

## What is the SmartCode?

The SmartCode is a model form-based unified land development ordinance designed to create walkable neighborhoods with the full range of the rural-urban transect. Duany, Plater-Zyberk and Co is the author of the SmartCode.

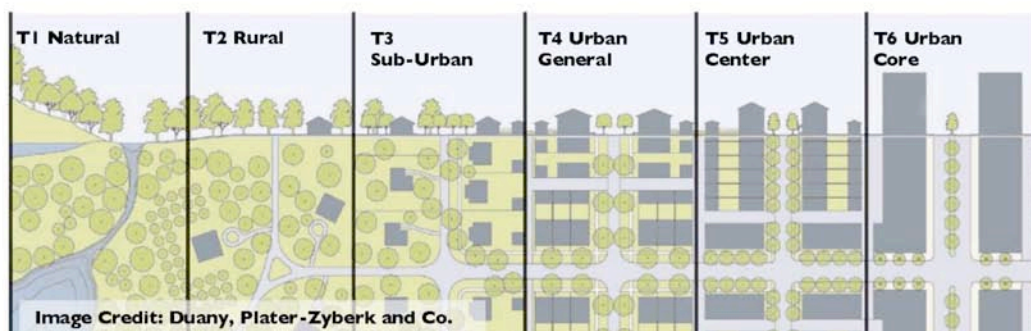
**Model Code** – The SmartCode is a model code, with metrics designed to create a generic medium-sized American city structured into walkable neighborhoods. Professional planners, architects, and attorneys should customize it to meet local conditions.

**Form-Based** – The SmartCode is a form-based code. Conventional Euclidean zoning regulates land development with the most emphasis on controlling land use. Form-based zoning has been developed over the last twenty years to overcome the problems of sprawl created by use-based codes. Form-based zoning regulates land development with the most emphasis on controlling urban form and less emphasis on controlling land uses (although uses with negative impacts, such as heavy industry, adult businesses, etc. are still regulated). Urban form features regulated under the SmartCode include the width of lots, size of blocks, building setbacks, building heights, placement of buildings on the lot, location of parking, etc.

**Unified Land Development Regulation** – The SmartCode is a unified land development code that can include zoning, subdivision regulations, urban design, signage, landscaping, and basic architectural standards.

**Walkable Neighborhoods** – One of the basic principles in the SmartCode is that towns and cities should be structured as a series of walkable neighborhoods. Walkable neighborhoods require a mix of land uses (residential, office, and retail), public spaces with a sense of enclosure to create “outdoor rooms”, and pedestrian-oriented transportation design.

**Rural-Urban Transect** – The zones within the SmartCode are designed to create complete human habitats ranging from the very rural to the very urban. Where conventional zoning categories are based on different land uses, SmartCode zoning categories are based on their rural-urban character. All categories within the SmartCode allow some mix of uses. SmartCode zoning categories ensure that a community offers a full diversity of building types, thoroughfare types, and civic space types, and that each has appropriate characteristics for its location.



For more information about the SmartCode, visit <http://www.smartcodecentral.com/>.

## SmartCode vs. Conventional Zoning & Subdivision Regulations

How is the SmartCode different from typical conventional (Euclidean) zoning and Land Division regulations?

SmartCode	Conventional Codes
Regulates with primary emphasis on form, secondary emphasis on use, and tertiary emphasis on management.	Regulates with primary emphasis on use, secondary emphasis on management, and tertiary emphasis on form.
Purpose is to create communities that include different types of human habitats, ranging from most rural to most urban.	Purpose is to separate uses.
Creates a diverse variety of immersive environments, ranging from the most rural to the most urban.	Rural, suburban, and urban elements are mixed together, creating homogenized or contradictory environments.
All zones are mixed-use to some degree.	Most zones prohibit mixed uses.
The sum of the parts creates a whole. Development is structured into neighborhood patterns (clustered land development, traditional neighborhood development, and regional center development).	Development is not intentionally structured into particular patterns.
Requires a mix of housing types and sizes within a walkable neighborhood.	Allows development of vast areas of a single housing type and size.
Infrastructure, stormwater, landscaping, and other standards vary depending upon the location within the rural-urban transects.	Most standards are applied across all zones as one-size-fits-all regulations.
Regulates parking design in understanding that poorly designed parking undermines pedestrian activity and interest in a place. Parking is placed behind buildings to develop walkable streetscapes.	Location and form of parking is typically not regulated, resulting in large parking lots in front of buildings.
Placement of buildings on the lot is regulated (frontyard, edgeyard, sideyard, rearyard). How a building is placed on a lot matters in creating a walkable streetscape.	Placement of buildings is only limited by setbacks, creating streetscapes that do not create a walkable environment.
Parking requirements can be reduced when different uses share parking.	Parking requirements are cumulative, leading to excess parking and empty parking lots.
Street standards are designed so that pedestrians feel safe and to encourage walkability.	Street standards are designed primarily to maximize auto volume and speed.
Street standards vary according to transect zone.	
In more urban areas (T4-6), many changes in use do not require a rezoning.	Almost all changes in use require a rezoning, even when the uses are similar (for instance, barber shop to office).
Requires a mix of uses within a walkable neighborhood.	Allows development of vast areas of a single land use.
Prohibits the use of cul-de-sacs except for certain site conditions.	Allows development of excessive cul-de-sacs, funneling all traffic onto a few overburdened roads.
Requires development of connected street networks.	Allows development of dendritic street networks.

### Both the SmartCode and conventional codes:

- Regulate land use to control noxious uses.
- Allow for public input to legislative decisions about rezonings.



## SmartCode Customization

The SmartCode is a model land development code whose provisions and metrics are geared to shape good urban design in a generic medium-sized American city. To adapt the model code to a specific location, a variety of items **must** be customized to local conditions and values. Many of these items have important implications for the urban form that would be created by the code, so it is important to understand the impacts of these decisions. Other items are purely related to local political values and decisions. The best SmartCode for a particular city can only be developed with active engagement of local public officials, city staff, and citizens.

### Public Policy Decisions:

- Where is growth allowed? Where is open space preserved?
- What percentages of different transect zones will be required for each community type?
- Will the code include provisions for Transfer of Development Rights or not?
- Will there be designated A-and B-grids, and if so, where?
- Will the SmartCode be implemented as mandatory, a parallel optional code, a floating optional zone (like a PUD), or some combination?
- What will the development approval process be? Who will be on the Consolidated Review Committee?
- Will transect zones automatically change to the next higher zone at a certain point in time, and if so, when?
- Will there be incentives offered for developing under the SmartCode, and if so, which incentives?
- Language and particular provisions must be customized to work under local state enabling legislation.
- Language and particular provisions must be customized (and/or local land division regulations altered) so that the zoning and land division provisions work together.



### Transect Provisions/Metrics that can/should be Customized:

- Density
- Size of blocks
- Design standards for streets (travel and parking lane widths, number of lanes, effective turning radius, sidewalk requirements, street tree requirements, etc.)
- Types of public frontages allowed
- Sidewalk requirements
- Types of private frontages allowed
- Types of civic spaces allowed
- Minimum and maximum sizes of different types of civic spaces
- Lot width
- Lot coverage
- Front, side, and rear setbacks for both principal and out buildings
- Minimum percentage of frontage that is required to be built out
- Where are buildings allowed to site on the lot (edgeyard, sideyard, rearyard, courtyard)
- What kinds of private frontages are allowed?
- Building height maximums and minimum, expressed in stories
- Minimum and maximum height of stories
- Required recess and/or expression lines
- Uses allowed in each zone, by right or by warrant
- Required parking amounts for each use in each zone
- Shared parking factors
- Parking placement
- Trash container placement
- Types of public planting allowed and/or required
- Types of public lighting allowed and/or required
- Any special district standards



In addition to creating and adopting the text for the land development code, a SmartCode customization may include the creation of a zoning map.

### Items to be Mapped

- Location of open space and growth sectors
- Within Community Plan Areas (areas with a regulating plan), the location of the following items are mapped (some are required and others are discretionary):
  - Required:
    - ◆ Pedestrian sheds
    - ◆ Transect Zones
    - ◆ Specific thoroughfare types
    - ◆ Civic spaces and civic buildings, especially the Main Civic Space
  - Discretionary:
    - ◆ A/B Grids
    - ◆ Bike and/or trail networks
    - ◆ Playgrounds
    - ◆ Site(s) reserved elementary school
    - ◆ Site(s) reserved for childcare facilities
    - ◆ Site(s) reserved for Meeting Hall
    - ◆ Mandatory and/or suggested Retail Frontage
    - ◆ Mandatory and/or suggested Gallery Frontage
    - ◆ Mandatory and/or suggested Coordinated Frontage
    - ◆ Mandatory and/or suggested Cross Block Passages
    - ◆ Mandatory and/or suggested Terminated Vistas

## Implementation Options

	Description	Pros	Cons
<b>SmartCode MUST be use:</b>			
<b>Mandatory/ Exclusive</b> (mapped at time of adoption)	The SmartCode is the exclusive and mandatory land development code in all or part of the municipality.	<ul style="list-style-type: none"> <li>Requires TND development so prevents development patterns the municipality does not want.</li> <li>Staff, public officials, and development industry only have to know one system.</li> </ul>	<ul style="list-style-type: none"> <li>Usually generates heavy political opposition, which creates strong political pressure to water down the code.</li> <li>More choice leads to reduced political opposition to adoption</li> </ul>
<b>Landowner can choose to use the SmartCode or the Conventional Code:</b>			
<b>Unmapped Zone</b> (not mapped at time of adoption)	The SmartCode is adopted, but no regulating plans are mapped at the time of adoption. If a landowner wants to use the SmartCode, s/he must get the land rezoned and prepare a Community Plan that includes the regulating map. The City can adopt incentives to encourage use of the SmartCode (such as faster approval time) or requirements for use in certain conditions (such as in order to get annexation or extension of urban services).	<ul style="list-style-type: none"> <li>Does not require mapping T-Zones at the time of adoption</li> <li>Provides an option for developers who want to create TNDs.</li> <li>Less political pressure to water down the code</li> <li>Incremental approach to adoption, which provides time for staff, public officials and the development industry to learn the review and approval process.</li> </ul>	<ul style="list-style-type: none"> <li>Using the code is optional, so it may never be used.</li> <li>Does not require TND development, unless required with certain conditions.</li> <li>Staff, public officials, and development industry must be familiar with two different kinds of standards</li> </ul>
<b>Replacement for Planned Development District</b> (not mapped at time of adoption)	The SmartCode is adopted as the standards for a Planned Development District, but no regulating plans are mapped at the time of adoption. If a landowner wants to use the SmartCode, s/he must get the land rezoned and prepare a Community Plan that includes the regulating map. The City can adopt incentives to encourage use of the SmartCode (such as faster approval time) or requirements for use in certain conditions (such as in order to get annexation or extension of urban services).	<ul style="list-style-type: none"> <li>Does not require mapping T-Zones at the time of adoption</li> <li>Provides an option for developers who want to create TNDs</li> <li>Less political pressure to water down the code</li> <li>Incremental approach to adoption, which provides time for staff, public officials and the development industry to learn the review and approval process.</li> </ul>	<ul style="list-style-type: none"> <li>Using the code is optional, so it may never be used.</li> <li>Does not require TND development, unless required with certain conditions.</li> <li>Staff, public officials, and development industry must be familiar with two different kinds of standards</li> </ul>

## Adoption Strategies

The adoption options can be combined in various ways. The Montgomery SmartCode was originally adopted as an Unmapped Zone. Because developers used the Unmapped Zone to create successful TNDs, the City became more comfortable with the SmartCode and eventually adopted it as the Mandatory/Exclusive zoning for the downtown. The Pass Christian SmartCode was originally adopted as an Unmapped Zone, with the intent to make it the Mandatory/Exclusive code for the entire City. As the City completed and adopted Community Area Plans, the SmartCode became the Mandatory/Exclusive code within those Community Areas. Gulfport MS followed a similar process.