



Green Built Texas Protocol v1 Project Summary and Checklist, Multifamily and Mixed Use Buildings New Construction

				Summary				
Date of								
Application								
Compliance								
Path								
Project								
Identification								
Project Address								
Owner								
Identification								
Architect								
Identification								
Contractor							Permit No	0.
Identification								
Third Party							Provider	No.
Provider								
Building Code		IBC Residenti	al Occupancy					
Type of Building				IBC Group R Occup	pancy: (circle one)	Multifam	ilv	
				R-1. R-2. R-3. R-4	T		-	
Stories and	Number of	Unit Type:	Unit Type:	Unit Type:	Unit Type:	Unit Typ		Unit Type:
Туре	Stories:	1 bed/1 bath	2 bed/1 bath	2 bed/2 bath	3 bed/2 bath	3 bed/3 l	oath	Other
Garage	Attached	Detached	Carport	None				
Building Sq.	Lot Size:		Building Total S	Sq. Ft:	Area Under Roof:	Total No	nroof Area	a:
Footage								
	IECC Climate	e Zone: 3A	Radon Zone: 3	*				
Green Built	All requirem	nents mandatory						
Texas Protocol	•		and the second the state of	II O O (ion Codo for multifamily		- II d	One on Duilt Terre

Note: Checklist is intended for use with projects complying with the Dallas Green Construction Code for multifamily residential following the Green Built Texas protocol path. Project seeking Green Built Texas certification must be verified by a certified Green Built Texas verifier in addition to the required plan reviews and inspections performed by a City of Dallas approved Third Party Green Building Provider and an approved Third Party Energy Inspector.

This checklist applies only to residential units in multifamily or mixed used buildings. Other spaces must comply with applicable commercial checklist. For an addition, not all provisions are applicable. Mark provisions that are not applicable with NA.

^{*} Radon Zone: Dallas lines within Radon Zone 3 - No Radon; the potential exists for building and raw materials from radon zoned areas to be brought into the Dallas area for use on projects







	Green Built Texas Protocol V3								
Item	Protocol Element	Comp	liance	Plan Review/	Comments				
Item	Protocol Element		No	Inspection	Comments				
	Site Management		-						
1	TCEQ Storm Water Permit, when required, and comply with best management practices				Copy of TCEQ Stormwater permit and documentation				
2	Tree protection plan or full compliance with established local ordinance for tree protection				Copy of protection plan Visually verify during construction				
	Choose minimum one optional strategy		•						
3	Waste reduction strategies:				Choose minimum of one of the following strategies Requires letter from contractor attesting to compliance with selected strategy/strategies				
	Reuse form board on slabs and flatwork								
	Optimize building dimensions to correspond to standard lumber dimensions								
	Develop detailed framing layouts to avoid waste when ordering lumber								
	Set aside lumber and plywood/OSB cutoffs that can be used later as fire blocking, spacers in header construction, similar								
	Use larger pieces of leftover lumber (minimum 6 ft in length) for other jobs or donate to Habitat for Humanity								
	Order drywall in optimal dimensions to minimize cut off waste								
	Set large drywall scraps aside during hanging for use as filler pieces in areas such as closets								
	Estimate masonry material needs carefully to avoid waste								
	Salvage usable bricks, blocks, slate shingles, tile and masonry materials from remodeling and construction. Store for future jobs or divert to salvage operations								
4	Waste recycling strategies:				Copy of waste recycling plan at permit review; Letter from contractor attesting to compliance				
	Consult listing of recycling facilities and materials accepted in technical review manual								
	Separate waste								
	On site grinding of wood to mulch								







Protocol Flowant	Compliance		Plan Review/ Inspection	0
Protocol Element		No		Comments
Water Efficiency		<u>. </u>		
Irrigation System: Equip system with smart controller (rain, and soil moisture sensors or weather forecast based (ET) irrigation controller				Indicate controller system Supporting documentation
Landscape and turf planting limited to drought tolerant species				Visually inspect
2 inch deep mulch in landscape beds				Visually inspect
				Supporting documentation
Water heater located within 30 ft. of fixtures, install hot water on demand system, or install parallel piping system that originates from a central manifold				Visually inspect during construction and post construction
Energy Star dishwasher				Select two water conservation strategies or install rain or install rainwater catchment system for minimum of 50% of landscape irrigation needs
High performance fixtures				Select minimum of two Submit supporting documentation Visual inspection required
Lavatory faucet flow rates are equal to or less than 1.5 gpm				
Kitchen and utility faucet flow rates are equal to or less than 2.2 gpm				
Showerhead flow rates are equal to or less than 2.0 gpm.				
Lavatory faucets operated with infrared sensors				
Zone irrigation system separately for turf and slab/bedding areas				Visually inspect
Install low volume, nonspray irrigation system				Select minimum of one Supporting documentation Visually inspect
Drip irrigation				
Bubblers				
Drip emitters				
Soaker hose				
Subsurface irrigation				
No irrigation system				
	Irrigation System: Equip system with smart controller (rain, and soil moisture sensors or weather forecast based (ET) irrigation controller Landscape and turf planting limited to drought tolerant species 2 inch deep mulch in landscape beds Water efficient toilets, work on first flush, 1.3 gpf Water heater located within 30 ft. of fixtures, install hot water on demand system, or install parallel piping system that originates from a central manifold Energy Star dishwasher High performance fixtures Lavatory faucet flow rates are equal to or less than 1.5 gpm Kitchen and utility faucet flow rates are equal to or less than 2.2 gpm Showerhead flow rates are equal to or less than 2.0 gpm. Lavatory faucets operated with infrared sensors Zone irrigation system separately for turf and slab/bedding areas Install low volume, nonspray irrigation system Drip irrigation Bubblers Drip emitters Soaker hose	Water Efficiency Irrigation System: Equip system with smart controller (rain, and soil moisture sensors or weather forecast based (ET) irrigation controller Landscape and turf planting limited to drought tolerant species 2 inch deep mulch in landscape beds Water efficient toilets, work on first flush, 1.3 gpf Water heater located within 30 ft. of fixtures, install hot water on demand system, or install parallel piping system that originates from a central manifold Energy Star dishwasher High performance fixtures Lavatory faucet flow rates are equal to or less than 1.5 gpm Kitchen and utility faucet flow rates are equal to or less than 2.0 gpm. Lavatory faucets operated with infrared sensors Zone irrigation system separately for turf and slab/bedding areas Install low volume, nonspray irrigation system Drip irrigation Bubblers Drip emitters Soaker hose Subsurface irrigation	Water Efficiency Irrigation System: Equip system with smart controller (rain, and soil moisture sensors or weather forecast based (ET) irrigation controller Landscape and turf planting limited to drought tolerant species 2 inch deep mulch in landscape beds Water efficient toilets, work on first flush, 1.3 gpf Water heater located within 30 ft. of fixtures, install hot water on demand system, or install parallel piping system that originates from a central manifold Energy Star dishwasher High performance fixtures Lavatory faucet flow rates are equal to or less than 1.5 gpm Kitchen and utility faucet flow rates are equal to or less than 2.2 gpm Showerhead flow rates are equal to or less than 2.0 gpm. Lavatory faucets operated with infrared sensors Zone irrigation system separately for turf and slab/bedding areas Install low volume, nonspray irrigation system Drip irrigation Bubblers Drip emitters Soaker hose Subsurface irrigation	Protocol Element





Item	Protocol Element	Comp	liance	Plan Review/	Comments	
iteiii	T TOTOGOT ETOTOGOT		No	Inspection	Comments	
	Indoor Air Quality					
1	Calculations based on Manual J house design, specifications and orientation; verify installed equipment matches Manual J calculations (or approved software). Verify proper refrigerant level and HVAC commissioning per manufacturer's specifications. Maintain documentation through warranty period				Submit design load calculations and report documentation Visually inspect	
2	Ducts sealed during construction at vent entry and exit				Visually inspect during construction	
3	Ducted mechanically controlled fresh air intake system meeting the fresh air needs of unit				Visually inspect during construction	
4	If gas furnaces and/or water heaters are located within conditioned space, verify sealed combustion or vented to the outside				Visually inspect during construction	
5	Install continuous drainage plane on exterior walls behind cladding material				Visually inspect during construction	
6	No vapor barrier on inside of exterior walls				Visually inspect during construction	
7	Flashing installed at windows and doors, per Drawing details and manufacturer specifications				Review drawings, specifications Visually inspect during construction	
8	Garage: If garage attached or located in building, verify isolated from living space by sealed, gasketed door between the garage and conditioned space; continuous air barrier between walls and ceilings separating the garage from conditioned living space				Review drawing details Visually inspect	
9	Combustion air for wood burning fireplaces from outside.				Visually inspect during construction	
10	No fiberglass duct board unless sealed properly with low toxic mastic				Visually inspect during construction	
11	Return air ducts, jump ducts, or transfer grills in each bedrooms				Visually inspect	
12	Minimum 6 mil thick (0.15 mm) vapor barrier under slab				Visually inspect during construction	
13	Minimum MERV 8 filters for AC return				Visually inspect Supporting documentation	





Itom	Protocol Element	Compliance		Plan Review/	Comments				
Item		Yes	No	Inspection	Comments				
Note:	In addition to above, select two additional strategies from below to enhance indoor air quality								
14	Carpets, paddings, and adhesives compliant with emission levels in accordance with the Carpet and Rug Institute's (CRI) Green Label or Green Label Plus indoor air quality program.				Supporting documentation				
15	Zero VOC architectural paints and coatings finishes, determined by EPA Method 24 (VOC content below the detection limit for the method)				Supporting documentation				
16	Use low VOC adhesives and sealants				Review drawings, visually inspect				
17	Install continuous capillary break under bottom plate of all exterior walls				Review drawings Supporting documentation				
18	Install equipment designed to maintain Relative Humidity at or below 60%				Supporting documentation Visually inspect during construction to extent possible				
19	Install Energy Star programmable thermostats with humidity control				Supporting documentation Visually inspect				
20	Carbon monoxide (CO) detector, compliant with Section 5.2.3 of NFPA Standard 720, minimum one per floor				Supporting documentation Visually inspect				
21	Install central vacuum (canister unit) that exhausts to the outside of the home				Supporting documentation Visually inspect				
22	Install kitchen and bath vanity cabinets that do not contain added urea formaldehyde.				Supporting documentation				
23	Install kitchen range hood to vent range to the outside (minimum 100 CFM)				Review drawings Visually inspect				
24	Install glass door on wood burning fireplace				Supporting documentation Visually inspect				
25	Upgrade AC return filtration to minimum 4 inch pleated or MERV 11 in lieu MERV 8 filters				Supporting documentation Visually inspect				
	Energy Efficiency								
1	ENERGY STAR Version 3.0 certification with minimum HERS index of 83.				Submit copy of certification				





Item	Protocol Element	Comp	liance	Plan Review/	Comments	
item	Protocol Element		No	Inspection	Comments	
	Materials					
1	Engineered lumber products for trusses, joists, and finger jointed dimensional lumber				Supporting documentation	
2	Exterior cladding materials with minimum 25 year warranty				Supporting documentation	
3	Gutter downspout extensions or concrete splashguards; positive drainage away from house				Visually inspect	
4	Advanced framing techniques to reduce waste				Select one technique	
	19.2 inch or 24 inch on center framing for floor system and/or load bearing walls 24 inch on center framing for roof systems and/or interior				Supporting documentation Visually inspect	
	partitions					
	Single top plate walls					
	Advanced wall systems such as SIPs or ICF					
	Steel framing when thermal bridging is mitigated by foam core panels on the outside or blown in foam insulation that					
	covers the studs					
	Right sized headers or insulated (box) headers (where required)					
	Eliminate headers in nonbearing walls					
	Ladders blocking at interior wall to exterior wall				Ladders: 2X6 or deeper wall framing	
	intersections (i.e. Ladder T's at perpendicular wall					
	intersection) and double rim joist in lieu of header					
	Two stud corner framing or California Corners					
	Engineered frame design		<u> </u>			
	In addition to above, select two additional strategies from be	elow to er	nhance m	aterial durability		
5	Minimum 12 inch roof overhangs based over at least 90				Review drawings	
	percent of exterior walls to protect the building envelope				Visually inspect	
6	Metal drip edge at eaves and gable roof edges				Review drawings	
					Visually inspect	
7	Continuous, physical, nonchemical foundation termite barrier				Review drawings Supporting documentation	
8	Treated termite resistant materials for structural				Supporting documentations	
	components and exterior claddings of walls, floors or exterior				Supporting documentations	





Item	Protocol Element	Compliance		Plan Review/ Inspection	Comments
itein	Protocol Element		No		
9	Minimum of 30lb roofing felt or polyethylene underlayment on entire roof for secondary moisture protection.				Review drawings Supporting documentation Visually inspect during inspection
10	Minimum Class 4 roofing material				Review drawings, specifications Supporting documentation
	Homeowner Education				
1	Homeowner operations and maintenance kit and perform walk through				Copy of homeowner manual, document attesting to walk through
2	Homeowner provided with information on local recycling programs, green energy service providers, and Green Built Texas registration process				Copy of homeowner information
	End of Green Built Texas Path Checklist				