

NOTE: Denver's Green Buildings Ordinance applies to all new commercial buildings with 25,000 GSF or larger including additions and campuses. For all permits issued after January 1, 2021, the effective code is 2019 Denver Building Code including 2018 IBC & 2018 IECC and all Denver Amendments.

## 1. Required & Reference Documents

[Click here to view the Green Buildings Ordinance](#)

[Click here to download the GBO Rules & Regulations PDF](#)

[Click here to download the Green Building Declaration Form for New Buildings](#)

[Click here for Denver's Commercial Energy Modeling Report](#)

### Abbreviations

GBO = Green Buildings Ordinance  
R+Rs = Rules & Regulations  
GBDF = Green Building Declaration Form  
SDP = Site Development Plan  
IBC = International Building Code  
IECC = International Energy Conservation Code  
DBCA = Denver Building Code Amendments

## 2. Project Compliance

- A. All projects must address two areas of compliance:
  - i. Provide a cool roof, and
  - ii. Select an additional green building option (A through I) from the GBDF.
- B. Exemptions are available for certain types of projects. See Section 10-301(c) in the GBO R+Rs for a complete list of available exemptions.

## 3. Site Development Plans

- A. All Site Development Plans must include identification of the selected GBO additional green building option, and any full or partial exemptions taken, on the cover sheet.
  - i. If providing green space, specific GBO notes as defined below in the submittal requirements and final green space calculations after the superstructure CDs are approved, must be included in the SDP for SDP approval.
  - ii. If providing photovoltaics (PV), the superstructure CD approved PV layout and area coverage must be included in the SDP for SDP approval.
- B. A [GBDF for New Buildings](#), including the owner's signature, must be provided with the SDP submittal.

## 4. Construction Permits

- A. At the time of superstructure permit submittal, provide all applicable materials listed in the submittal requirements table below necessary to demonstrate conformance with requirements specifically outlined in the GBO R+Rs Article III pertaining to cool roof requirements and R+Rs Article IV Section 4.03(a) pertaining to On-Site Renewable Energy requirements.
- B. Note – Roof Permits – Once the superstructure CD submittal has been approved for GBO compliance and construction permit, the roof permit may be issued without any additional GBO review required. In the roof permit submittal, please include the superstructure (COMMCON) permit number and a note that the project has already been reviewed and approved for GBO compliance.

- C. Note – Renewable System Permit - Submit full photovoltaic system construction documents, signed and stamped, for Structural, Electrical, Fire and Zoning reviews and a separate renewable system permit. Green Buildings Ordinance compliance, overall project permitting, and roof permitting may precede these approvals and the associated permit; however, installation of this system to provide compliance with the GBO is required prior to overall building TCO or CO being issued.
- D. Projects in a historic or landmark district will need approval from Landmark Preservation before applying for electrical, zoning, or building permits.
- E. A zoning permit will be required for all solar panels that do not meet the definition in the Denver Zoning Code for “solar panels, flush-mounted”.

## 5. Project Requirements for Option B:

### On-Site Renewable Energy

- A. Select a coverage area (choose one):
  - i. 70% of Total Roof Area
  - ii. 100% of the estimated annual average electricity used at the building
- B. Reference R+Rs for specifics including those related to:
  - ❖ 16% minimum efficiency
  - ❖ Clearances
  - ❖ Providing an energy model
  - ❖ Other renewable equivalency to solar output *if applicable*

### Mandatory Cool Roof Requirements for All New Buildings:

#	Construction Phase	Applicable Code Section	Submittal Item	Requirement
1	SDP	R+Rs 2.03(c)	Green Building Declaration Form	Provide a <a href="#">Green Building Declaration Form for New Buildings</a> with all fields infilled including the owner's signature.
2	Permit	R+Rs 2.03(a)	Roof plan	Provide a roof plan with the total roof area quantified.
3	Permit	R+Rs 3.02(a) R+Rs 3.03(a) R+Rs 3.03(b)	Solar reflectance data	Provide cool roof covering and paver solar reflectance data in conformance with Table 1 - Reflectance Requirements in the GBO R+Rs. This information may be included in the construction document specifications or on the roof plan.
4	Permit		Roof assembly section details	Provide roof assembly section details for all roof types.
5	Permit	IBC 1202.2 IBC 1202.3	Ventilation details (steep slope only)	Provide a roof plan illustrating locations, sizing, and calculations.
6	Permit	R+Rs 3.04	Exemptions	For any exemptions claimed, please provide substantiation.
7	Permit	R+Rs 3.04(a)	Exemptions - Character defining roofs	See applicable GBO R+Rs Section 3.04(a) for additional submittal requirements if claiming a character defining roof. It is recommended that any project considering applying for a character defining cool roof exemption, contact us first at <a href="mailto:stephen.sanderson@denvergov.org">stephen.sanderson@denvergov.org</a> or <a href="mailto:christy.collins@denvergov.org">christy.collins@denvergov.org</a> .

### Option B: On-Site Renewable Energy – Additional Green Buildings Requirements:

8	SDP	R+Rs 4.03(a)(i)	PV coverage requirements	Required PV coverage calculations and diagrammatic site and/or roof plan (identical to approved CDs)
9	Permit	R+Rs 4.03(a)(i)	PV coverage requirements	Detailed calculations of PV coverage required including dimensioned building and/or roof plan(s) as applicable
10	Permit	R+Rs 4.03(a)(iv) & (viii)	PV clearances	Roof plan identifying and dimensioning all GBO R+Rs required clearances
11	Permit	R+Rs 4.03(a)(iii)	PV system information	PV panel product data including efficiency rating and system capacity (kW)
12	Permit	R+Rs 4.03(a)(vi)	Energy model	<a href="#">Denver's Commercial Energy Modeling Report</a> data showing estimated annual average electricity usage including pEUI
13	Permit		Energy model	Statement identifying limiters to energy model accuracy and ROM estimate for swing inaccuracy of pEUI
14	Permit		General	Additional materials as required to illustrate compliance with GBO R+Rs Section 4.03(a)(i), (iii) through (iv), (vi), (vii), and (viii)
15	Separate Permits	R+Rs 2.03(g)	Separate CD submittals and permits	If applicable, separate CD submittals are required for fire protection systems; photovoltaic system; zoning.
16	Post C.O.		Inspections	PV system must be installed and inspected within 12 months of final roof inspection
17	Post C.O.	R+Rs 4.03(c)	Net zero energy buildings	Net zero energy buildings must submit actual energy use data 12 months after certificate of occupancy, showing actual use to be within 10% of predicted