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Abstract
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Form-Based Codes: An Overview of the Literature

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Urban form, sustainability, community vision, place specificity, code document clarity, and efficiency of the development process are identified as the essential themes behind form-based codes by Evan Evangelopoulos and Cornelius Nurworsoo. The authors note the need to develop measurable parameters to better study these themes and understand the impact of form-based codes in their effort to reform US cities and move them away from Euclidian zoning.

Form-based codes represent an attempt to reform zoning regulations in the US and respond to inefficiencies of traditional Euclidean zoning. This paper presents form-based codes as a set of archetypal themes which create a framework within which to address prevalent criticism, delineate better code assessment criteria, and evolve the form-based code zoning paradigm. Towards this goal, the paper summarizes the reasons behind form-based codes by reviewing foundational form-based code authors and topics. We identified six themes as essential to form-based codes: urban form, sustainability, community vision, place specificity, code document clarity, and efficiency of the development process. This paper concludes that topics of form-based code criticism can fit within the six themes, but evaluating criteria do not address place specificity. It is argued that each theme needs to be separately researched and equipped with measurable parameters to better address and advance form-based code intentions and the overall effort to reform cities in the US.

Introduction

Polyzoides (2008, p. xv) describes form-based codes as a regulating and coding method that supports place-based urbanism in contrast to use-based Euclidean codes that create an urbanism of "congestion, ugliness, impermanence and petroleum dependence". Similarly, other form-based code practitioners such as Opticos, Inc. strongly promote the form-based code paradigm as an important method to address urban issues in the US such as pollution, lack of housing choices, lack of transportation choices, inefficient lifestyles with long commutes, and limitations of Euclidean-based zoning.

Note: This article is based on Evan Evangelopoulos MCRP thesis Neighborhoods, Proximity to Daily Needs and Walkability in Form-Based Codes , supervised by Dr. Cornelius Nuworsoo. It can be found at: http://digitalcommons.calpoly.edu/do/search/?q=Evangelopoulos&start=0&context=565962

Indeed, form-based codes reflect a general trend during the past decades to reform zoning regulations in US cities and respond to new community realities that request walkability, sustainability, commute time reduction, and infrastructure efficiency to apparent inefficiencies of traditional Euclidean Zoning.

Despite such assertions, and while form-based codes are gaining in popularity, pervasive criticism has probably impacted the rate of adoption and many jurisdictions probably hesitate adopting a form-based code. The rate of adoption is relatively slow compared to the rate of Euclidean code adoption in the early 20th century. In the US there are 39,044 general purpose governments that include 19,492 municipal governments, 16,519 township governments and 3,033 county governments.

As of March 2016, after more than three decades of history, the number of adopted form-based codes is 362 or about 0.9% of the total number of cities, townships, and counties in the US (Placemakers, 2016). This rate is extremely slow when compared to the rate of zoning adoption by US cities after the 1916 New York City zoning law when thirteen years later, by 1929, "nearly eight hundred cities in the United States had zoning ordinances" and "more than half the US urban population lived in zoned cities" (Talen, 2012 p.29).

Criticism

Persistent form-based code criticism arises from beliefs that the codes are architecturally restrictive constraining the creative process of architects, disregard community, create indistinguishable towns with a uniform aesthetic forcing cities to accept the transect as a universal city theme, are of little help in towns lacking character, delay the entitlement process with strict regulations and unreasonable variances, incorporate incomprehensible jargon, and promote density and population increases to the detriment of locals (Perez, 2014; Rangwala, 2013; Inniss, 2007).

Although often incorrect, addressing and exploring such criticism can be a complicated issue since circumstances and conditions change. Since form-based codes, for example, are created through extensive citizen participation, criticism about disregarding community seems unreasonable, yet community perspectives can change with long project delays and the arrival of new citizen participants unfamiliar with the form-based code jargon. In the City of Ventura for example, the Great Recession had delayed most projects in the form-based code districts and without proof of results of the adopted codes, the community eventually developed negative attitudes adversely reacting to the words density and infill in the codes and the General Plan. The four form-based codes in the City of Ventura had been adopted after extensive citizen participation in the late 2000's and even now (2016), after the Great Recession, no project has been completed yet, leaving form-based codes without proof of effectiveness and thus vulnerable to criticism.

Aim and Method of Study

With both critics and advocates, form-based codes could benefit from the identification of archetypal themes that create a framework from which to organize, assess, clarify, address, and evolve the form-based code paradigm. Also, every theme could be explored further with the development of theme-specific parameters to evaluate the codes during adoption, application, and after project completion. Thus both assessment criteria and criticism could nest into a specific theme inviting more systematic research of apparent issues.

The aim of this paper is not to address criticism of form-based codes but instead identify major archetypal themes that could represent the full range of form-based code intentions. To identify the themes, this paper reviewed the definition of form-based codes and the writings of foundational initiators, advocates, and authors of form-based codes such as the Form-Based Code Institute (FBCI), Polyzoides, Duany, Parolek, and Talen who not only initiated but also helped shape the form-based code paradigm. A few other authors and publications cover some of the legal perspectives of form-based codes and municipal approaches written by government agencies such as the Chicago Metropolitan Agency for Planning. Exploration of the themes in form-based codes starts with the official Form-Based Code Institute evaluation criteria and definition.

Exploring Themes in Form-Based Codes

Form-Based Code Themes in the Official Definition of Form-Based Codes

In the official definition of form-based codes by the Form-Based Code Institute two themes become apparent, one reflecting urban form, and another reflecting the application of the code (Form-Based Codes Institute, 2016a). The definition states that:

> A form-based code is a land development regulation that fosters predictable built results and a high-quality urban form by using physical form (rather than separation of uses) as the organizing principle for the code *(this part of the definition is associated with the theme of urban form)*. A form-based code is a regulation, not a mere guideline, adopted into city, town, or county law. A form-based code offers a powerful alternative to conventional zoning regulation *(this part of the definition is associated with the theme of Code Application)*.

Form-Based Code Institute, Placemakers, Inc. and Code Evaluation

The Form-Based Code Institute (2016) "is a non-profit professional organization dedicated to advancing the understanding and use of form-based codes. It is the official voice of form-based codes in the US with a yearly award program. Placemakers, Inc. (2016) is a planning and design firm that promotes placemaking and form-based codes and has developed criteria to evaluate form-based codes. FBCI and Placemakers have worked together, and many of their evaluation criteria overlap. Both groups have several examples of evaluated and approved codes on their websites.

The effort to identify form-based code themes continued by reorganizing the evaluation criteria by FBCI and PlaceMakers into broader themes based on apparent similarities which revealed an overall form-based codes focus on Urban Form, Community Vision, Document Clarity, and Code Application. The official definition of form-based codes discussed earlier reflected only two of these themes, Urban Form and Code Application. Out of nineteen evaluation criteria, seven reflected urban form, two community vision, seven code document clarity, and three code application.

Form-Based Code Themes in FBCI and PlaceMakers Evaluation Criteria

Urban form-related evaluation criteria

1. Is the code's focus primarily on regulating the urban form and less on land use?
2. Does the code emphasize standards and parameters for form with predictable physical outcomes (build-to lines, frontage type requirements, etc.) rather than relying on numerical parameters (FAR, density, etc.) whose outcomes are impossible to predict?
3. Does the code require private buildings to shape public space through the use of building form standards with specific requirements for building placement?
4. Does the code promote and/or conserve an interconnected street net-work and pedestrian-scaled blocks?
5. Will the code shape the urban form to invite pedestrian use and social interaction?
6. Will the code produce walkable, identifiable neighborhoods that provide for daily needs?

7. Are parking requirements compatible with pedestrian-scaled urbanism?

Community vision-related evaluation criteria

8. Is the code based on a sufficiently detailed physical plan and/or other clear community vision that directs development and aids implementation?
9. Does the code implement a plan that reflects specific community themes?

Code document clarity-related evaluation criteria

10. Are regulations and standards keyed to specific locations on a regulating plan?
11. Are the diagrams in the code unambiguous, clearly labelled, and accurate in their presentation of spatial configurations?
12. Is the overall format and structure of the code readily discernable so that users can easily find what is pertinent to their interest?
13. Are the technical terms used in the code defined in a clear and understandable manner?
14. Does the code format lend itself to convenient public distribution and use?
15. Are the themes of each regulation clearly described and apparent even to planning staff and citizens who did not participate in its preparation?
16. Can users readily understand and execute the physical form intended by the code?

Code application-related evaluation criteria

17. Is the code regulatory rather than advisory?
18. Are the procedures for code administration clearly described?
19. Is the form-based code effectively coordinated with other applicable policies and regulations that control development on the same property?

Additional Sources of Form-Based Code Theme Identification

To further explore form-based code themes we selected seven other sources some of which are well-known form-based code reference books such as Form-Based Codes by Parolek, D., Parolek, K., & Crawford, P. (2008). References in some of the publications and online search identified the rest of the sources. Although the literature on form-based codes was not as rich as expected the additional sources provided a good range of approaches, from the historical perspective of Emily Talen (2009) to the legal aspects of FBCs by Emmerson (2006).

These additional sources verified the themes identified in the form-based code definition and evaluation criteria, but they added two more: specificity to locality (tailoring the code to local characteristics) and sustainability. The theme of urban form closely relates to quality of life signalling the obvious that form-based codes attempt to create an urban environment that positively affects quality of life.

Table 1 presents a summary list of form-based code themes and shows that the themes can be divided into two types: four themes that focus on community and urban form; and two themes that focus on the structure and application of the coding document. Table 2 presents the form-based code themes present in the literature reviewed.

While there is a preponderance of overlap on the coverage of themes among various sources, no single source covers all identified themes. Table 3 presents criticism topics as presented by Perez (2014), Rangwala (2013), and Inniss (2007) easily nested within the six form-based code themes revealing that form-based codes should be already addressing these issues. The fact that these criticism topics contradict form-based code intentions may reveal real problems and the need to address such criticism more effectively in adopted form-based codes.

Discussion of Themes

This section discusses the form-based code themes as presented under the two theme types in Table 1.

Type 1: Community and Urban Structure Form-Based Code Themes

Urban form and quality of life Form-Based Code Theme

The urban form and quality of life form-based code theme relates to the application of standards that aim at a specific urban form ideal which avoids an urbanism of "congestion, ugliness, impermanence and petroleum dependence" (Polyzoides, 2008, p. xv), lack of housing choices, lack of transportation choices, and inefficient lifestyles with long commutes. An ideal urban form promotes walkability, sustainability, commute time reduction, and infrastructure efficiency.

Towards such goals, form-based codes apply urban form principles such as the quarter-mile pedestrian shed and the concept of a neighbourhood with a centre and edge (Duany, Sorlein, & Wright, 2008; Parolek, Parolek & Crawford, 2008).

Table 1: Types of Form-Based Code Themes.

Type 1: Community and Urban Structure Themes:	Type 2: Code Document and Code Application Themes:
1. Quality of life and quality of urban form	5. Clarity of zoning documents
2. Specificity to locality	6. Easy application process
3. Community vision	
4. Sustainability	

Table 2: Types of form-based code themes in reviewed documents.

Documents	Themes						
	Community and Urban Structure Themes				Code Document and Code Application Themes		Other
	Urban Form and Quality of Life	Sustaina bility	Community vision	Specificity to locality	Code application	Code document structure and clarity	Other
Evaluation Criteria (Placemakers, 2015, FBCI, 2015)	X		X		X	X	
FBCI, 2015	X		X	X	X	X	
Chicago Manual, 2014	X		X	X	X	X	
Talen, 2009	X		X	X		X	
Duany et al., 2008	X	X				X	Neighborhood-Urbanism[1] Walkability[1] Community-Strengthening[2] Transit[1]
Plater-Zyberk, 2008	X	X	X	X		X	
Polyzoides, 2005 & 2008	X	X	X	X		X	Community-Strengthening[2]
Parolek et al., 2008	X	X	X	X		X	Application of Urban Principles[1]
Emerson, 2006	X	X		X	X	X	
	NOTES: 1 Relates to 'quality of life and public realm' 2 Relates to 'specificity to locality'						

Table 3: Form-based code criticism nested within the six themes. Some criticism topics may reflect more than one theme and therefore appear multiple times on this table.

Type 1: Community and Urban Structure Themes	Type 2: Code Document and Code Application Themes
1. Quality of urban form and quality of life CRITICISM: ○ FBCs promote density and population increases to the detriment of locals ○ FBCs are architecturally restrictive constraining the creative process of architects ○ FBCs create indistinguishable towns with a uniform aesthetic	**5. Clarity of zoning documents** CRITICISM: ○ FBCs incorporate incomprehensible jargon
2. Specificity to locality CRITICISM: ○ FBCs create indistinguishable towns with a uniform aesthetic ○ FBCs force cities to accept the transect as a universal city theme, ○ FBCs are of little help in towns lacking character	**6. Easy application process** CRITICISM: ○ FBCs delay of the entitlement process with strict regulations and unreasonable variances, ○ FBCs are architecturally restrictive constraining the creative process of architects
3. Community vision CRITICISM: ○ FBCs disregard of community, ○ FBCs promote density and population increases to the detriment of locals ○ FBCs are architecturally restrictive constraining the creative process of architects	
4. Sustainability CRITICISM: ○ FBCs promote density and population increases to the detriment of locals	

Neighbourhoods are described as quarter-mile pedestrian sheds with a commercial, retail, or civic centre providing a walkable environment close to daily destinations. A prime example of the application of this theme is the award-winning Cincinnati form-based code which specifically focuses on creating walkable neighbourhoods at selected locations. It is important to recognize that walkability, proximity to daily destinations and quarter-mile pedestrian sheds are integral aspects of many old towns.

Towards urban form goals form-based codes also use transects, streets, or building frontages to organize the code within identified pedestrian sheds and include regulations and standards which control the features, configurations, and functions of buildings that define the urban form. An example is the attempt to control the form and mass of buildings in relation to one another with standards such as number of stories, building placement, setbacks, reduced parking requirements, and short-block requirements in large developments.

Although seven of the official form-based code evaluation criteria are currently nested in this theme, the quarter-mile pedestrian circle is not represented there. Further exploring the adequacy of evaluation criteria within this theme could help clarify the intent of form-based codes in regards to urban form and better assess implementation.

The criticism that form-based codes are architecturally restrictive constraining the creative process of architects is nested in this theme. Further exploration and identification of parameters necessary to achieve an urban form that contributes to the quality of life could clarify which aspects of this criticism are valid and to what extent and formulate effective responses or corrections.

Sustainability Form-Based Code Theme

Use-based codes such a Euclidean Codes separate workplaces and daily destinations from residential areas and require extensive travel between different uses while single-family housing consumes large tracts of land increasing commuting distances.

Form-based codes focus on walkable neighbourhoods, pedestrian sheds, and interconnected development patterns and thus create neighbourhoods that require less travel to daily destinations. Fewer vehicle miles travelled, and preservation of land otherwise consumed by subdivision sprawl are two of the potential contributions of form-based codes to sustainability. Since sustainability pursuits seem attainable through urban form modifications the codes advocate, sustainability as a theme could be merged with the first theme of urban form and quality of life.

Specificity to locality Form-Based Code Theme

Specificity to locality addresses the tailoring of form-based codes to local conditions. Community input and site analysis are

extremely useful tools to identify unique local natural features, cultural norms, traditions, local history, and architecture to integrate into the code standards.

The Benicia, CA form-based code, for example, was tailored to protect the character of the historic downtown with standards that coordinated new development with local architecture.

No official FBCI and Placemakers, Inc. form-based code evaluation criteria are currently nested in this theme, and such absence is probably hurting clarification of form-based code intentions and implementation assessment.

Criticism that form-based codes create indistinguishable towns with a uniform aesthetic and are not helpful in towns lacking character is nested in this theme. Further exploration and identification of parameters necessary to create a code that reflects specific attributes of a locality could clarify which aspects of such criticisms are valid, to what extent, and formulate effective responses or corrections.

Community Vision Form-Based Code Theme

In form-based code planning, numerous community meetings and charrettes at-tempt to identify not only significant natural and architectural features but also important community issues and bring a form of a consensual vision for the city's future.

Community vision determines the desired architectural style and right locations for application of the quarter-mile walkable neighbourhood. Stricter or more flexible architectural zoning standards may be used depending on community input. In neighbourhoods where the community wants to preserve a specific architectural style form-based codes might be architecturally strict but only as a result of community's input. In many instances, form-based codes are flexible, allowing a variety of architectural expressions as long as there are zoning standards ensuring a pedestrian-friendly environment in central neighbourhood areas. The Cincinnati form-based code, for example, allows several building types per transect.

Only two official FBCI and Placemakers, Inc. form-based code evaluation criteria are currently nested in this theme, which raises the question of how well form-based codes address community vision and community changes as in the example form Ventura mentioned earlier. Further exploring the adequacy of evaluation criteria within this theme could help clarify the intent of form-based codes in regards to utilizing community vision and better assess implementation.

Criticism that form-based codes disregard community, force cities to accept the transect as a universal city theme, and promote density and population increases to the detriment of locals is nested in this theme. Further exploration and identification of the necessary parameters to create a code that reflects community intentions could clarify which aspects of such criticisms are valid, to what extent, and formulate effective responses or corrections.

Type 2: Code Document and Code Application Form-Based Code Themes

Clarity and Improved Structure of Zoning Documents Form-Based Code Theme

Polyzoides (2005 & 2008) says, in the attempt to be brief, form-based codes are comprehensible, integrated, focused, clearly spelling out changes and adjustments, and precise with specific dimensions for urban standards. One of the Cincinnati neighbourhood transects shows an example of this attempt for a simple and succinct presentation of code standards with many illustrations as shown in Figure 1.

Indeed at least in theory FBCs represent a comprehensive approach to codes, combining many documents into one reducing cross-reference. The intention is to integrate planning at different scales from the region to the block and building. As a result, form-based codes attempt to create what is referred to as a unified development ordinance integrating subdivision and public works standards in addition to integrating architectural, landscape, signage and other development standards. Furthermore, form-based codes use both words and diagrams becoming highly illustrated documents. Although the legality of using diagrams was initially challenged, such a format is currently widely accepted. FBCs also attempt to craft codes that are shorter, easier to read, more concise and emphasize illustrations. The creation of common sets of regulations for both new and existing communities makes the code more efficient and easier to access (Chicago Metropolitan Agency for Planning, 2014).

Although seven official FBCI and Placemakers, Inc. form-based code evaluation criteria are currently nested in this theme, they seem to neglect the persistent stakeholder confusion by the use of the transect terminology. Further exploring the adequacy of evaluation criteria within this theme could help clarify the intent of form-based codes and better assess implementation.

Criticism that form-based codes incorporate incomprehensible jargon is nested in this theme. Further exploration and identification of parameters necessary to achieve a working form-based code document easy to understand could clarify and enumerate aspects of this criticism which are valid and formulate effective responses or corrections.

Efficiency of the application process Form-Based Code Theme

FBCs intend to be easy to understand and administer, facilitate a clearly defined and streamlined project review and approval process and provide transparency and predictability in regulations (Parolek, Parolek & Crawford, 2008). FBCs also encourage administrative approvals rather than approvals by public hearing, thus shortening the development review process (Duany, Sorlein, & Wright, 2008).

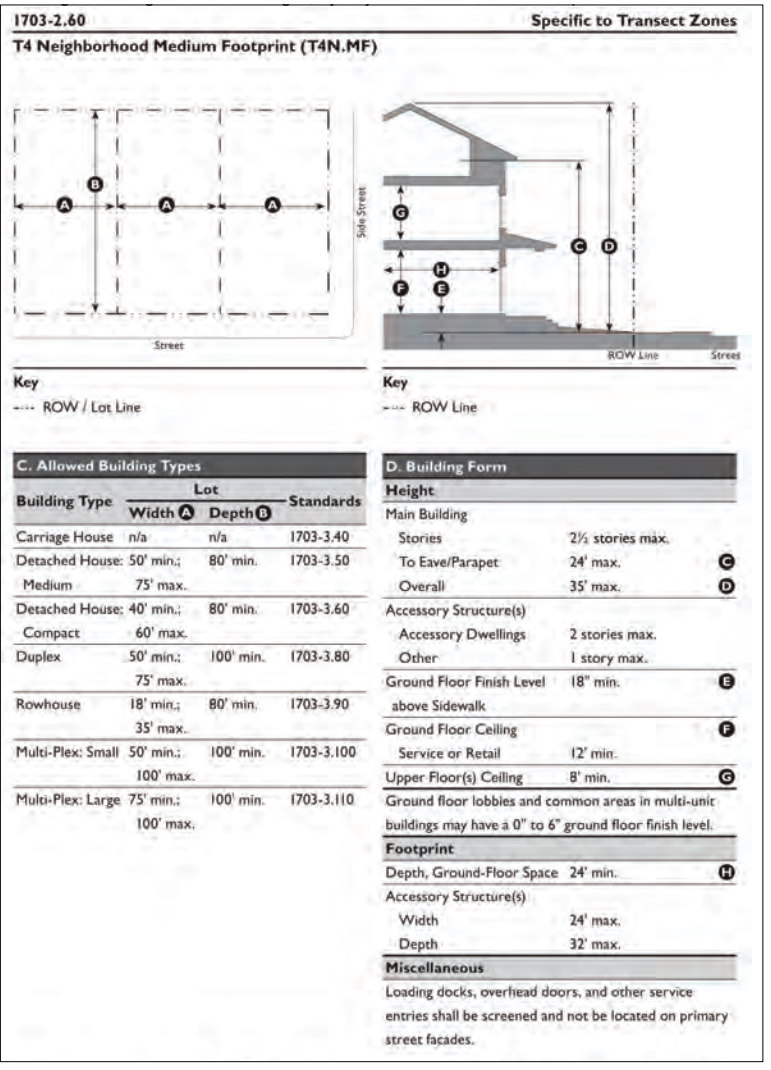
Form-based codes intend to address a range of inefficiencies in Euclidean Codes such as lack of predictability, multiple cross-

referencing documents with numerous waivers and rezonings. Form-based codes intend to minimize the need for variances and increase the range of options compared to Euclidean codes.

FBCs also encourage specific outcomes through both incentives and prohibitions and the code becomes predictable for both the community and the developers. (Duany, Sorlein, & Wright, 2008; FBCI, 2014).

Predictability also results from the need to ensure a walkable environment. Since one of the form-based code, themes is to improve quality of life by creating walkable environments, predictability of built results is desired. A pedestrian-oriented environment depends on the location of the buildings or residences in relation to the sidewalk and on sidewalk and street standards and parameters. Euclidean zoning standards cannot predict a pedestrian-friendly environment since floor-area ratios (FAR), typically used in Euclidean codes, do not ensure building placements that reinforce walkability. Form-based standards, however, aim at walkable environments.

Figure 1: Cincinnati form-based code zoning standards. This is the second of five and a half pages of standards, all similarly arranged, showing simple, brief and succinct code standard format and a diversity of building types. (from City of Cincinnati, 2014)



Although three official FBCI and Placemakers, Inc. form-based code evaluation criteria are currently nested in this theme, some seem absent such as reference to code variances and how efficiently application of variances in form-based codes facilitate the approval process. Further exploring the adequacy of evaluation criteria within this theme could help clarify the intent of form-based codes and better assess implementation.

Criticism that form-based codes delay the entitlement process with strict regulations and unreasonable variances is nested in this theme. Further exploration and identification of parameters necessary to create a code that facilitates fast and streamlined entitlement process could clarify which aspects of such criticism are valid, to what extent, what types of form-based codes, and formulate effective responses or corrections.

Discussion

The six identified form-based code themes summarize the opinions of foundational authors and publications. The six themes identified reveal that it is important to promote a form-based code that aspires toward cities with an urban structure that improves quality of life, reflects and promotes community vision, is specific to the locality, promotes sustainable cities, includes documents that are comprehensible and easy to read, and supports an efficient and timely entitlement process. Such goals may not simply apply to the form-based code but more generally to the whole city document pack including the general plan.

It is arguable that sustainability as a theme may be redundant since it is attained through urban form modifications under the Urban Form theme. However, since it is mentioned by so many authors sustainability has remained a distinct theme on the list.

The conceptual format of the six themes under two theme types makes it possibly easier to clarify form-based codes to stakeholders and avoid misconceptions which may be critical towards speeding up the rate of form-based code adoption. In addition, when form-based code intentions are presented in the clear format of the six themes, criticism topics could easily nest within each theme and allow addressing criticism more methodically.

Form-based codes that reflect all six themes are probably the most adequate codes to represent the form-based code movement, but it is not easy to determine how adequately a form-based code incorporates them and the development of measurable parameters for each theme would pave the way for a better assessment of form-based code effectiveness. For

example, both the quarter-mile pedestrian circle and walkability are important for the Urban Form theme, and an adequate form-based code should incorporate these concepts at least on paper. However, the effectiveness of transects, building types, or zoning standards used to apply the quarter-mile circle or walkability can only be assessed after implementation, when valuable lessons can be extracted to improve the code. Identifying parameters in the Community Vision theme could include the assessment of public participation efforts during drafting and after implementation of the code, and how the code communicates intentions to stakeholders or address political and citizenry changes over time, as is the case in the City of Ventura discussed in the introduction.

Conclusion

Form-based codes closely relate to New Urbanism and are a label for codes that promote a place-based urbanism of walkability, sustainability, commute time reduction, infrastructure efficiency and responds to inefficiencies of traditional Euclidean Zoning. Although heavily promoted by the Form-Based Code Institute and practitioners such as Opticos, Inc. Duany Plater-Zyberk & Co and Moule & Polyzoides, the rate of adoption has been relatively slow and criticism rampant.

Form-based codes are evaluated by criteria set by the Form-Based Code Institute and Placemakers, Inc. which seem to cover a vast area of topics and lack measurable parameters for evaluation. The goal of the article was to propose a structure that addresses both criticism and evaluation of form-based codes in a more systematic way. Towards this goal, this article identified archetypal themes in both the official definition and the form-based code evaluation criteria and expanded to explore archetypal themes in foundational publications, authors, and topics.

The article identified two major areas that form-based codes attempt to address: a) urban structure and community, and b) code document and entitlement process.

The six major themes under these two areas are urban form and quality of life, specificity to locality, community vision, sustainability, clarity and improved structure of the coding document, and efficiency in the application process.

One of the practical implications of the six themes is that they provide a structure that nests topics of criticism, and set the stage for the development of measurable parameters unique to every theme that may help evaluate codes before and after implementation but also identify specific areas for future research (see Appendix 1). Creating a structure that identifies future research is important since defendants of form-based codes wish to move away from Euclidean zoning and move towards an advanced and more efficient code. Yet, criticism is prevalent and the rate of adoption of form-based co des and legislation is relatively low.

The six themes appear to represent the full range of intentions behind form-based codes, reflecting the ambitious vision set forth the form-based codes movement. This vision attempts to adjust urban form, borrow from local character, incorporate the community, and simplify zoning documents and the entitlement process in order to create a place-based urbanism of walkability, sustainability, commute time reduction, infrastructure efficiency, and an alternative to inefficiencies of traditional Euclidean Zoning.

As a final thought, and since Form-Based Codes ultimately may represent just a "label" for some, it may make sense to suggest that this label may not be necessary for a code that incorporates the six themes. By adopting the six major themes in their codes, municipalities would be able to disengage from using the expression "Form-Based Code", currently writhe in much criticism and nay-saying, and instead opt to promote the intentions behind the themes with the creativity and engagement necessary for a place-based urbanism, as envisioned by the founders and innovators of the New Urbanism and form-based code movements.

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Appendix 1: Potential Research Questions

One way to develop specific parameters for each theme is to ask questions specific to each theme. The following are examples of questions emanating from these themes that a planning department, a consultant, or researcher could ask to create parameters that evaluate the effectiveness of an adopted form-based code:

Questions regarding the Urban Form Theme

- Did urban form changes (as a result of the form-based code) contribute to walkability and reduction of daily travel time to destinations (or else Vehicle Miles Travelled)? What are these helpful changes that form-based codes introduced?
- Are the sidewalks and urban spaces more active as a result of form-based codes? In what way? How has the code helped increase urban activity?
- What specific form-based code standards contribute to walkability?

Questions regarding the Specificity to Locality Theme

- Is there a manifestation of local character in neighbourhoods as a result of adopted FBCs?
- How has the new code promoted local character?
- What aspects of local character is the code enhancing and promoting?

Questions regarding the Community Vision Theme

- Is the community satisfied with the application of the code?
- What aspects of the code are especially satisfactory to the community?
- What are the most contentious subjects?
- Are the adopted form-based codes sufficiently explained to new members of the City Council and new participants in the local Community?

Questions regarding Code Clarity and Document Structure

- Are the city planners, developers and other stakeholders satisfied with the clarity of the code document?
- Is the code document easier to understand than the code it replaced? What is satisfactory and easier to understand and what is not?
- Do stakeholders find the new code easier than the old Euclidean code it replaced?
- What parts of the code are harder to communicate?

Questions regarding the Application of the Codes

- Is the code document easier to administer and does the code facilitate the entitlement process? In what ways?
- What are the required adjustments to improve the entitlement process?
- How are variances obstructing or facilitating the entitlement process?
- Does the form-based code require more variances than the Euclidean code it replaced?