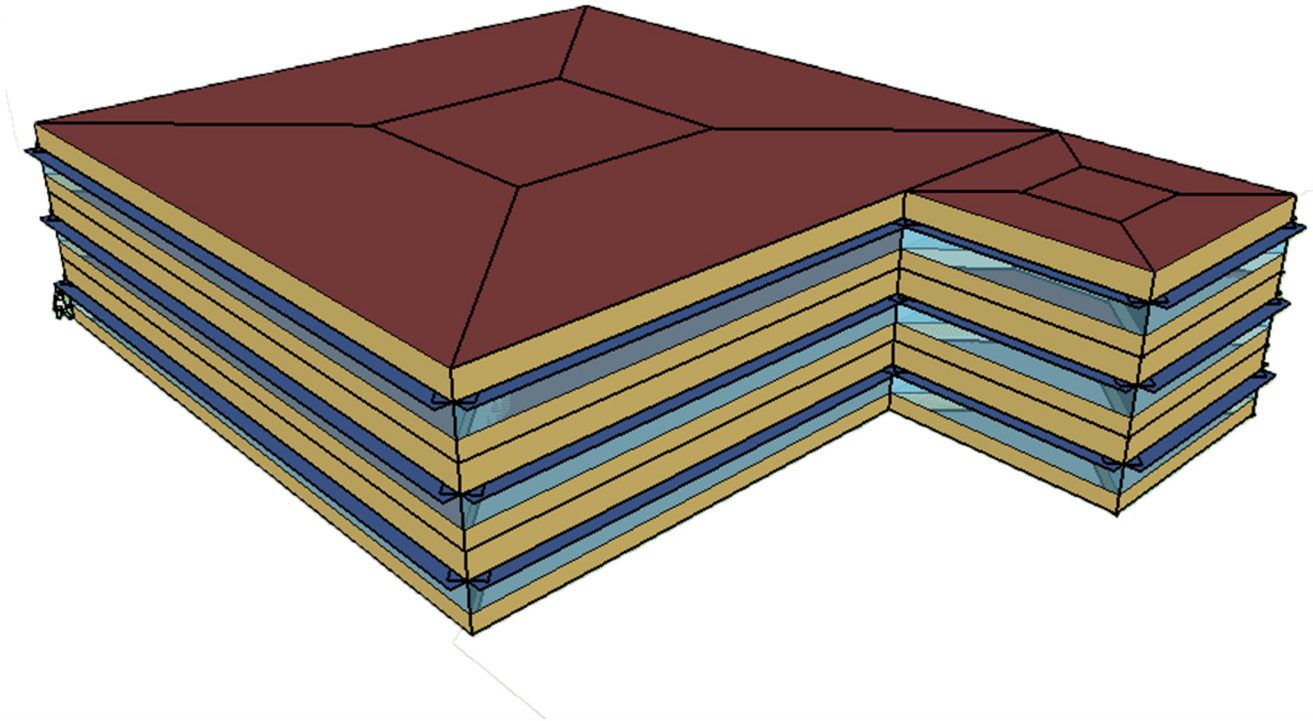
GROUP T10

Samira Habibi
Tina Kolahdooz
Alan Minouei
Yasamin Yaghmaei

project building

Function : Office

Total Area: 3000 square meter



Layers:

Beijing
Stucco
Acoustic tile
Concrete

Milan
Stucco
Acoustic tile
Concrete

Oslo
Stucco
Acoustic tile
Concrete

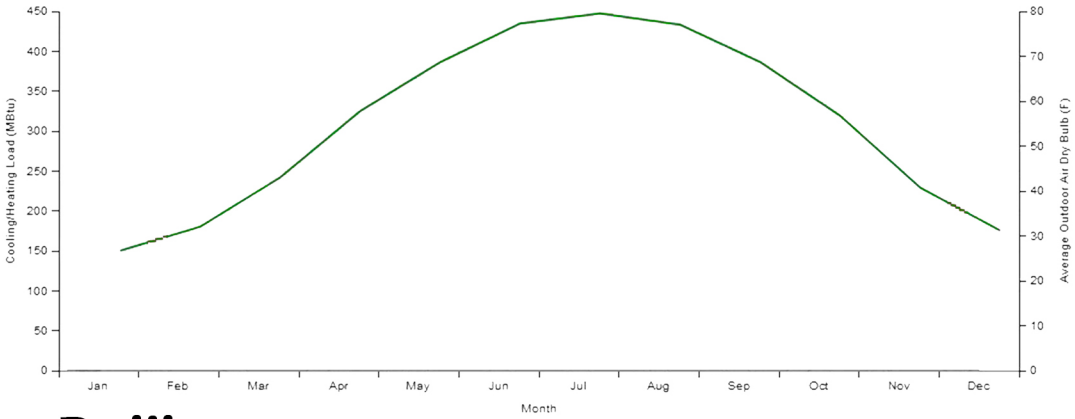
Oslo
Lightweight
Concrete

Oslo
Wood

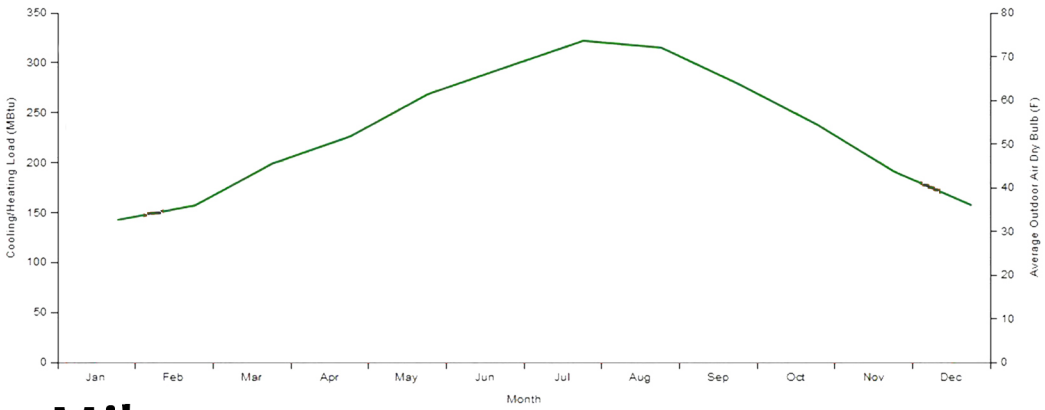
GROUP T10

Samira Habibi Tina Kolahdooz
Alan Minouei Yasamin Yaghmaei

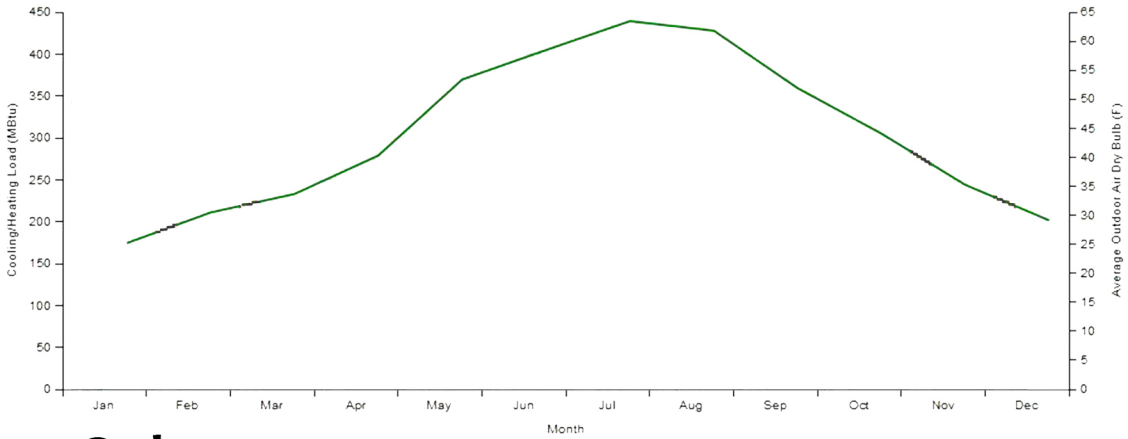
Avarage Outdoor Temperature



Beijing



Milan



Oslo

Beijing, Concrete

Construction	Net Area (ft^2)	Surface Count	R Value (ft^2*h*R/Btu)
ASHRAE 189.1-2009 ExtRoof IEAD ClimateZone 1	32,292	30	19.96
my custom ASHRAE 189.1-2009 ExtWall Mass ClimateZone 7	24,749	123	3.50

Construction	Area (ft^2)	Surface Count	U-Factor (Btu/ft^2*h*R)
ASHRAE 189.1-2009 ExtWindow ClimateZone 1	16,499	123	0.28

Milan, Concrete

Construction	Net Area (ft^2)	Surface Count	R Value (ft^2*h*R/Btu)
ASHRAE 189.1-2009 ExtRoof IEAD ClimateZone 1	32,292	30	19.96
my custom ASHRAE 189.1-2009 ExtWall Mass ClimateZone 7	24,749	123	3.50

Construction	Area (ft^2)	Surface Count	U-Factor (Btu/ft^2*h*R)
ASHRAE 189.1-2009 ExtWindow ClimateZone 1	16,499	123	0.28

Oslo, Concrete

Construction	Net Area (ft^2)	Surface Count	R Value (ft^2*h*R/Btu)
ASHRAE 189.1-2009 ExtRoof IEAD ClimateZone 1	32,292	30	19.96
my custom ASHRAE 189.1-2009 ExtWall Mass ClimateZone 7	24,749	123	3.50

Construction	Area (ft^2)	Surface Count	U-Factor (Btu/ft^2*h*R)
ASHRAE 189.1-2009 ExtWindow ClimateZone 1	16,499	123	0.28

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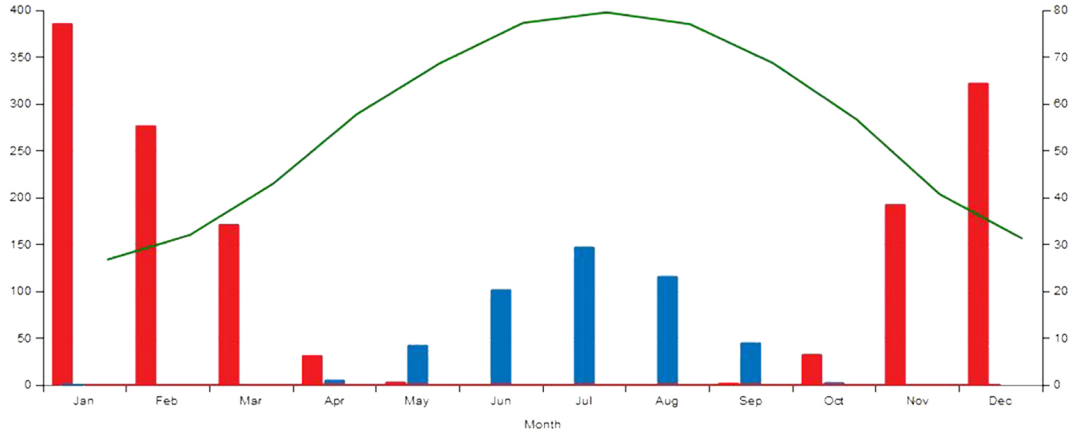
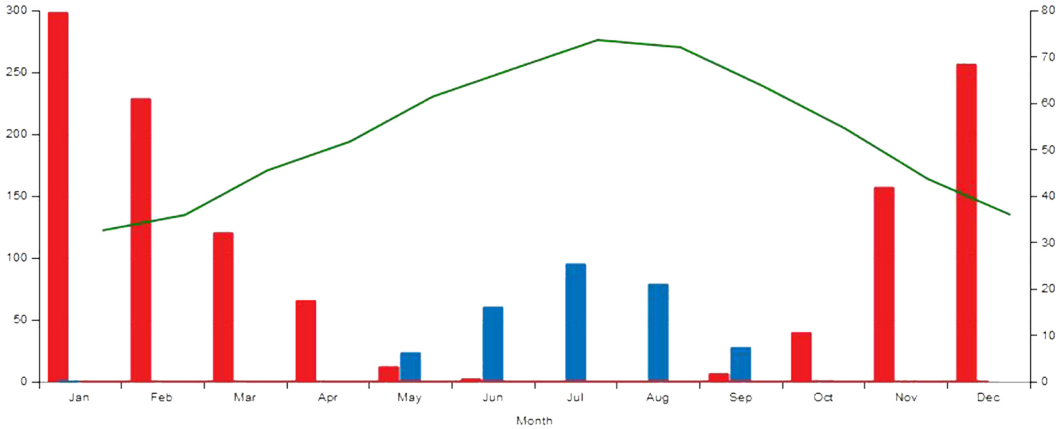
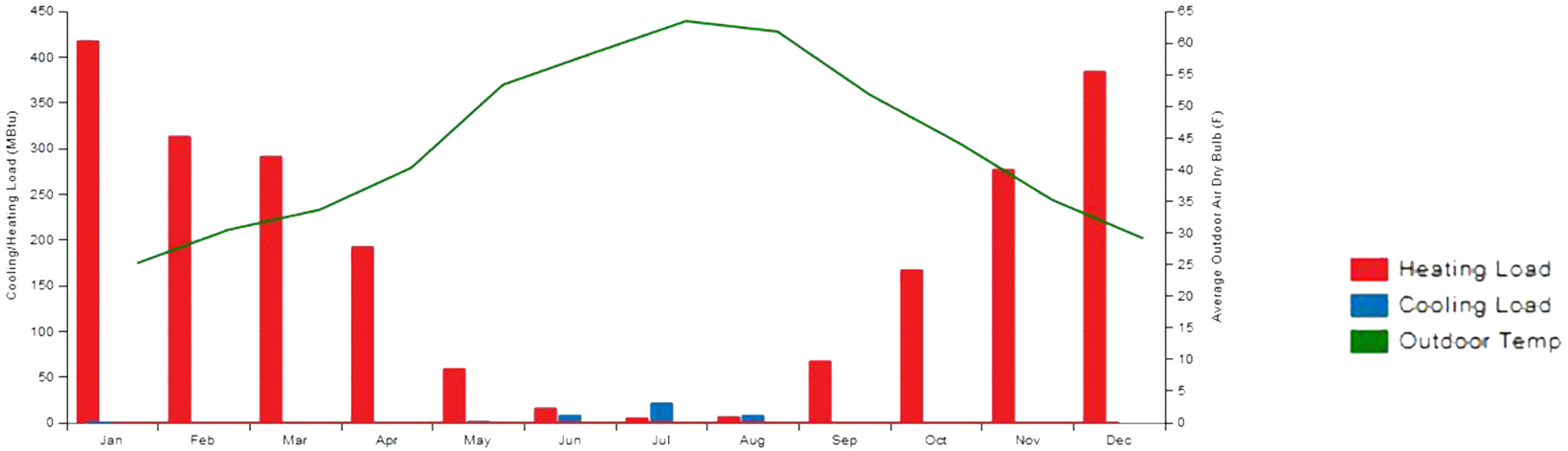
Beijing



Milan



Oslo



Oslo, Lightweight Concrete

Construction	Net Area (ft^2)	Surface Count	R Value (ft^2*h*R/Btu)
ASHRAE 189.1-2009 ExtRoof IEAD ClimateZone 1	32,292	30	19.96
ASHRAE 189.1-2009 ExtWall Mass ClimateZone 5	24,749	123	11.76

Construction	Area (ft^2)	Surface Count	U-Factor (Btu/ft^2*h*R)
ASHRAE 189.1-2009 ExtWindow ClimateZone 1	16,499	123	0.085

Oslo, Wood

Construction	Net Area (ft^2)	Surface Count	R Value (ft^2*h*R/Btu)
ASHRAE 189.1-2009 ExtRoof IEAD ClimateZone 1	32,292	30	19.96
my custom ASHRAE 189.1-2009 ExtWall Mass ClimateZone 7	24,749	123	7.57

Construction	Area (ft^2)	Surface Count	U-Factor (Btu/ft^2*h*R)
ASHRAE 189.1-2009 ExtWindow ClimateZone 1	16,499	123	0.13

Oslo, Concrete

Construction	Net Area (ft^2)	Surface Count	R Value (ft^2*h*R/Btu)
ASHRAE 189.1-2009 ExtRoof IEAD ClimateZone 1	32,292	30	19.96
my custom ASHRAE 189.1-2009 ExtWall Mass ClimateZone 7	24,749	123	3.50

Construction	Area (ft^2)	Surface Count	U-Factor (Btu/ft^2*h*R)
ASHRAE 189.1-2009 ExtWindow ClimateZone 1	16,499	123	0.28

GROUP T10

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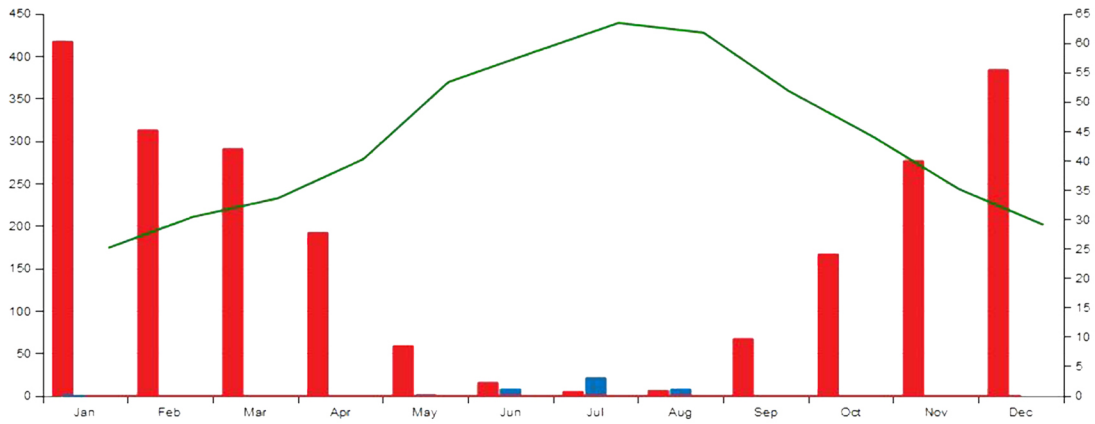
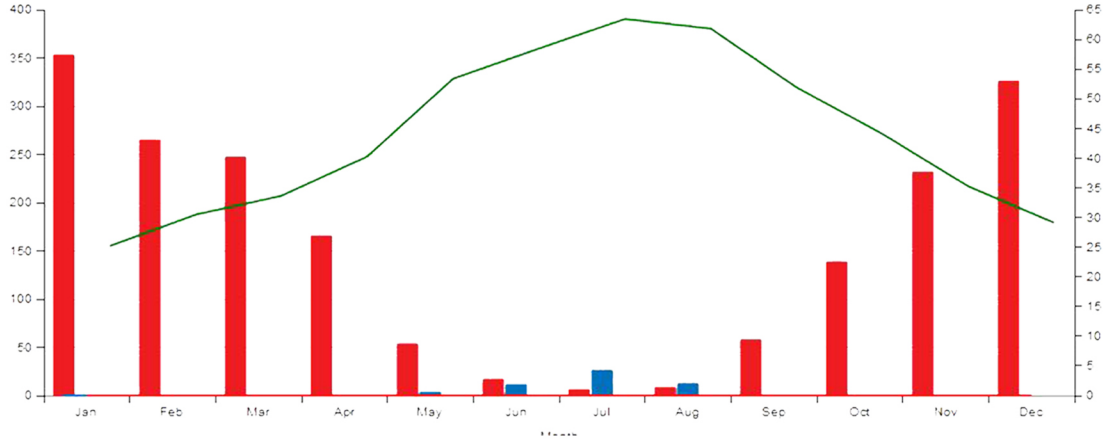
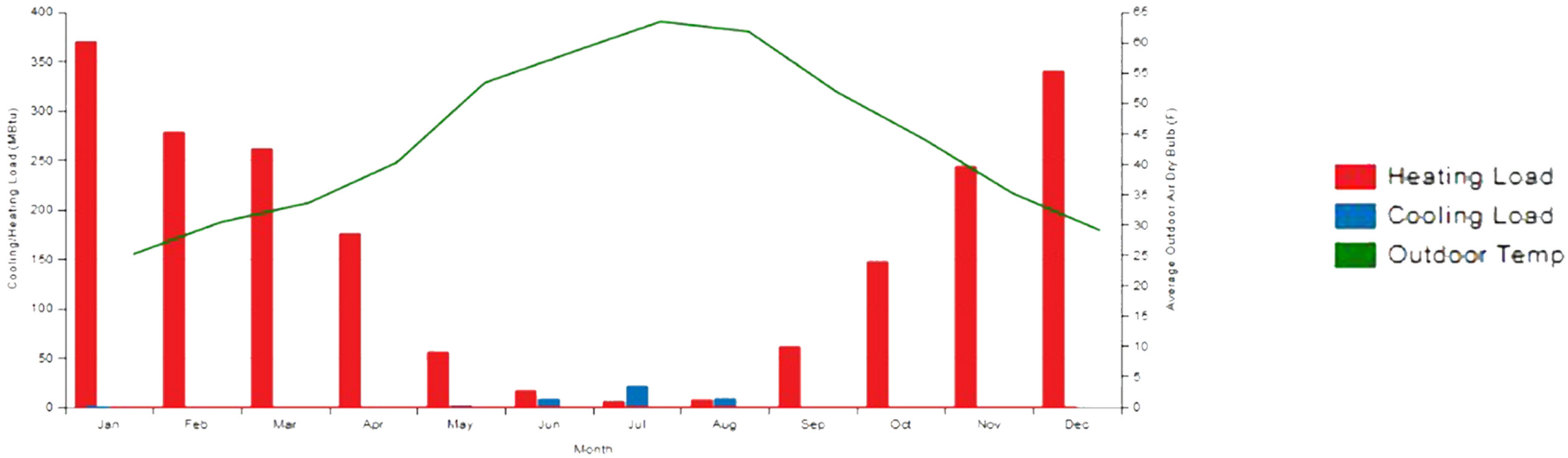
Oslo, Concrete



Oslo, Lightweight Concrete



Oslo, Wood



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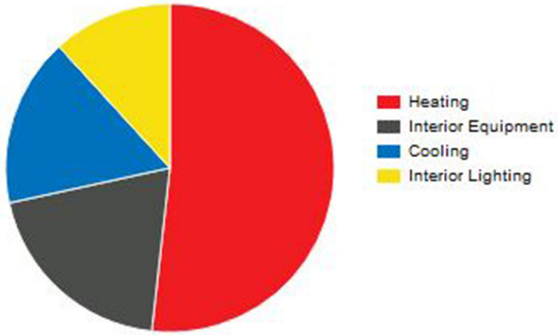
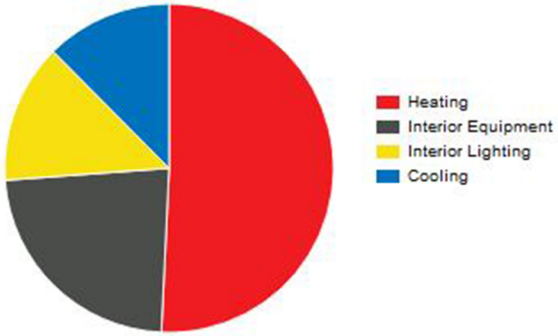
Annual Overview

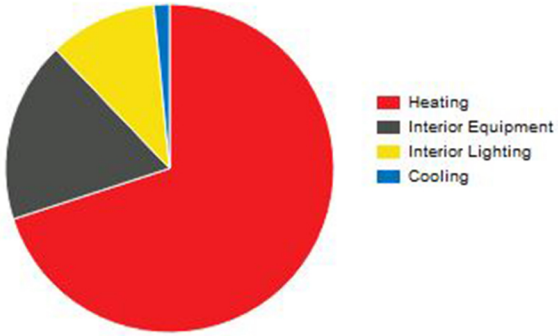
Beijing



Milan



Oslo



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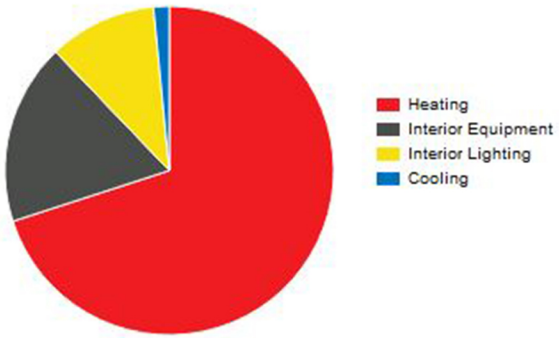
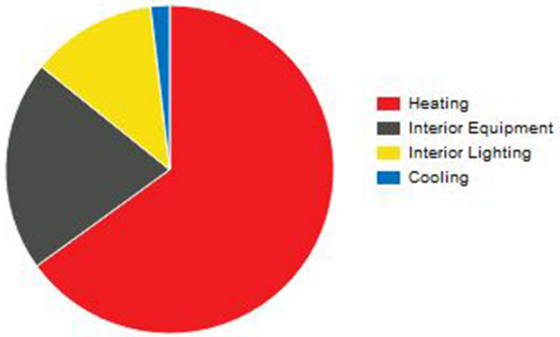
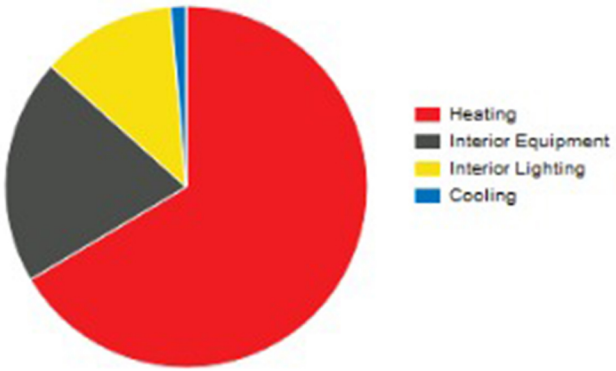
Annual Overview

Oslo, Concrete



Oslo, Lightweight Concrete



Oslo, Wood