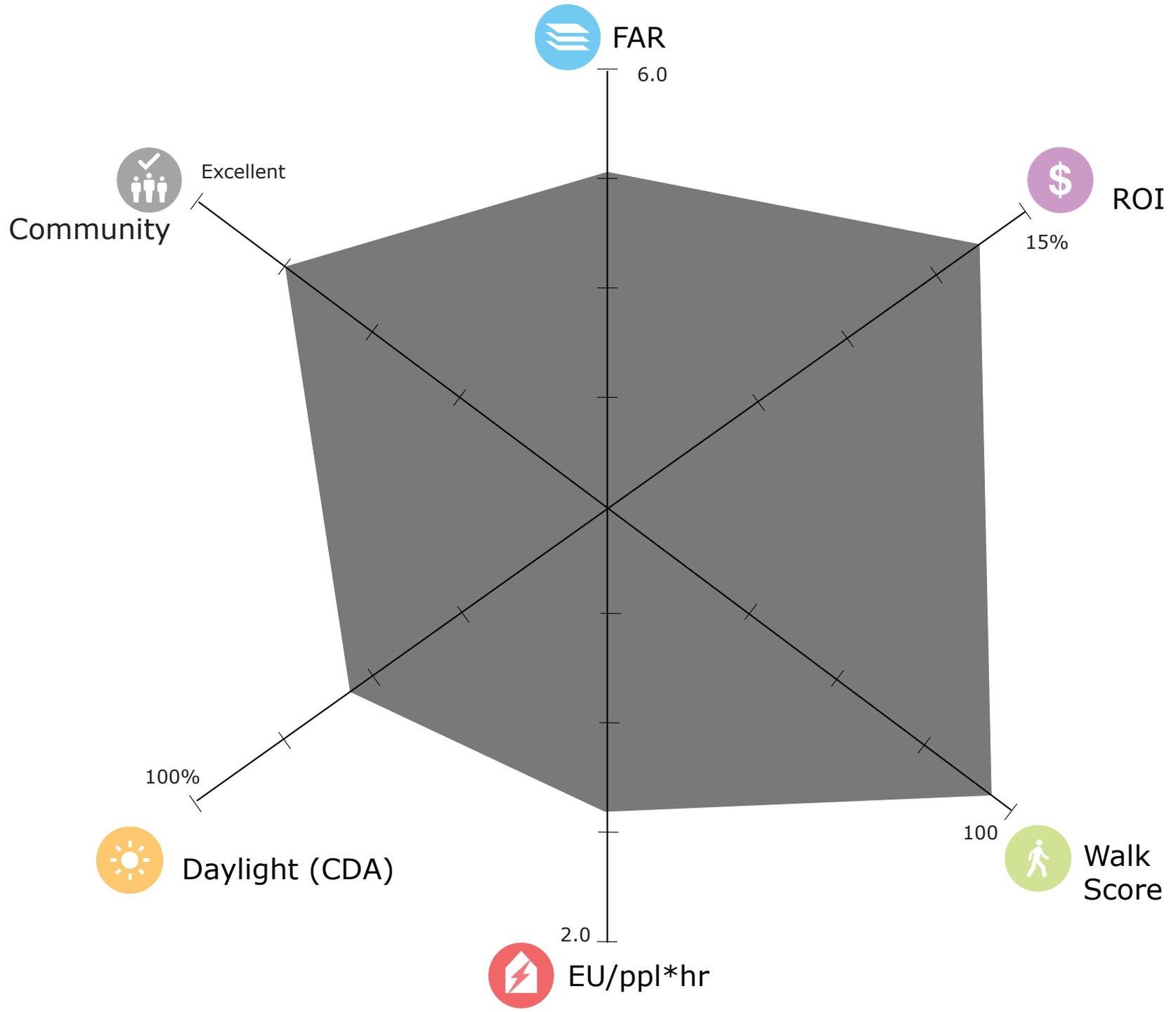
Office



Residential



# Overall Performance

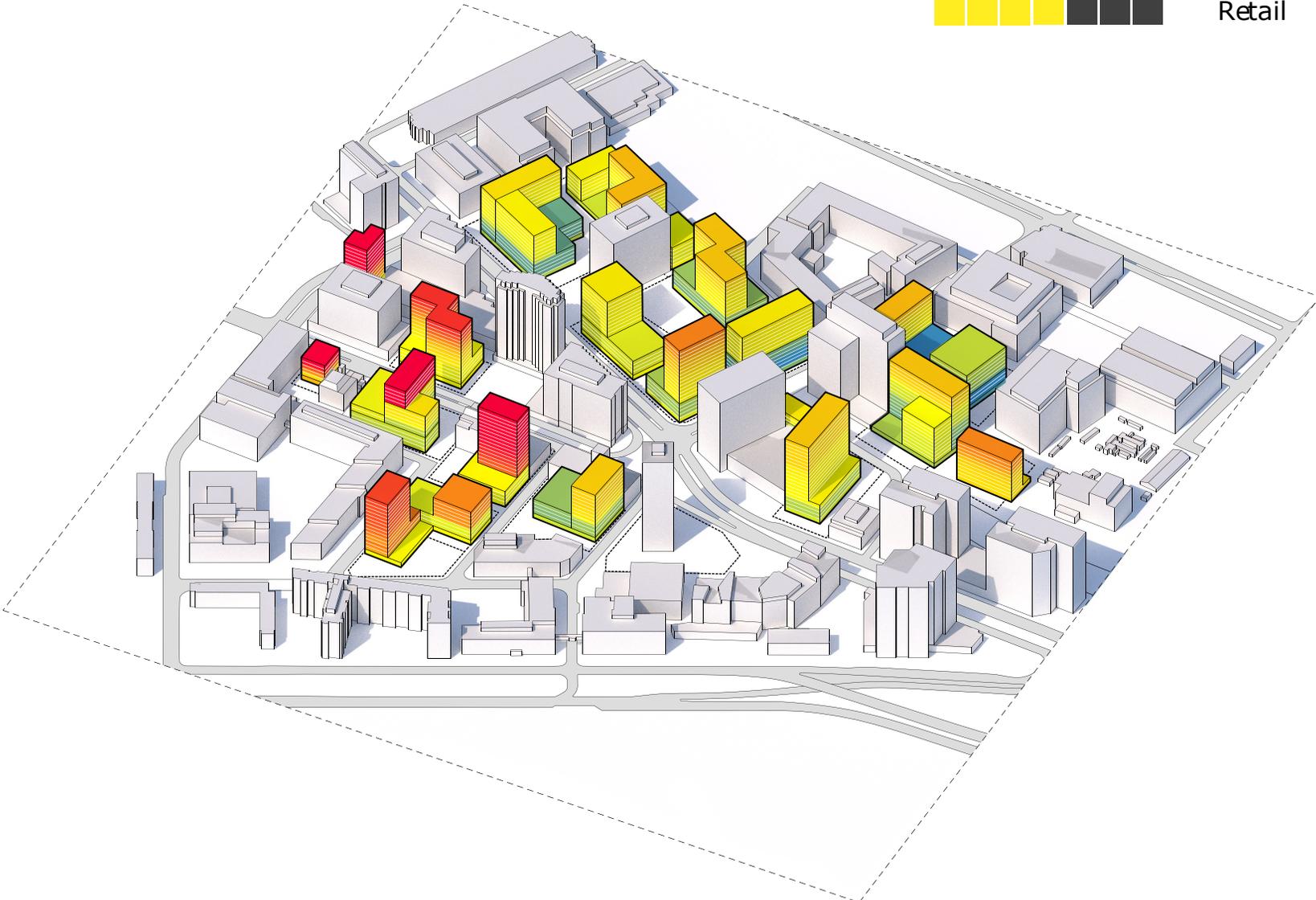


# Variant C: A New Alternative for a More Sustainable Community



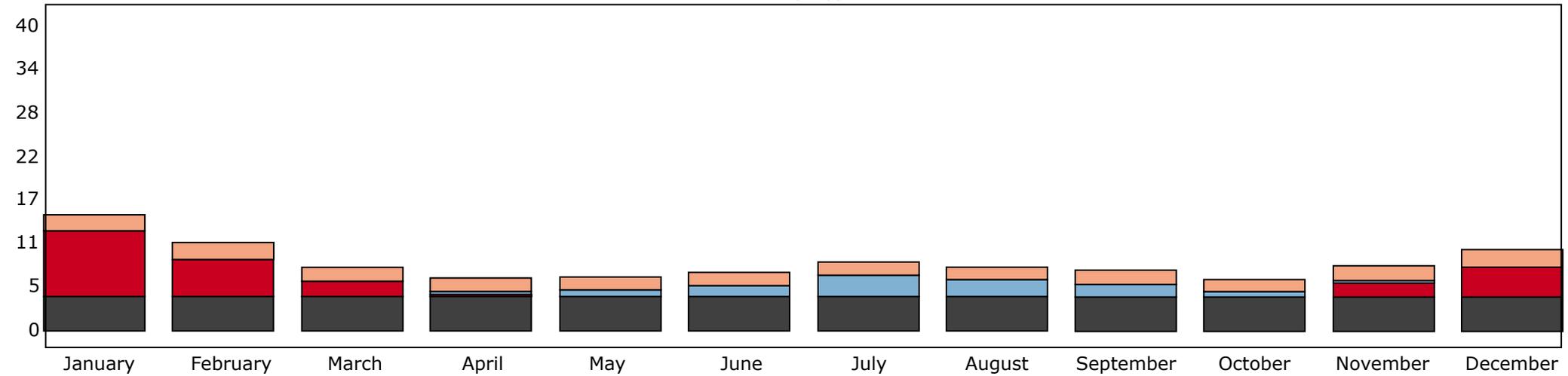
# Daylighting Analysis

## Gross Floor Area by Program

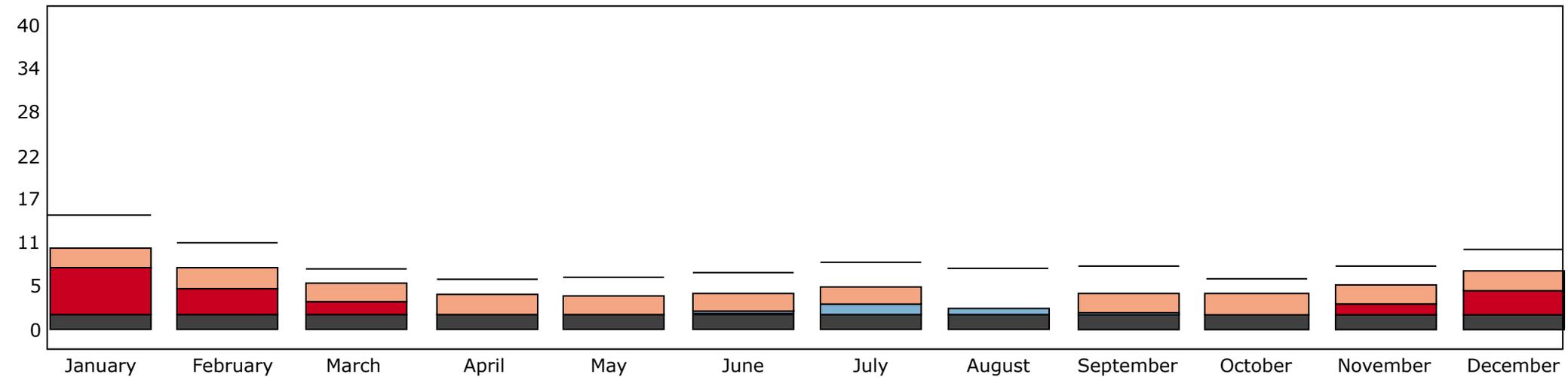


# Energy Performance

Office



Residential



# Overall Performance

 **5.4**  
Density[AR]

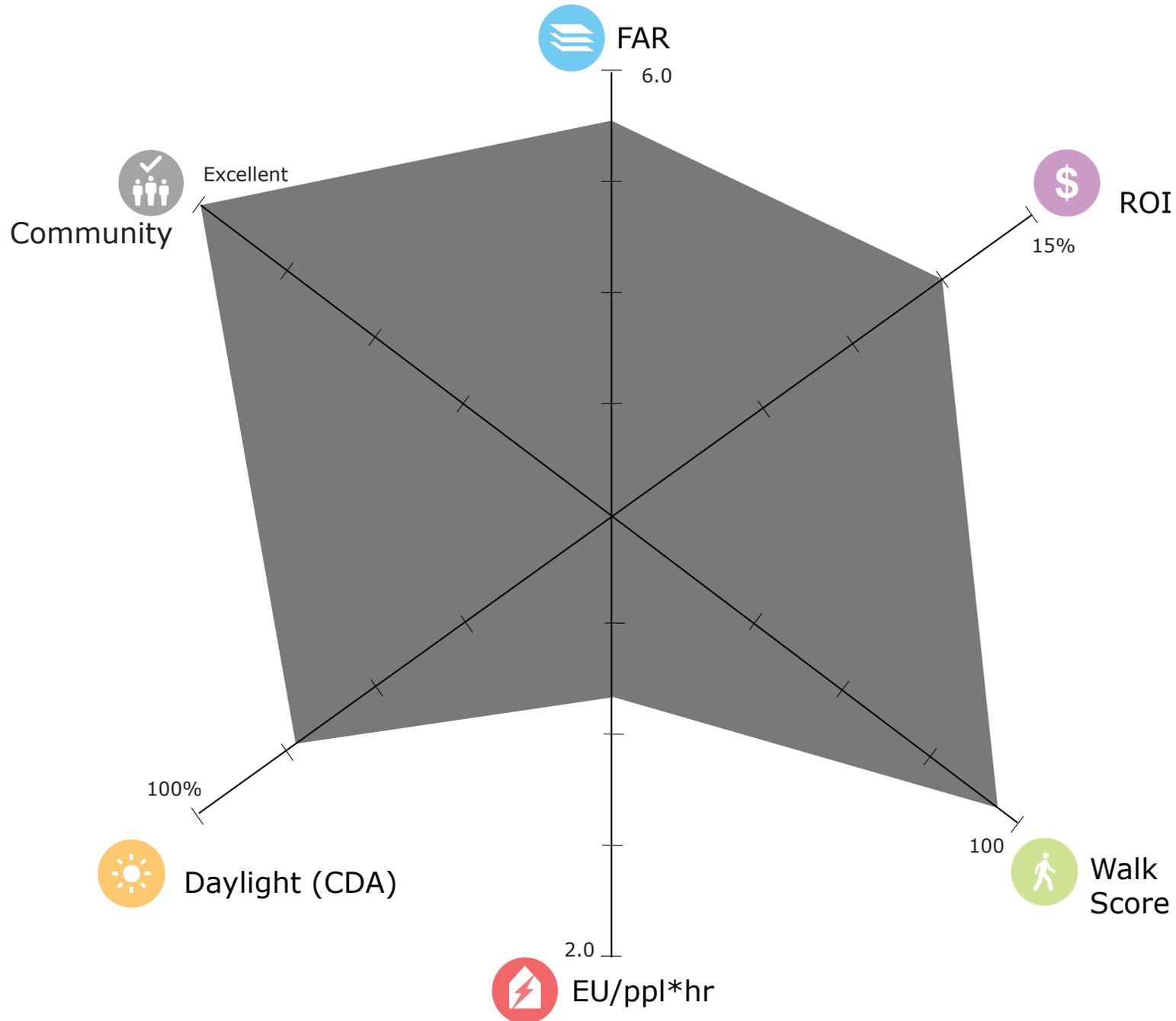
 **12.9**  
Finance[IRR]

 **86**  
Energy[kWh/m<sup>2</sup> a]

 **74**  
CDA[%]

 **94**  
Accessibility[%]

 **Excellent**  
Community



# Financial Sensitivity Analysis

