# Colorado Building & Energy Codes Survey Results

Prepared by the Governor's Energy Office

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The Governor's Energy Office 1580 Logan Street, Suite 100 Denver, CO 80203 www.colorado.gov/energy (303) 866-2100

#### **Executive Summary**

Colorado Governor Bill Ritter, Jr., issued an Executive Order on April 16, 2007, re-creating the Governor's Office of Energy Management and Conservation as the Governor's Energy Office (GEO). The GEO's mission is to lead Colorado to a New Energy Economy by advancing energy efficiency and renewable, clean energy resources. The New Energy Economy embraces energy conservation as an important component in our energy future, yet requires a broader mission to meet the goals of expanding renewable and clean energy resources and opportunities for the state's economy, environment and energy independence. During Colorado's 2007 legislative session, House Bill 1146 (HB 07-1146), was passed in an effort to improve the energy efficiency of Colorado's new buildings as part of the New Energy Economy. HB 07-1146 calls for all jurisdictions that have a building code to adopt a minimum energy code standard effective July 1, 2008. As directed by HB 07-1146, the Governor's Energy Office (GEO) works in close partnership with building departments to provide energy code training, information and other resources to support local adoption and implementation of current versions of the International Energy Conservation Code (IECC).

In 2008, the GEO delivered 30 energy code workshops on the 2003 IECC and 2006 IECC to more than 800 Colorado code officials and building industry professionals. In an effort to provide high levels of continuing energy code support to Colorado's 329 code jurisdictions, the GEO commissioned an independent survey to better understand the types of code assistance desired. The survey was conducted by the International Codes Council between October and December 2008. Code officials were contacted by email, fax, and phone to answer a series of energy code questions. Participation in the survey was voluntary.

The collected responses from 174 of Colorado's code jurisdictions are presented in this report. The GEO considers the findings extremely valuable, as the data represents the direct voices of the state's local governments and its energy code departments, the very individuals responsible for the implementation of energy code programs for their citizens. The GEO intends to use the information provided by this study to guide the direction of its future energy code support programs. For more information on this report, please contact the GEO directly.

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#### **Participating Jurisdictions**

All of Colorado's 329 code jurisdictions were contacted by email, fax, and phone by the International Code Council to participate in the GEO's energy code survey between the months of October and December 2008. The following 174 jurisdictions submitted responses to the survey questions:

**Adams County** Akron Alamosa (City of) Alamosa County **Arapahoe County** Archuleta County Durango Arvada Ault Aurora Avon **Basalt** Bayfield Bennett Firestone Bent County Black Hawk Boone Boulder (City of) **Boulder County** Breckenridge Broomfield (City &

Frisco County of) Garfield County Brush Georgetown Cañon City Gilcrest Castle Rock Gilpin County Centennial Glendale Center Central City Golden

Chaffee County Granada Cheraw Greelev Cherry Hills Village Chevenne Wells **Gunnison County** Clear Creek County Gypsum Coal Creek Havden Columbine Valley

Commerce City Cortez

Costilla County Craig

Crawford Crested Butte Cripple Creek Crowley County

**Custer County** 

Dacono Delta (City of) Delta County Denver (City & County of) Dolores **Douglas County** 

Eagle County Eaton Elizabeth Englewood Erie Estes Park

Florence Fort Lupton Fort Morgan Foxfield Frederick Fremont County

Glenwood Springs

Gunnison (City of)

Hinsdale County Hudson

Huerfano County Idaho Springs

Ignacio Jefferson County Johnstown Kersev Kiowa

Kit Carson County

La Junta La Veta

Lafayette Lake County Lakewood Lamar Larimer County

Larkspur Las Animas County LaSalle

Lincoln County Littleton Lone Tree Longmont Louisville Loveland Lyons Manassa Mead

Meeker Mesa County Milliken Minturn Moffat County Monte Vista Montrose

Morgan County Morrison

Mt. Crested Butte Nederland New Castle Northglenn Norwood Nunn Oak Creek Olathe Orchard City Otero County

Ouray Ovid Pagosa Springs Paonia Parachute Parker

Pierce Pikes Peak Regional **Building Department** 

Pitkin County Platteville Pritchett **Prowers County** Pueblo Regional

**Building Department** 

Rangely Ridgway Rifle

Rio Blanco County Rio Grande County **Routt County** Saguache County Saguache (Town of) San Juan County San Miguel County Sedgwick County

Severance Sheridan Silt Silver Plume

Silverthorne Snowmass Village South Fork

**Steamboat Springs** 

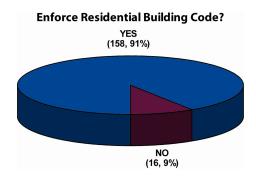
Sterling Superior Teller County Telluride Thornton Timnath Trinidad Walsenburg Wellington Westcliffe Westminster Wheat Ridge Windsor

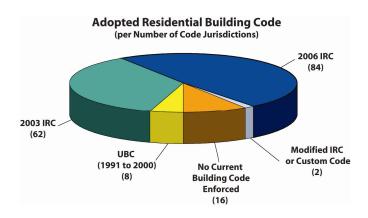
Winter Park/Fraser Woodland Park

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## **Current Residential Building Code Adoptions**

All Colorado code jurisdictions were asked to identify their current residential building code as of December 2008. 158 (91%) of the 174 jurisdictions that provided a response indicated that they enforce a residential building code, while 16 (9%) reported that they do not. Of the 172 jurisdictions that provided a response, 84 (49%) indicated that they adopted the 2006 International Residential Code (2006 IRC). An additional 62 (36%) noted that they were using the 2003 version of the International Residential Code (2003 IRC) as their local residential building code. The remaining collected responses included 16 jurisdictions (9%) that were not currently enforcing a residential building code, 8 jurisdictions (5%) that had adopted a version of the Universal Building Code (UBC) from either 1991, 1994, 1996, 1997 or 2000, and 2 jurisdictions (1%) that had developed either a custom building code for local use or had adopted a modified version of the 2006 IRC.

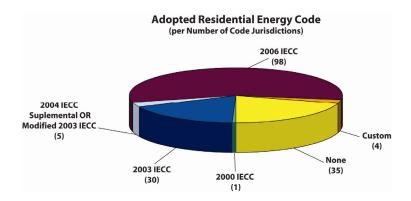




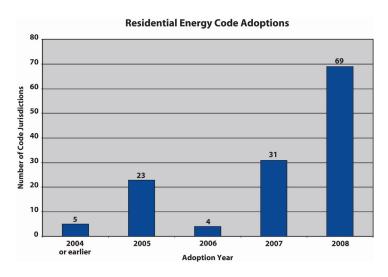
#### **Current Residential Energy Code Adoptions**

All Colorado code jurisdictions were asked if they currently enforced a local residential energy code as of December 2008. 139 (80%) of the 174 jurisdictions that provided a response indicated that they enforce a residential energy code, while 35 (20%) reported that they do not.

Colorado code jurisdictions were asked to identify their residential energy code as of December 2008. Of the 173 jurisdictions that provided a response, 98 (57%) indicated that they adopted the 2006 International Energy Conservation Code (2006 IECC). An additional 35 (20%) reported they do not enforce an energy code in their jurisdiction, while 30 (17%) noted that they adopted the 2003 International Energy Conservation Code (2003 IECC). The remaining collected responses included 5 jurisdictions (3%) that enforced the 2004 Supplemental version of the International Energy Conservation Code (2004 IECC Supplemental) or a modified version of the 2003 IECC, 4 more (2%) developed and adopted a custom energy code, and 1 (1%) used the 2000 version of the International Energy Conservation Code (2000 IECC).



Colorado code jurisdictions were asked to identify what year they adopted their current residential energy code. Of the 132 jurisdictions that provided a response, 69 (52%) indicated they adopted their local residential energy code in 2008. An additional 31 (23%) noted that their current residential energy code was adopted in 2007. The remaining collected responses included 23 jurisdictions (17%) that adopted their residential energy code in 2005, 5 jurisdictions (4%) that adopted their energy code in 2004 or a prior year, and 4 jurisdictions (3%) that made their energy code adoption in 2006.

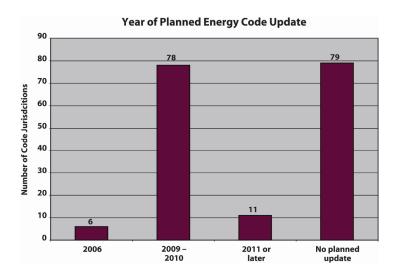


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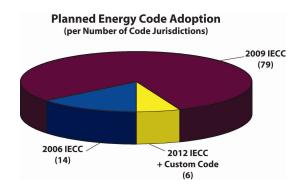
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## **Planned Residential Energy Code Adoptions**

All Colorado code jurisdictions were asked if and when they were planning on adopting a new residential energy code. Of the 174 collected responses for this survey question, 79 jurisdictions (45%) indicated that they had no current plans to adopt a new residential energy code. 78 jurisdictions (45%) noted they intended to adopt a new residential energy code in either 2009 or 2010, while 6 (3%) were still intending to adopt a new energy code before the end of 2008. The remaining 11 jurisdictions (6%) will be adopting a new residential energy code in 2011 or later.

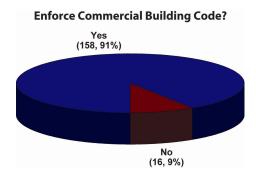


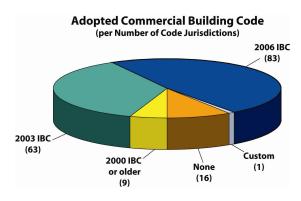
The Colorado code jurisdictions were asked to indicate which residential energy code they were planning to adopt. Of the 99 jurisdictions that indicated a planned energy code update, 79 (80%) indicated that they will be adopting the 2009 International Energy Conservation Code (2009 IECC). An additional 14 (14%) reported that they will be moving to the 2006 IECC, while 6 (6%) noted that they will be adopting either the 2012 International Energy Conservation Code or developing a customized local energy code during their next adoption period.



## **Current Commercial Building Code Adoptions**

Colorado code jurisdictions were asked to identify their current commercial building code as of December 2008. 158 (91%) of the 174 jurisdictions that provided a response indicated that they enforce a commercial building code, while 16 (9%) reported that they do not. Of the 172 collected responses to this survey question, 83 (48%) indicated that they had adopted the 2006 International Building Code (2006 IBC). An additional 63 (37%) noted that they were using the 2003 version of the International Building Code (2003 IBC) as their local commercial building code. The remaining collected responses included 16 jurisdictions (9%) that were not currently enforcing a commercial building code, 9 jurisdictions (5%) that had adopted a version of the International Building Code (IBC) from either 1991, 1994, 1996, 1997 or 2000, and 1 jurisdiction (1%) that developed a custom building code for local use.

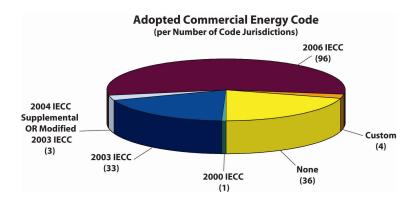




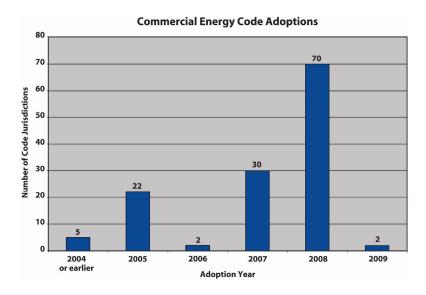
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#### **Current Commercial Energy Code Adoptions**

The Colorado code jurisdictions were asked if they enforced a local commercial energy code as of December 2008. 138 (79%) of the 174 jurisdictions that provided a response indicated that they enforce a commercial energy code, while 36 (21%) reported that they do not. Of the 173 jurisdictions that provided a response, 96 (55%) adopted the 2006 International Energy Conservation Code (2006 IECC). An additional 36 (21%) do not enforce an energy code, while 33 (19%) adopted the 2003 International Energy Conservation Code (2003 IECC). The remaining collected responses included 4 jurisdictions (2%) that developed and adopted a custom energy code, 3 jurisdictions (2%) that enforced the 2004 Supplemental version of the International Energy Conservation Code (2004 IECC Supplemental) or a modified version of the 2003 IECC as their energy code, and 1 (1%) that used the 2000 version of the International Energy Conservation Code (2000 IECC).



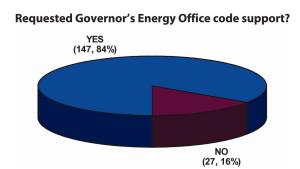
Colorado code jurisdictions were asked to identify what year they had adopted their current commercial energy code. Of the 131 jurisdictions that provided a response, 70 (53%) adopted their local commercial energy code in 2008. An additional 30 (23%) adopted their current commercial energy code in 2007. The remaining collected responses included 22 jurisdictions (17%) that adopted their commercial energy code in 2005, 5 jurisdictions (4%) that adopted their energy code in 2004 or a prior year, and 2 jurisdictions (2%) that made their energy code adoption in 2006. In addition, 2 jurisdictions (2%) noted that new commercial energy codes had been approved and would be enforced in 2009.

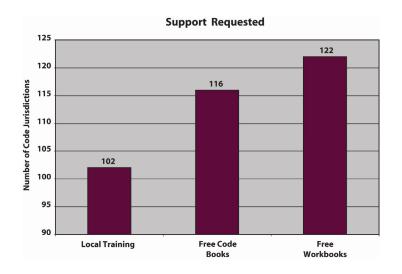


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## **Requested Governor's Energy Office Energy Codes Support Services**

All Colorado code jurisdictions were asked if they would like to receive energy code support from the Governor's Energy Office. Of the 174 code jurisdictions that answered this question, 147 (84%) requested additional support from the GEO, while 27 (16%) code jurisdictions did not request any assistance with energy codes. The survey offered three specific categories of help from the GEO: local training, free code books, and free workbooks. Survey respondents could request any or all of these services for no charge; many requested more than one type of aid. 102 (59%) jurisdictions signed up for local energy code training; 116 (67%) jurisdictions requested free International Energy Conservation Code (IECC) books; 122 (70%) jurisdictions asked for the workbook that summarized the fundamentals of the IECC for Colorado buildings.





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#### The GEO's Energy Code Program

The GEO operates a residential and commercial energy code support program for the state of Colorado. The energy code program is intended to provide support on the 2009 IECC directly to local governments and code jurisdictions.

Based the responses contained in this report, the GEO has tentatively planned the following energy code support program features for 2009:

- The GEO will deliver a series of at least 21 trainings on the 2009 IECC across the state. Trainings are to be offered at no-cost to attendees, and are intended to provide a technical overview on the provisions contained in the 2009 IECC to code officials and building industry professionals.
- The GEO will distribute official 2009 IECC code books at no cost to code officials and building industry professionals.
- The GEO will create a Colorado-specific technical workbook on the fundamentals of the 2009 IECC. These workbooks will be available from the GEO to code officials and building industry professionals at no cost.
- The GEO will develop and administer a technical assistance program on the 2009 IECC. This technical assistance program will provide answers to specific code enforcement questions and include on-the-ground field support and mentoring to Colorado's building departments.
- The GEO will provide a list of "downloadable" energy code support resources on its website, <a href="https://www.colorado.gov/energy">www.colorado.gov/energy</a>.

For more information on the GEO's energy code support program or this report, please contact the GEO by phone (303) 866-2100 or email geo@state.co.us.

