

Kentucky Model Access Management Ordinance



Version 1.1
October 2004

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Part 1

Overview

Introduction

The ***Kentucky Model Access Management Ordinance*** has been adapted from the Florida *Model Land Development & Subdivision Regulations That Support Access Management*, developed by the Center for Urban Transportation Research and the Florida DOT. This model ordinance is provided to assist Kentucky cities and counties in developing access management ordinances to further improve safety and traffic flow efficiency of Kentucky's roadways. Although the ordinance does not cover all access treatments, it does cover the most-used treatments. Municipalities are urged to tailor the ordinance to meet local needs and develop additional language as necessary.

Overview

Effective local access management requires planning as well as regulatory solutions. Where applicable, communities should establish a policy framework that supports access management in the local comprehensive plan, prepare corridor or access management plans for specific problem areas, and encourage good site planning techniques. Land development and subdivision regulations should be amended accordingly. Communities may also consider a separate access management ordinance. Access management programs should address commercial development along thoroughfares, as well as flag lots, residential strips, and other issues related to the division and subdivision of land. Comprehensive and subarea plans provide the rationale for access management programs and can serve as the legal basis for public policy decisions.

Communities are increasingly concerned about the effects of development on service costs, community character, and overall quality of life. Yet conventional regulatory practice has played a role in perpetuating land development problems. Nowhere is this more apparent than the cycle of functional obsolescence created by strip commercial development along major arterials. The practice of strip zoning major corridors for commercial use is widespread across Kentucky. The primary reasons are accessibility and the expedience of rezoning highway frontage for commercial use as additional land is needed. Extension of utilities along highway rights-of-way promotes this linear land use pattern, and commercial businesses favor corridor locations because of the ready supply of customers.

Yet as development intensifies along a roadway, the growing number of curb cuts and turning movements conflict with the intended function of arterials - to move people and goods safely, quickly, and efficiently. Unlike urban downtowns or activity centers, commercial strips are rarely designed for pedestrians or transit. Commercial corridors, residential areas, and office parks are frequently sealed off from each other with walls, ditches, loading docks and a host of other barriers—including the heavily traveled arterials that serve them.

Poorly coordinated access systems force more trips onto the arterial, traffic conflicts multiply, and congestion increases. As the level of service declines, additional lanes, controlled medians, and other expensive retrofitting measures are needed to maintain the capacity of the corridor for regional traffic. Businesses also suffer as accessibility deteriorates. Heavy traffic, difficult left turns, and poor sight clearance at corners deter customers. Businesses may relocate to areas where accessibility is less impaired, causing increased vacancies and declined property values in the area from where they moved. Eventually the corridor is transformed into an unattractive and confusing jumble of signs, curb cuts, utility lines, and asphalt.

These are not inevitable results of development and growth. Rather, they relate to the lack of adequate land division and access controls and problems inherent in current planning and regulatory practice. This report examines the role of the comprehensive plan in developing an

access management program, aspects of current regulatory practice that contribute to access problems, and regulatory techniques that support access management principles.

The Comprehensive Plan

The local comprehensive plan is the policy and decision making guide for future development and capital improvements in the municipality or county. It analyzes development trends; identifies key planning issues; provides the policy framework; and specifies strategies for carrying out the plan. Purposes of the plan are to:

- promote orderly and efficient development;
- protect property values;
- preserve community character, natural resources, and the environment;
- promote economic vitality; and
- increase public awareness of the forces of community change.

Local comprehensive plans should establish how the community will balance mobility with access, identify the desired access management approach, and designate corridors that will receive special treatment. This may be supplemented through functional plans, such as an access management or thoroughfare plan, or through subarea plans, such as an interchange or corridor plan.

The comprehensive planning process is an opportunity to increase community awareness of the forces of change and determine a strategic course of action. What level of growth can the community expect? What are the future land use and capital improvement needs? And what type of land development patterns do citizens prefer? Public opinion surveys, town meetings, and visioning workshops may be used to identify citizen concerns and build political support for regulatory change. Citizen dissatisfaction with commercial strips, for example, can be translated into policies for joint access, shared parking, and sign regulation. When evaluating future land use needs, communities should account for vacancies and surplus land already available for that use. Many communities set aside far more land than required to accommodate reasonable estimates of growth, thereby encouraging scattered development patterns and strip development. It is not uncommon for communities to strip zone the majority of their highway frontage for commercial use. Additional highway frontage should not be planned or rezoned for commercial use where vacant or surplus commercial space is already available. This encourages reuse of existing commercial sites, increases property values in those areas, and is a long term economic development strategy.

Some cities have incorporated these planning and access management principles into their comprehensive plan. Examples of these principles include

- designated mixed-use corridors, rather than commercial strips;
- mandatory mixed use with transit access in activity centers;
- limiting the supply of commercial areas to encourage reuse;
- designated cross access corridors with joint access requirements;
- comprehensive access classification and driveway spacing;
- policies and standards relating to bicycle and pedestrian access.

Subdivision Regulations

Subdivision regulations help ensure:

- proper street layout in relation to existing or planned roadways;
- adequate space for emergency access and utilities;
- adequate water, drainage, and sanitary sewer facilities;
- appropriate site design.

The subdivision ordinance establishes:

- the administrative review and evaluation procedure for processing conceptual, preliminary, and final plats
- information that must be included on the plat
- design principles and standards for lots, blocks, streets, public places, pedestrian ways, and utilities
- required improvements, including streets, sidewalks, water, sewer, and curbs and gutters;
- financing and maintenance responsibilities.

The subdivision review process should address a variety of issues, including these transportation related issues:

- Is the road system designed to meet the projected traffic demand and does the road network consist of hierarchy of roads designed according to function?
- Is access properly placed in relation to sight distance, driveway spacing, and other related considerations?
- Do units front on residential access streets rather than major roadways?
- Does the project avoid areas unsuitable for development?
- Does the pedestrian path system link buildings with parking areas, entrances to the development, open space, and recreational and other community facilities?
- Have utilities been properly placed?

State subdivision statutes grant local governments authority to regulate subdivision of land and establish minimum requirements for subdividing and platting. Subdivision is defined as the division of land into two or more parcels and provides exceptions only in special circumstances.

Yet many local subdivision statutes exempt division of land into larger parcels or creation of a small number of lots from review and conformance with subdivision. These plans evaluate long term trends; provide data on traffic accidents and related considerations; and establish the relationship between access management and other community objectives, such as congestion management and transportation level of service. By establishing the relationship between regulatory strategies and public health, safety, and welfare, these plans can serve as the legal basis for access controls.

Corridor Overlay Zones

Overlay zones are a method for managing access along commercial corridors. The technique is used to overlay a special set of requirements onto an existing zoning district, while retaining the underlying zoning and its associated requirements. Text that specifies standards for the access management overlay district is included in the land development (or zoning) code and then corridors are designated on the zoning map. Overlay requirements may address any issues of concern such as joint access, parking lot cross access, reverse frontage, driveway spacing and limitation on new driveways. See Section 14 of the Model Regulations for corridor overlay standards.

Model Ordinance

Features of the model ordinance include classification of roadways by function and requirements for sight distance, driveway spacing, maximum driveways per lot, corner lot access, corner clearance, shared (joint and cross) access, turn radius, driveway width, driveway throat length, and parking/loading. The model ordinance contains commentary to establish the logic behind the

ordinance and assist the planner in the tailoring of the local ordinance. These commentaries should be stricken from the actual local ordinance. In addition, there are several areas within the ordinance marked in blue that should be replaced with the appropriate name of local agencies, documents, etc.

Conclusion

Access management, if implemented locally, addresses a broad array of quality of life issues fundamental to promoting livable, prospering communities. Land division and access controls:

- Foster well designed circulation systems that improve the safety and character of commercial corridors;
- Discourage subdivision practices that destroy the rural character of the landscape or essential natural resources;
- Advance economic development goals by promoting more efficient use of land and transportation systems;
- Help control public service costs and the substantial public investment in infrastructure and services.

Part 2

Model Regulations

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Section 1. Intent and Purpose

The intent of this ordinance is to provide and manage access to land development, while preserving the regional flow of traffic in terms of safety, capacity, and speed. Major thoroughfares, including highways and other arterials, serve as the primary network for moving people and goods. These transportation corridors also provide access to businesses and homes and have served as the focus for commercial and residential development. If access systems are not properly designed, these thoroughfares will be unable to accommodate the access needs of development and retain their primary transportation function. This ordinance balances the right of reasonable access to private property, with the right of the citizens of the (city/county) and the Commonwealth of Kentucky to safe and efficient travel.

To achieve this policy intent, state and local thoroughfares have been categorized by function and classified for access purposes based upon their level of importance. Regulations have been applied to these thoroughfares for the purpose of reducing traffic accidents, personal injury, and property damage attributable to poorly designed access systems, and to thereby improve the safety and operation of the roadway network. This will protect the substantial public investment in the existing transportation system and reduce the need for expensive remedial measures. These regulations also further the orderly layout and use of land, protect community character, and conserve natural resources by promoting well-designed road and access systems and discouraging the unplanned subdivision of land.

Section 2. Applicability

This ordinance shall apply to all arterials and selected collectors within (city/county), as identified in Table 1, and to all properties that abut these roadways. The access classification system and standards of the Kentucky Transportation Cabinet (KYTC) shall apply to all roadways on the State Primary Road System.

Section 3. Conformance with Plans, Regulations, and Statutes

This ordinance is adopted to implement (cite specific policies) of the (city/county) as set forth in the (name local comprehensive plan). In addition, this ordinance conforms with (cite specific policies) of the (name of Metropolitan Planning Organization – if applicable) as specified in the (name of long range transportation plan – if applicable), and the planning policies of the KYTC set forth in the Kentucky Statewide Transportation Plan. The ordinance also conforms with the access classification system and standards of the KYTC, and policy and planning directives of the Federal Highway Administration.

Commentary: *The link between regulations and public policy has undergone intense legal scrutiny in recent years. To establish this link, local governments should clearly identify the intent and purpose of the regulatory program, and specify any plans, state and federal regulations, or statutes that will be carried out through the regulatory standards. It is also important to cite specific planning policies that are being advanced through these regulations. Local governments in designated transportation management areas may also cite access management as a congestion management measure in accordance with the federal transportation planning regulations. Communities that do not lie within the planning area boundaries of a Metropolitan Planning Organization (MPO) would simply leave out the reference to MPOs in this section. Demonstrating conformance with state and federal law, and with the local comprehensive plan, is important in strengthening the legal basis for any local regulatory program.*

Section 4. Definitions

- **Access** - A way or means of approach to provide vehicular or pedestrian entrance or exit to a property.
- **Access Classification** - A ranking system for roadways used to determine the appropriate degree of access management. Factors considered include functional classification, the appropriate local government's adopted plan for the roadway, subdivision of abutting properties, and existing level of access control.
- **Access Connection** - Any driveway, street, turnout or other means of providing for the movement of vehicles to or from the public roadway system.
- **Access Management** - The process of providing and managing access to land development while preserving the regional flow of traffic in terms of safety, capacity, and speed.
- **Access Management Plan (Corridor)** - A plan illustrating the design of access for lots on a highway segment or an interchange area that is developed jointly by the state, the metropolitan planning organization, and the affected jurisdiction(s).
- **Cartway** - That area of road surface from curb line to curb line or between the edges of the paved or hard surface of the roadway, which may include travel lanes, parking lanes, and deceleration or acceleration lanes.
- **Connection Spacing** - The distance between connections, measured from the closest edge of pavement of the first connection to the closest edge of pavement of the second connection along the edge of the traveled way.
- **Corner Clearance** - The distance from an intersection of a public or private road to the nearest access connection, measured from the closest edge of the pavement of the intersecting road to the closest edge of the pavement of the connection along the traveled way. (see Figure 1)

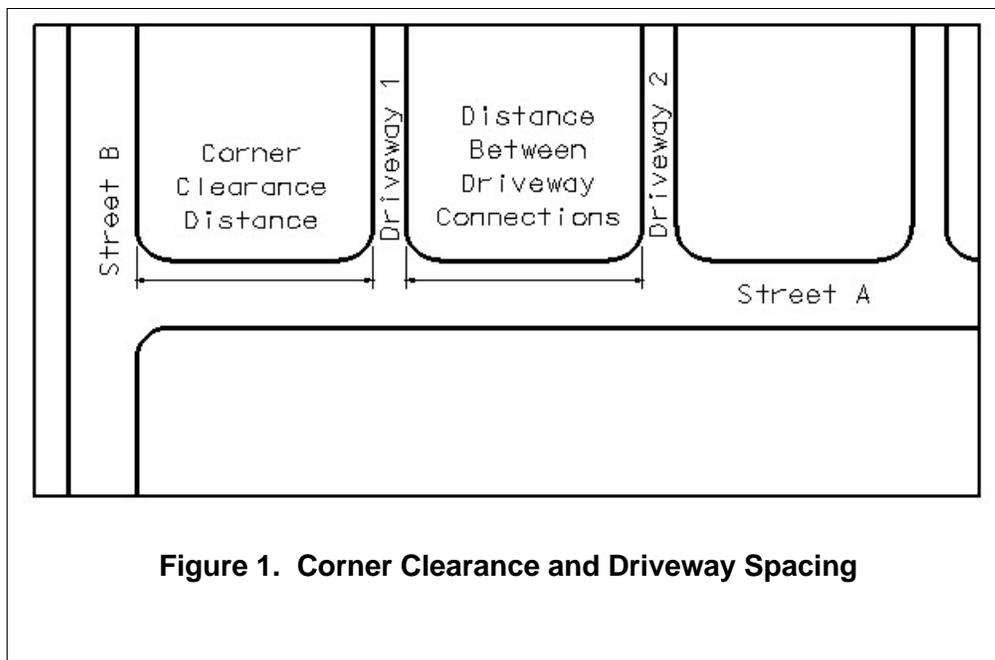
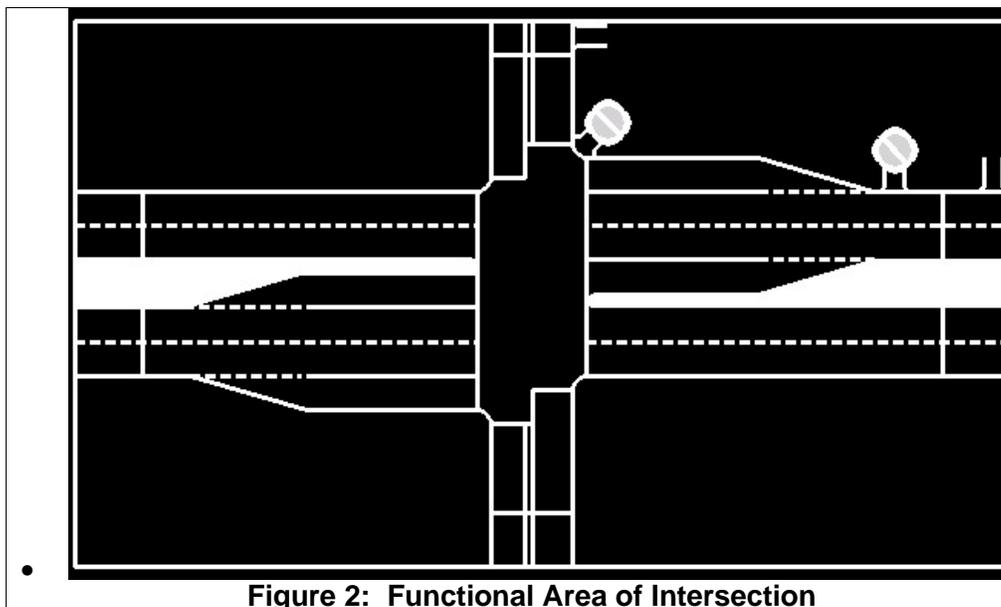


Figure 1. Corner Clearance and Driveway Spacing

- **Corridor Overlay Zone** - Special requirements added onto existing land development requirements along designated portions of a public thoroughfare.

- **Cross Access** - A service drive providing vehicular access between two or more contiguous sites so the driver need not enter the public street system. (see Figure 4)
- **Deed** - A legal document conveying ownership of real property.
- **Directional Median Opening** - An opening in a restrictive median which provides for specific movements and physically restricts other movements. Directional median openings for two opposing left or "U-turn" movements along a road segment are considered one directional median opening.
- **Easement** - A grant of one or more property rights by a property owner to or for use by the public, or another person or entity.
- **Frontage Road** - A public or private drive which generally parallels a public street between the right-of-way and the front building setback line. The frontage road provides access to private properties while separating them from the arterial street. (see also Service Roads)
- **Full Median Opening** - An opening in a restrictive median that allows all turning movements from the roadway and the intersecting road or access connection.
- **Functional Area (Intersection)** - That area beyond the physical intersection of two controlled access facilities that comprises decision and maneuver distance, plus any required vehicle storage length, and is protected through corner clearance standards and driveway connection spacing standards (see Figure 2).



- **Functional Classification** - A system used to group public roadways into classes according to their purpose in moving vehicles and providing access.
- **Joint Access (or Shared Access)** - A driveway connecting two or more contiguous sites to the public street system.
- **Lot** - A parcel, tract, or area of land whose boundaries have been established by some legal instrument, which is recognized as a separate legal entity for purposes of transfer of title, has frontage upon a public or private street, and complies with the dimensional requirements of this code.
- **Lot, Corner** - Any lot having at least two (2) contiguous sides abutting upon one or more streets, provided that the interior angle at the intersection of such two sides is less than one hundred thirty-five (135) degrees.

Commentary: Corner lots can create confusion in relation to dimensional requirements. The recommended approach is to designate one frontage as the "front" and the rear lot line would be that opposite the designated frontage. Both portions of the lot with street frontage should still be required to meet the required frontyard setback to ensure adequate sight distance and consistency of setback with abutting properties. A lot abutting a curved street(s) is typically considered a corner lot if the arc has a radius less than one hundred and fifty (150) feet.

- **Lot Depth** - The average distance measured from the front lot line to the rear lot line.
- **Lot, Flag** - A large lot not meeting minimum frontage requirements and where access to the public road is by a narrow, private right-of-way or driveway.
- **Lot, Nonconforming** - A lot that does not meet the dimensional requirements of the district in which it is located and that existed before these requirements became effective.
- **Lot, Through** (also called a double frontage lot) - A lot that fronts upon two parallel streets or that fronts upon two streets that do not intersect at the boundaries of the lot.
- **Lot Frontage** - That portion of a lot extending along a street right-of-way line.
- **Lot of Record** - A lot or parcel that exists as shown or described on a plat or deed in the records of the Clerk of the County Court.
- **Lot Width** - The horizontal distance between side lot lines measured parallel to the front lot line at the minimum required front setback line.
- **Manual of Uniform Traffic Control Devices (MUTCD)** - A Federal document adopted by the Kentucky Transportation Cabinet that provides standards for traffic control devices.
- **Minor Subdivision** - A subdivision of land into not more than two (2) lots where there are no roadways, drainage, or other required improvements.
- **Nonconforming Access Features** - Features of the access system of a property that existed prior to the date of ordinance adoption and do not conform with the requirements of this code.
- **Nonrestrictive Median** - A median or painted centerline that does not provide a physical barrier between traffic traveling in opposite directions or turning left, including continuous center turn lanes and undivided roads.
- **Outparcel** - A parcel of land abutting and external to the larger, main parcel, which is under separate ownership and has roadway frontage.
- **Parcel** - A division of land comprised of one or more lots in contiguous ownership.
- **Plat** - An exact and detailed map of the subdivision of land.
- **Private Road** - Any road or thoroughfare for vehicular travel which is privately owned and maintained and which provides the principal means of access to abutting properties.
- **Public Road** - A road under the jurisdiction of a public body that provides the principal means of access to an abutting property.
- **Reasonable Access**: The minimum number of access connections, direct or indirect, necessary to provide safe access to and from the thoroughfare, as consistent with the purpose and intent of this code and any applicable plans and policies of the [\(city/county\)](#).
- **Restrictive Median** - A physical barrier in the roadway that separates traffic traveling in opposite directions, such as a concrete barrier or landscaped island.
- **Right-of-Way** - Land reserved, used, or to be used for a highway, street, alley, walkway, drainage facility, or other public purpose.
- **Service Road** - A public or private street or road, auxiliary to and normally located parallel to a controlled access facility, that maintains local road continuity and provides access to parcels adjacent to the controlled access facility.
- **Significant Change in Trip Generation** - A change in the use of the property, including land, structures or facilities, or an expansion of the size of the structures or facilities causing an increase in the trip generation of the property.

- **State Primary Road System)** - The network of limited access and controlled access highways that have been functionally classified and are under the jurisdiction of the Commonwealth of Kentucky.
 - **Stub-out (Stub-street)** - A portion of a street or cross access drive used as an extension to an abutting property that may be developed in the future.
 - **Subdivision** - Is the process and the result of any of the following:
 - a. The platting of land into lots, building sites, blocks, open space, public areas, or any other division of land;
 - b. Establishment or dedication of a road, highway, street or alley through a tract of land, by the owner thereof, regardless of area;
 - c. The re-subdivision of land heretofore subdivided (however, the sale or exchange of small parcels of land to or between adjoining property owners, where such sale or exchange does not create additional lots and does not result in a nonconforming lot, building, structure or landscape area, shall not be considered a subdivision of land);
 - d. The platting of the boundaries of a previously unplatted parcel or parcels.
 - **Substantial Enlargements or Improvements** - A 10% increase in existing square footage or 50% increase in assessed valuation of the structure.
- Commentary: This standard is typical of many standards used to address nonconforming situations. Check these standards related to nonconforming situations against those of your code to assure consistency.*
- **Temporary Access** - Provision of direct access to the controlled access facility until that time when adjacent properties develop, in accordance with a joint access agreement or frontage road plan.

Section 5. Access Management Classification System and Standards

1. Roadways within the (city/county) are classified by the following functional categories:

Access Class 1: Principal (Major) Arterials – High volume roadways that provide priority to mobility over access. They often provide service to traffic entering and exiting the city and between major activity centers within the city.

Access Class 2 Minor Arterials – Moderate volume roadways that provide priority to mobility over access. They often feed the major arterial system, support moderate length trips, and serve activity centers.

Access Class 3 Collectors – Roads with moderate to low volumes that provide a balance between mobility and access. They often link Local Streets with the Arterials.

Access Class 4 Local Streets – Low volume streets that provide immediate access to individual residential, commercial, industrial and institutional properties not classified in Classes 1-3. Access and frontage roads are also considered local streets.

Commentary: Major arterial, minor arterial, and collector streets should be indicated in a thoroughfare plan that maps roadways by their classification. Additional classes may be designated based on various land-use conditions or projected land-use changes.

Table 1: Access Classification of State, County and City Roadways

Jurisdiction	Segment	Access Class
State Roads		
US 325	Wildcat County Line to Cardinal C.L.	1
KY 101	Thoroughbred St. to Hilltopper C.L.	2
KY 101	Eagle Lane to Thoroughbred St.	1
County and City Roads		
Coneflower Pkwy.	Bluestem Dr. to Coreopsis St.	3
Blazing Star Blvd.	Sunflower La. To KY 101	3
Indigo La.	KY 101 to US325	3

2. All connections on facility segments that have been assigned an access classification shall meet or exceed the minimum connection spacing requirements of that access classification as specified in Table 2.

Table 2: Minimum Driveway and Signal Spacing

Access Class	Minimum Adjacent Spacing for <=45mph (ft)	Minimum Adjacent Spacing for >45mph (ft)	Signal Spacing	Median Treatment
1	600	1200	2400	Restrictive
2	450	600	2400	Restrictive preferred
3	300	450	1200	Non-restrictive
4	150	150*	N/A	Non-restrictive

Commentary: *The standards within this table are for demonstration purposes and do not reflect KYTC regulation or policy. The standards are to provide a starting point for local governments to develop acceptable local standards. Standards for state roads must be equal to or greater than the current KYTC standards.*

3. Driveway spacing shall be measured from the closest edge of the pavement to the next closest edge of the pavement (see *Definition section and Figure 1*). The projected future edge of the pavement of the intersecting road shall be used in measuring corner clearance, where widening, relocation, or other improvement is indicated in an adopted transportation plan.

4. The (*local permitting department*) may reduce the connection spacing requirements in situations where they prove impractical, but in no case shall the permitted spacing be less than 85% of the applicable standard, except as provided in Section 24.

5. If the connection spacing of this code cannot be achieved, then a system of joint use driveways and cross access easements may be required in accordance with Section 7.

6. Variation from these standards shall be permitted at the discretion of the Planning Commission where the effect would be to enhance the safety or operation of the roadway.

Examples might include a pair of one-way driveways in lieu of a two-way driveway, or alignment of median openings with existing access connections. Applicants may be required to submit a study prepared by a registered engineer to assist the *(city/county)* in determining whether the proposed change would exceed roadway safety or operational benefits of the prescribed standard.

Commentary: Driveway spacing standards limit the number of driveways on a roadway by mandating a minimum separation distance between driveways. This reduces the potential for collisions as travelers enter or exit the roadway and encourages sharing of access, where appropriate. Driveway spacing at intersections and corners should provide adequate sight distance and response times and permit adequate stacking space. Driveway spacing on non-classified arterials and collectors may be tied to posted speed limit, as shown here, with the minimum distance between driveways greater as speed limits increase. The method used to regulate driveway spacing does, however, vary widely across local governments. Some jurisdictions tie driveway spacing to functional classification rather than speed limit, and others provide variable spacing depending upon the land use intensity of the site served and that of adjacent sites. The standards above fall within the recommended range and are compatible with connection spacing standards in Table 2.

Section 6. Corner Clearance

- 1) Corner clearance for connections shall meet or exceed the minimum connection spacing requirements for that roadway.
- 2) New connections shall not be permitted within the functional area of an intersection or interchange as defined by the connection spacing standards of this code, unless:
 - a) No other reasonable access to the property is available, and
 - b) The *(permitting department)* determines that the connection does not create a safety or operational problem upon review of a site-specific study of the proposed connection prepared by a registered engineer and submitted by the applicant.
- 3) Where no other alternatives exist, the *(permitting department)* may allow construction of an access connection along the property line farthest from the intersection. In such cases, directional connections (i.e. right in/out, right in only, or right out only) may be required.
- 4) In addition to the required minimum lot size, all corner lots shall be of adequate size to provide for required frontyard setbacks and corner clearance on street frontage.

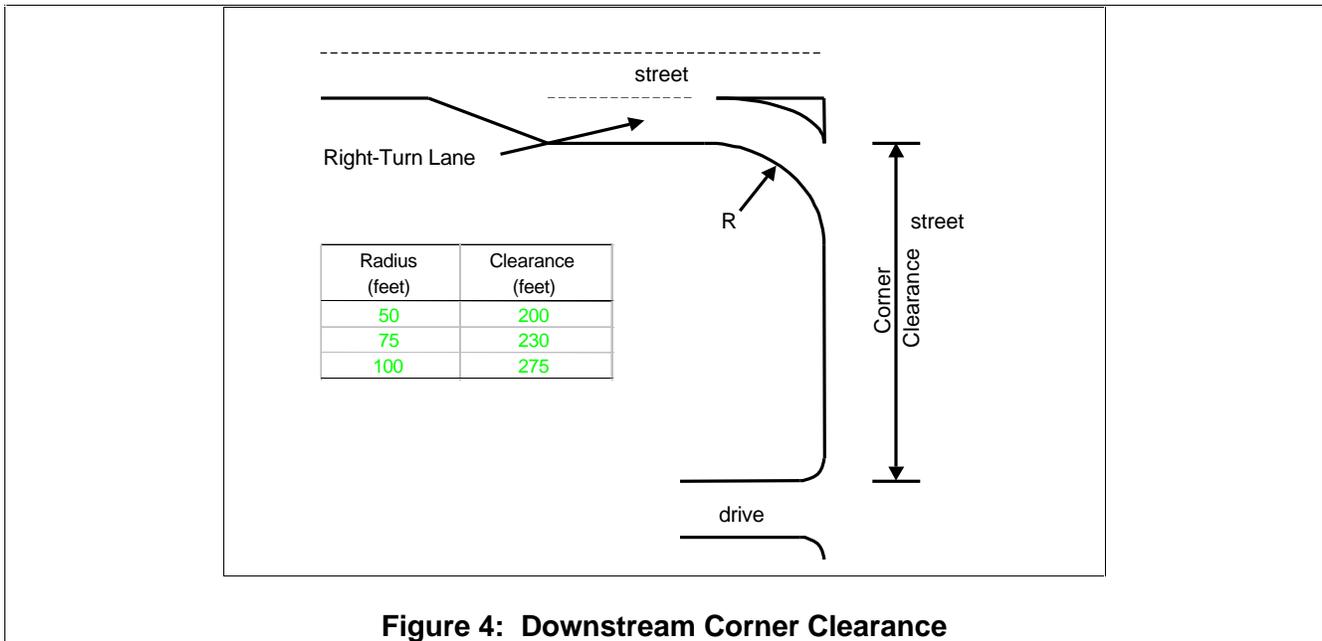


Figure 4: Downstream Corner Clearance

Section 7. Joint and Cross Access

1. Adjacent commercial or office properties classified as major traffic generators (i.e. shopping plazas, office parks), shall provide a cross access drive and pedestrian access to allow circulation between sites.

Commentary: *Adjacent shopping centers or office parks are often not connected by a service drive and sidewalk. As a result, customers who wish to shop in both centers, or visit both sites, must exit the parking lot of one, travel a short distance on a major thoroughfare, and then access the next site. A cross access drive reduces traffic on the major thoroughfare and reduces safety hazards. As a result, this can have positive business benefits by providing easy access to one site from another.*

2. A system of joint use driveways and cross access easements as shown in Figures 4 and 5 shall be established wherever feasible along *(name affected corridors or refer to a list)* and the building site shall incorporate the following:
 - a. A continuous service drive or cross access corridor extending the entire length of each block served to provide for driveway separation consistent with the access management classification system and standards.
 - b. A design speed of 10 mph and sufficient width to accommodate two-way travel aisles designed to accommodate automobiles, service vehicles, and loading vehicles;
 - c. Stub-outs and other design features to make it visually obvious that the abutting properties may be tied in to provide cross-access via a service drive;
 - d. A unified access and circulation system plan that includes coordinated or shared parking areas is encouraged wherever feasible.

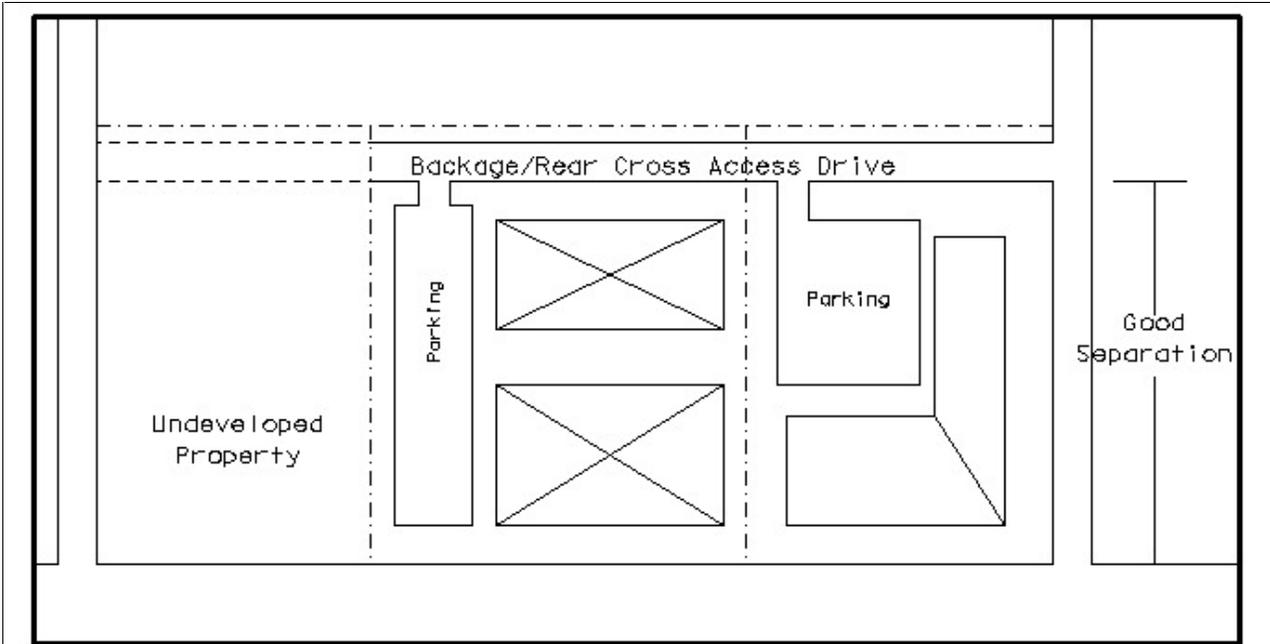


Figure 5: Examples of Cross Access Corridor Design

This illustration shows that sufficient separation is needed between side street access to the property and the major road.

3. Shared parking areas shall be permitted a reduction in required parking spaces if peak demand periods for proposed land uses do not occur at the same time periods.

Commentary: For example, a bank and a movie theater need parking for their patrons at two distinctly different times.

4. Pursuant to this section, property owners shall:
 - a. Record an easement with the deed allowing cross access to and from other properties served by the joint use driveways and cross access or service drive;
 - b. Record an agreement with the deed that remaining access rights along the thoroughfare will be dedicated to the (city/county) and pre-existing driveways will be closed and eliminated after construction of the joint-use driveway;
 - c. Record a joint maintenance agreement with the deed defining maintenance responsibilities of property owners.

Commentary: See Appendix 1 for a sample cross access agreement from the City of Orlando. These agreements must be prepared with the assistance of an attorney. Another option is that used by the City of Orlando, who ties joint access requirements to specific zoning districts.

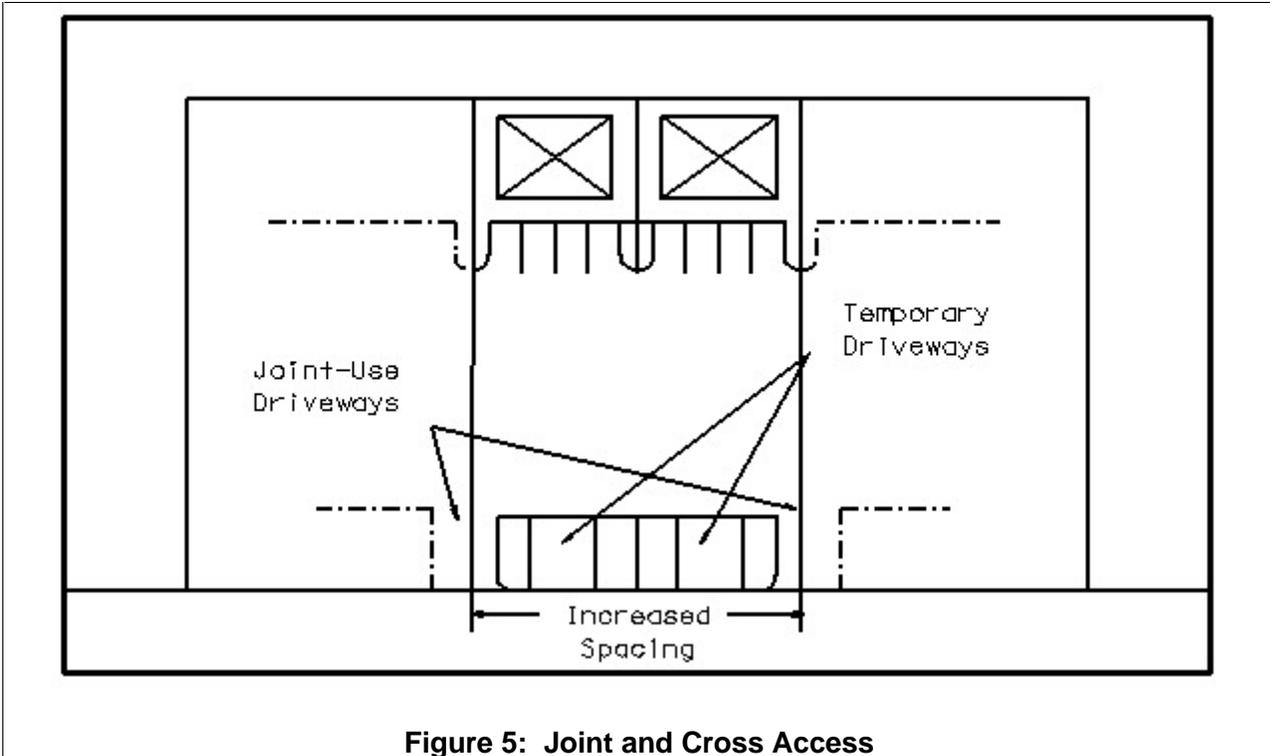


Figure 5: Joint and Cross Access

5. The ([permitting department](#)) may reduce required separation distance of access points where they prove impractical, provided all of the following requirements are met:
 - a. Joint access driveways and cross access easements are provided wherever feasible in accordance with this section.
 - b. The site plan incorporates a unified access and circulation system in accordance with this section.
 - c. The property owner shall enter a written agreement with the ([city/county](#)), recorded with the deed, that pre-existing connections on the site will be closed and eliminated after construction of each side of the joint use driveway.

6. The ([permitting department](#)) may modify or waive the requirements of this section where the characteristics or layout of abutting properties would make development of a unified or shared access and circulation system impractical.

Commentary: *This model provides that where properties are unable to meet driveway spacing requirements, then the planning or public works official may provide for less restrictive spacing, based on the conditions that joint use driveways and cross access easements must be established wherever feasible. A variance is provided only where joint and cross access is not practical. Variances and other remedial actions such as those described above are necessary to prevent unusual hardship on property owners and other situations that could incur a regulatory taking. (Note: Variances and special conditions, like standards for nonconforming features, must be consistently and rigorously applied.) These standards are also applied to phased development in the same ownership and leasing situations. Where abutting properties are in different ownership, cooperation is encouraged but not required. But the building site under consideration is subject to the requirements, which are recorded as a Binding Agreement prior to issuing a building permit. Abutting properties will be brought into compliance as they are developed or initiate retrofitting*

requirements, as provided in Section 13. In the meantime, the property owner will be permitted a temporary curb cut and driveway that will be closed upon development of the joint use driveway.

Section 8. Interchange Areas

1. New interchanges or significant modification of an existing interchange will be subject to special access management requirements to protect the safety and operational efficiency of the limited access facility and the interchange area, pursuant to the preparation and adoption of an access management plan. The plan shall address current and future connections and median openings within 1/4 mile of an interchange area (measured from the end of the taper of the ramp furthest from the interchange) or up to the first intersection with an arterial road, whichever is less.
2. The distance to the first connection shall comply with the minimum driveway spacing standards. However, no connection will be less than 400'. This distance shall be measured from the end of the taper for that quadrant of the interchange.
3. The minimum distance to the first median opening shall be at least 1200 feet as measured from the end of the taper of the egress ramp.

Commentary: New highway interchanges can have substantial impacts on land development patterns around the interchange area. In turn, if land development is not properly planned it can create safety hazards and interfere with the flow of traffic onto and off of the interchange. An access management plan would identify the appropriate access system around the interchange area, in accordance with a desired land development plan. Such a plan would also incorporate minimum spacing requirements for new interchanges required by Kentucky Transportation Cabinet. These standards are provided above for incorporation into the local code.

Section 9. Access Connection and Driveway Design

1. **Driveway grades shall conform to the requirements of FDOT Standard Index, Roadways and Traffic Design Standard Indices, latest edition.**
2. Driveway approaches must be designed and located to provide an exiting vehicle with an unobstructed view.
3. Construction of driveways along acceleration or deceleration lanes and tapers is discouraged due to the potential for vehicular weaving conflicts (see Figure 6).
4. Driveways with more than one entry and one exit lane shall incorporate channelization features to separate the entry and exit sides of the driveway. Double yellow lines may be considered instead of medians where truck off-tracking is a problem.
5. Driveways across from median openings shall be consolidated wherever feasible to coordinate access at the median opening.
6. Driveway width and flair shall be adequate to serve the volume of traffic and provide for rapid movement of vehicles off of the major thoroughfare, but standards shall not be so excessive as to pose safety hazards for pedestrians, bicycles, or other vehicles. *(Suggested standards appear in Table 4).*

Figure 6: Driveway Location

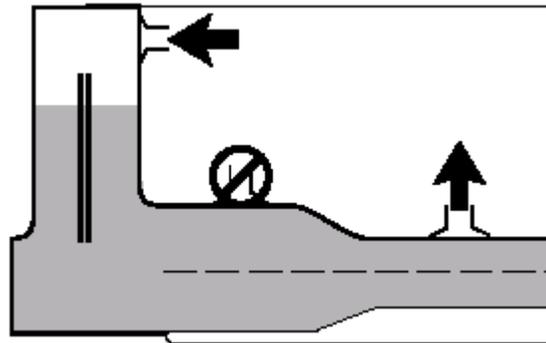


Table 4: Suggested Access Connection Design From

Trips/Day	1-20		21-600		601-4000*	
Trips/Hour	Or 1-5		Or 6-60		Or 61-400	
	Urban	Rural	Urban	Rural	Urban	Rural
Connection Width (2-way)	12' min 24' max	12' min 24' max	24' min 36' max	24' min 36' max	24' min 36' max	24' min 36' max
Flare	10' min	N/A	10' min	N/A	N/A	N/A
Returns (Radius)	N/A	15' min 25' std 50' max	Small radii may Be used	25' min 50' std 75' max	25' min 50' std 75' max	25' min 50' std 75' max
Angle of Drive			60-90	60-90	60-90	60-90
Divisional Island			4-22' wide	4-22' wide	4-22' wide	4-22' wide

*Note: These standards are not intended for major access connections carrying over 4000 vehicles per day.

Commentary: *The Kentucky Transportation Cabinet requires local governments to adhere to certain minimum design standards in the design and location of access connections or other traffic control features. These standards are contained in three separate but related technical documents: the KYTC Permits Manual; the AASHTO Green Book; and the MUTCD (Manual of Uniform Traffic Control Devices).*

1. The length of driveways or "Throat Length" (see Figure 7) shall be designed in accordance with the anticipated storage length for entering and exiting vehicles to prevent vehicles from backing into the flow of traffic on the public street or causing unsafe conflicts with on-site circulation. General standards appear in Table 5 but these requirements will vary according to the projected volume of the individual driveway. These measures generally are acceptable for the principle access to a property and are not intended for minor driveways. Variation from these shall be permitted for good cause upon approval of the *(city/county Traffic Engineer or Public Works Official)*.

Table 4: Generally Adequate Driveway Throat Lengths

Signalized w/2 Egress Lanes	75'
Signalized w/3 Egress Lanes	200'
Signalized w/4 Egress Lanes	300'
Unsignalized Driveways w/2 Egress Lanes	50'-75'

Commentary: The throat lengths in Table 4 are provided to assure adequate stacking space within driveways for general land use intensities. This helps prevent vehicles from stacking into the thoroughfare as they attempt to access the site. High traffic generators, such as large shopping plazas, need much greater throat length than smaller developments or those with unsignalized driveways. The guidelines here for larger developments refer to the primary access drive. Lesser throat lengths may be permitted for secondary access drives serving large developments.

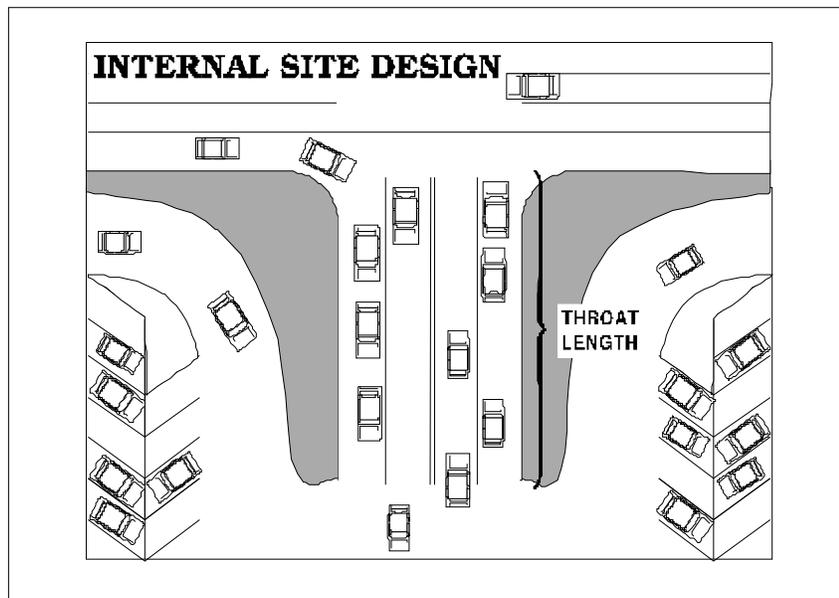


Figure 7: Driveway Throat Length

Section 10. Requirements for Outparcels and Phased Development Plans

1. In the interest of promoting unified access and circulation systems, development sites under the same ownership or consolidated for the purposes of development and comprised of more than one building site shall not be considered separate properties in relation to the access standards of this code. The number of connections permitted shall be the minimum number necessary to provide reasonable access to these properties, not the maximum available for that frontage. All necessary easements, agreements, and stipulations required under Section 7 shall be met. This shall also apply to phased development plans. The owner and all lessees within the affected area are responsible for compliance with the requirements of this code and both shall be cited for any violation.
2. All access to the outparcel must be internalized using the shared circulation system of the principle development or retail center. Access to outparcels shall be designed to avoid excessive movement across parking aisles and queuing across surrounding parking and driving aisles.
3. The number of outparcels shall not exceed one per ten acres of site area, with a minimum lineal frontage of 300 feet per outparcel or greater where access spacing standards for that roadway require. This frontage requirement may be waived where access is internalized using the shared circulation system of the principle development or retail center. In such cases the right of direct access to the roadway shall be dedicated to the [\(city/county\)](#) and recorded with the deed.

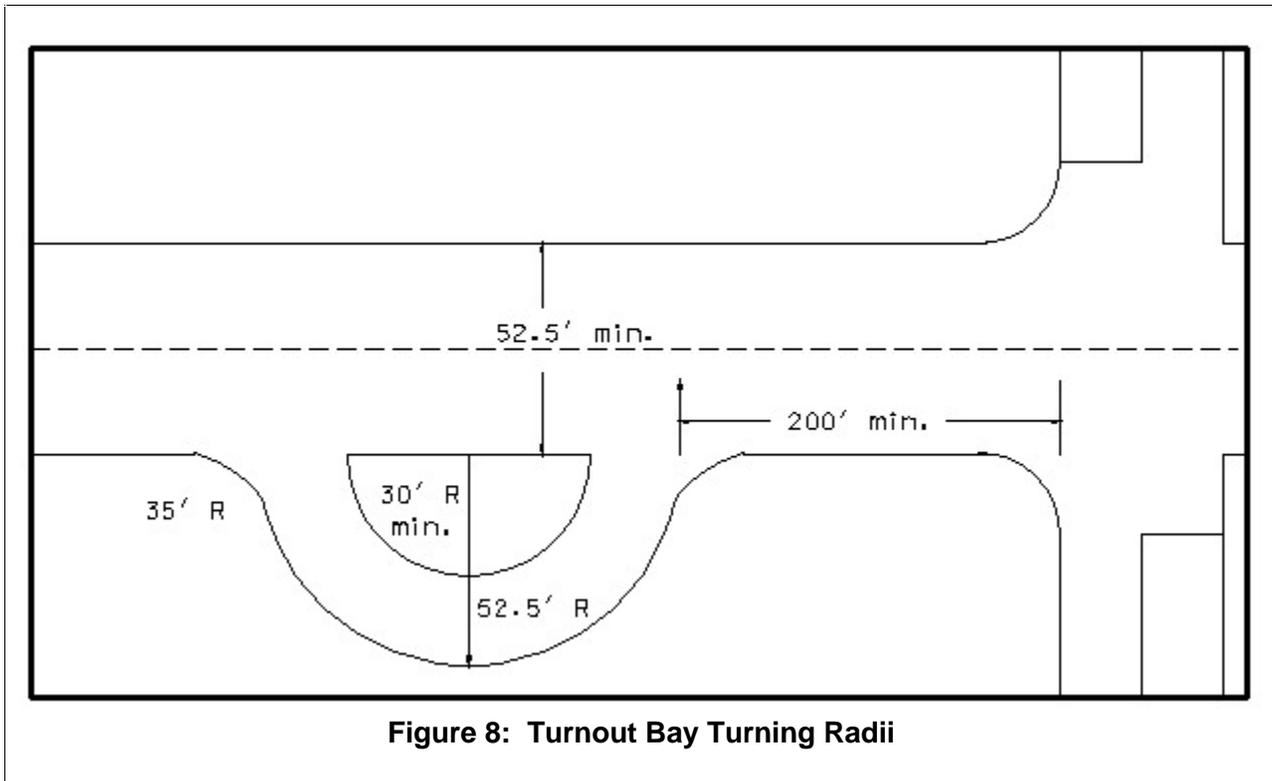
Section 11. Emergency Access

In addition to minimum side, front, and rear yard setback and building spacing requirements specified in this code, all buildings and other development activities such as landscaping, shall be arranged on site so as to provide safe and convenient access for emergency vehicles.

Section 12. Transit Access

In commercial or office zoning districts where transit service is available or is planned to be available within five years, provisions shall be made for adequate transit access, in the form of turn around loops or turnout bays. At a minimum, in the case of a loop or cul-de-sac, entrance curves shall have a radius of 35 feet, and the internal circle shall have an inside radius of 30 feet and an outside radius of 52.5 feet. In the case of turnout bays, the curve radius shall be 35 feet the distance from the roadside edge to the inside edge of the outside radius shall be 52.5 feet (see Figure 8).

Commentary: The bus turnaround standards in Figure 8 are provided for transit access along major commercial and office corridors to assure safe and convenient transit access. Bus turnarounds are useful in circumstances where circulation via the internal street system of a development would be impractical based on cost, design constraints, or the need to maintain timely service. These bus turnarounds are based upon the turning radius of a standard 40 foot bus.



Section 13. Nonconforming Access Features

1. Permitted access connections in place as of *(date of adoption)* that do not conform with the standards herein shall be designated as nonconforming features and shall be brought into compliance with applicable standards under the following conditions:
 - a. When new access connection permits are requested;
 - b. Substantial enlargements or improvements;
 - c. Significant change in trip generation; or
 - d. As roadway improvements allow.

Commentary: *Nonconforming access features may continue in the same manner after adoption of land development regulations--a process known as "grandfathering." This protects the substantial investment of property owners and recognizes the expense of bringing those properties into conformance. Yet the negative impacts of nonconforming properties may be substantial, depending upon the degree of nonconformity. Nonconforming properties may pose safety hazards, increase traffic congestion, reduce property values, degrade the environment, and undermine community character. To address the public interest in these matters, land development regulations include conditions or circumstances where nonconforming features must be brought into conformance. Opportunities to bring nonconforming features into compliance typically occur after a change of ownership when the costs of required improvements may be amortized in the business loan or mortgage, thereby minimizing financial hardship. It is essential that these standards be consistently and rigorously applied and enforced and that data and other information supporting these decisions be well documented, or the community could be open to legal challenges regarding due process considerations.*

2. If the principal activity on a property with nonconforming access features is discontinued for a consecutive period of (180 or 365) days or discontinued for any period of time without a present intention of resuming that activity, then that property must thereafter be brought into conformity with all applicable connection spacing and design requirements, unless otherwise exempted by the permitting authority. For uses that are vacant or discontinued upon the effective date of this code, the (180 or 365) day period begins on the effective date of this code.

Section 14. Corridor Access Management Overlay

1. The minimum lot frontage for all parcels with frontage on (name affected segments of thoroughfares here or refer to a list) shall not be less than the minimum connection spacing standards of that thoroughfare, except as otherwise provided in this Section. Flag lots shall not be permitted direct access to the thoroughfare and interior parcels shall be required to obtain access via a public or private access road in accordance with the requirements of this Code.

Commentary: Overlay zones are an effective method for managing access along commercial corridors. The technique is used to add a special set of requirements to those of an existing zoning district or districts. Section 14(1) is for those major thoroughfares or portions of major thoroughfares under state or local jurisdiction that are not already extensively subdivided and are not planned for commercial or intensive development in the near future. This approach requires that any lot fronting designated thoroughfares (usually those with an assigned access classification) have a minimum lot frontage that meets or exceeds the minimum connection spacing standard for those thoroughfares. Existing lots with less frontage would continue as nonconforming lots. Section 14(1) standards impose large minimum lot frontage requirements to coordinate with desired connection spacing. Such requirements could disperse development and should not be applied in areas intended for intensive development. They are designed for rural and semi-rural stretches of the state (or county) highway system.

2. The following requirements shall apply to segments of designated thoroughfares that are planned for commercial or intensive development. All land in a parcel having a single tax code number, as of (date of adoption), fronting on (define segment of affected thoroughfare or refer to a Table defining affected segments), shall be entitled one (1) driveway/connection per parcel as of right on said public thoroughfare(s). When subsequently subdivided, either as metes and bounds parcels or as a recorded plat, parcels designated herein shall provide access to all newly created lots via the permitted access connection. This may be achieved through subdivision roads, joint and cross access, service drives, and other reasonable means of ingress and egress in accordance with the requirements of this Code. The following standards shall also apply:
 - a. Parcels with large frontages may be permitted additional driveways at the time of adoption of these requirements provided they are consistent with the applicable driveway spacing standards.
 - b. Existing parcels with frontage less than the minimum connection spacing for that corridor may not be permitted a direct connection to the thoroughfare under this Section where the Planning Commission determines alternative reasonable access is available to the site.
[Note: The Planning Commission could allow for a temporary driveway as provided in Section 7 with the stipulation that joint and cross access be established as adjacent properties develop.]
 - c. Additional access connections may be allowed where the property owner demonstrates that safety and efficiency of travel on the thoroughfare will be improved by providing more than one access to the site.

- d. No parking or structure other than signs shall be permitted within (10- 50) feet of the roadway right-of-way. The (10-50) foot buffer shall be landscaped with plants suitable to the soil and in a manner that provides adequate sight visibility for vehicles exiting the site. Property owners shall be permitted to landscape the right-of-way, pursuant to an approved landscaping plan.
- e. Permitted connections shall be identified on a map that shall be adopted by reference and that portion of a corridor affected by these overlay requirements shall be delineated on the (city/county) zoning map with hatch marks.

Commentary: *The regulations in Section 14(2) are intended for corridors that are planned for commercial or intensive development and have not already been extensively subdivided into small lot frontages. Such corridors may or may not be currently zoned for commercial or mixed use development, but may already be experiencing development pressure. This approach focuses, rather than disperses, development along corridors while maintaining regional mobility through access management. The Section 14(2) overlay "freezes" allowable access to one connection by right per existing lot or parcel at the time of adoption. Lots or parcels may be extensively subdivided, but all future lots must obtain access via the access connections permitted at the time of overlay adoption. This overlay approach allows for continued subdivision and development of land while stimulating joint access, local roads, and other alternatives to direct thoroughfare access in the site design process (see Figure 9). These permitted connections must be designated on a map and adopted with the overlay requirements. For flexibility, additional driveways may be permitted for large parcels that meet or exceed the minimum access spacing standards for that thoroughfare, or where safety would be increased. Parcels with small frontages at the time of adoption are not permitted a driveway on the thoroughfare where this would create a safety hazard or where alternative reasonable access is available. In such cases a temporary driveway could be permitted under joint access requirements.*

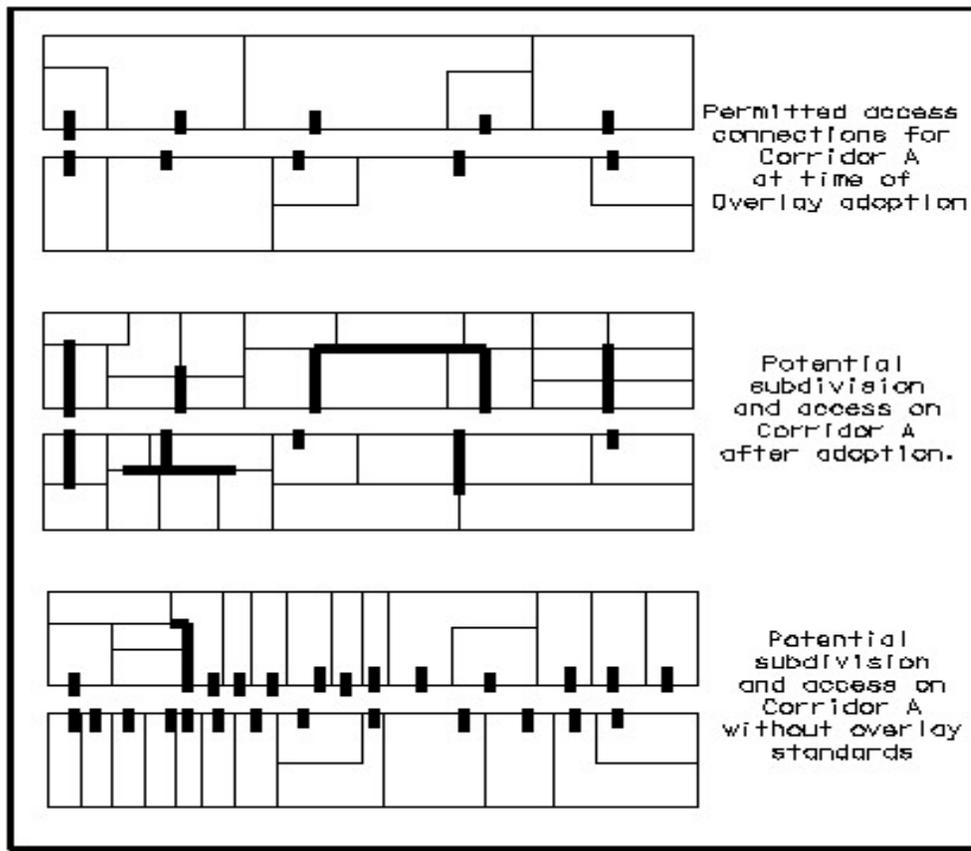


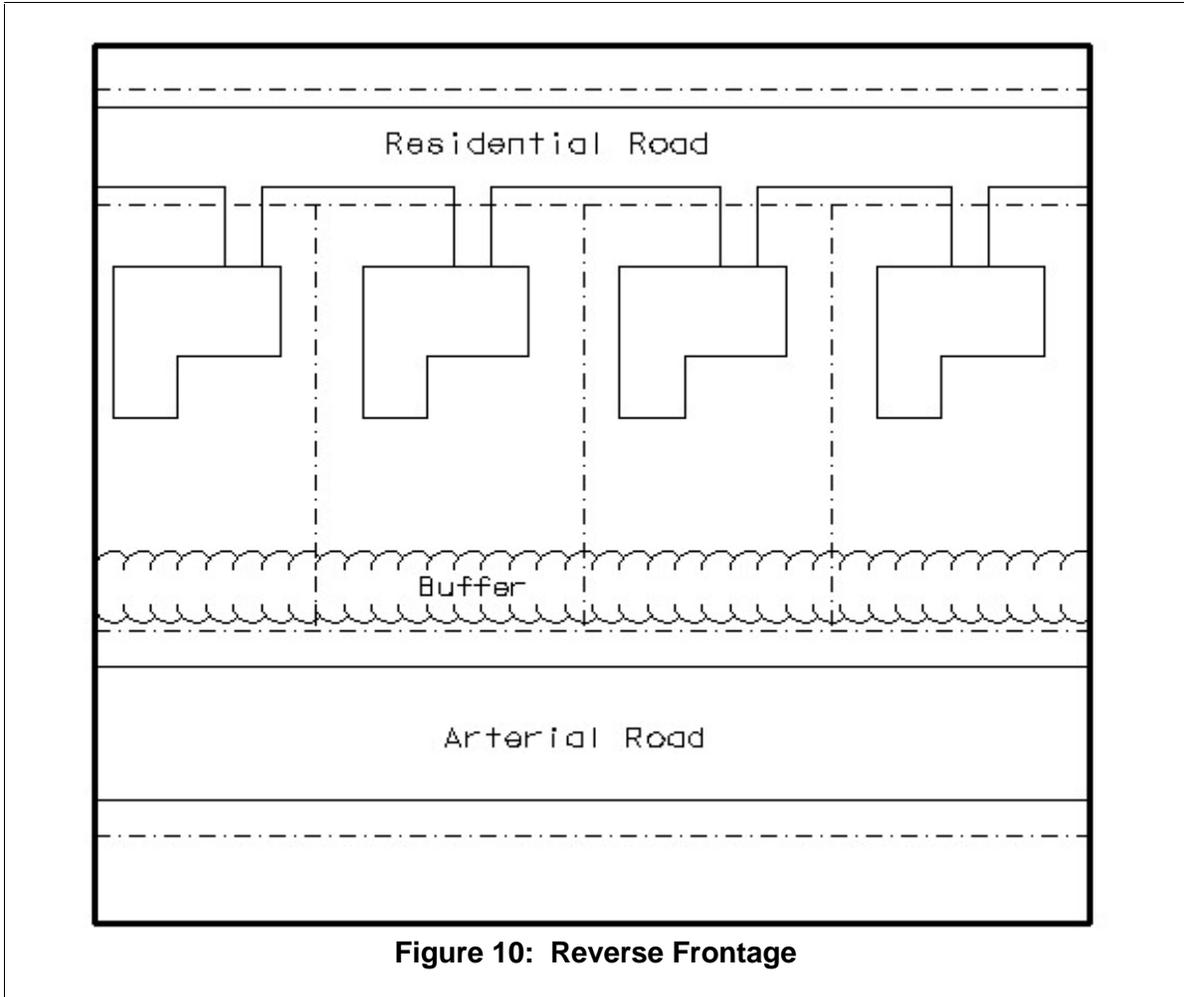
Figure 9: Corridor Access Management Overlay

Commentary: Local governments are also encouraged to apply design guidelines that enhance community character, including standards for pedestrian access and landscaping. Section 14(2)(d) above is one potential standard for improving the visual quality of commercial corridors through landscaping and setbacks. The setback between the right-of-way and the parking area or structure should at a minimum be 10 feet. Some communities require as much as 50 feet. The appropriate standard will vary according to local preferences and existing right-of-way. If the existing right-of-way is very small, for example, then the buffer should be increased and vice versa. Some communities are also promoting side and rear parking, or shared parking areas, to reduce the appearance of asphalt from the street and provide for a more pleasing site design.

Section 15. Reverse Frontage

1. Access to double frontage lots shall be required on the street with the lower functional classification.
2. When a residential subdivision is proposed that would abut an arterial, it shall be designed to provide through lots along the arterial with access from a frontage road or interior local road (see Figure 10). Access rights of these lots to the arterial shall be dedicated to the *(city/county)* and recorded with the deed. A berm or buffer yard may be required at the rear of through lots to

buffer residences from traffic on the arterial. The berm or buffer yard shall not be located within the public right-of-way.



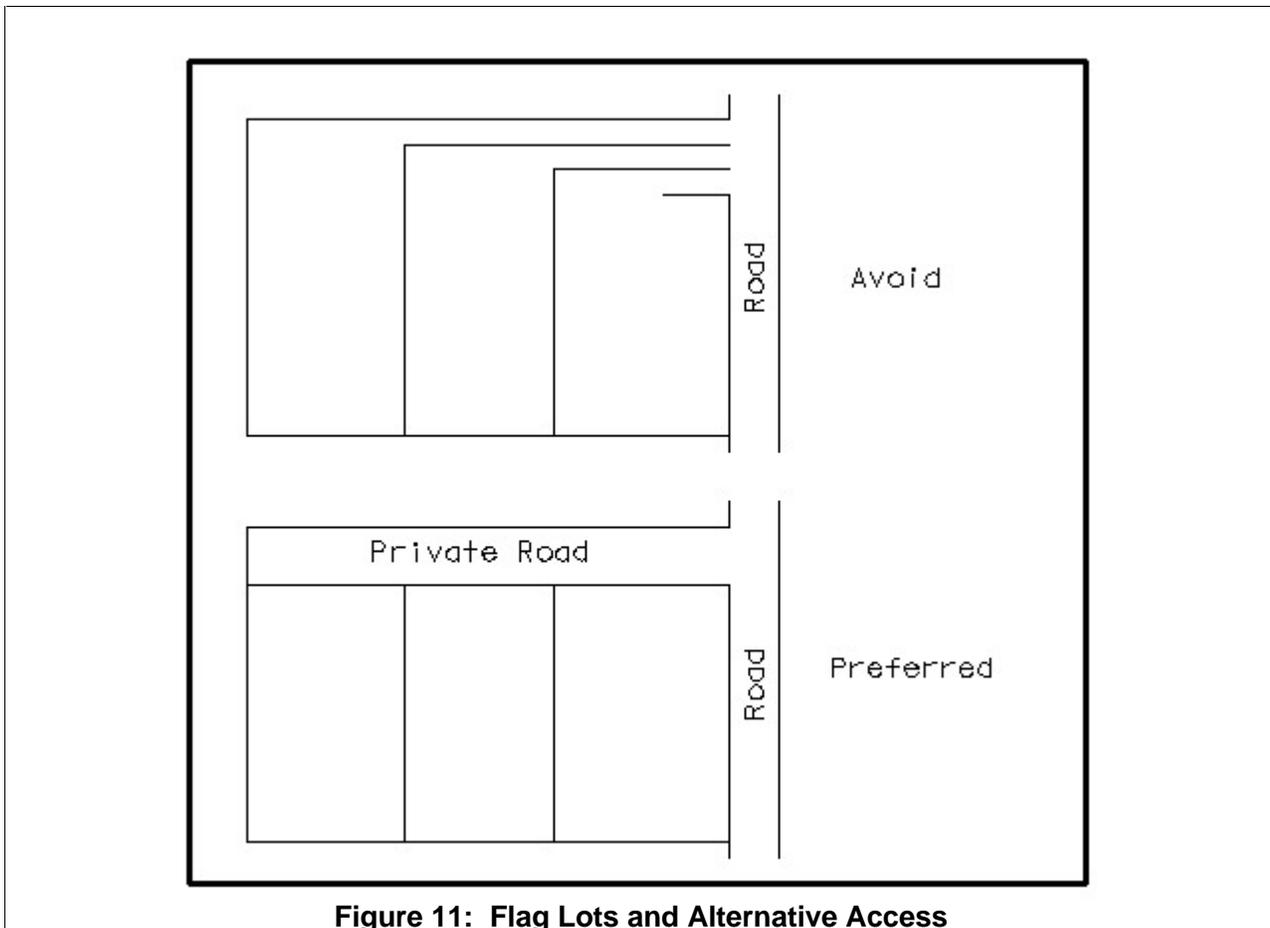
Commentary: If your community lacks any standards governing reverse frontage, it is essential that such standards be adopted. These standards are currently applied by many communities and are highly effective in preventing safety hazards caused by direct residential access to high-speed roadways.

Section 16. Flag Lot Standards

1. Flag lots shall not be permitted when their effect would be to increase the number of properties requiring direct and individual access connections to the State Primary Road System or other major thoroughfares.
2. Flag lots may be permitted for residential development, when deemed necessary to achieve planning objectives, such as reducing direct access to thoroughfares, providing internal platted

lots with access to a residential street, or preserving natural or historic resources, under the following conditions:

- a. Flag lot driveways shall be separated by at least twice the minimum frontage requirement of that zoning district.
- b. The flag driveway shall have a minimum width of 20 feet and maximum width of 50 feet
- c. In no instance shall flag lots constitute more than 10% of the total number of building sites in a recorded or unrecorded plat, or three lots or more, whichever is greater.
- d. The lot area occupied by the flag driveway shall not be counted as part of the required minimum lot area of that zoning district.
- e. No more than one flag lot shall be permitted per private right-of-way or access easement.



Commentary: Local plat maps often reveal lots shaped like flags with long narrow access "poles". Flag lots are especially prevalent along lakes, rivers, cul-de-sacs, and rural highways. Although they can be useful where natural features or land division patterns create access problems, they are subject to abuses. Flag lots proliferate in some areas where property owners use the technique to avoid plat review and further subdivide land. The result is a subdivision that lacks adequate access and creates long term problems for the community and

those who purchase the lots. Where the narrow frontages abut a thoroughfare, they afford inadequate spacing between driveways and increase safety hazards from vehicles turning on and off the high speed roadway. Because flag lots often violate driveway spacing standards on the State Primary Road System, they also create problems for the buyer who later attempts to build on the property and obtain a driveway permit. Under these standards existing flag lots would be nonconforming and allowed to continue. In areas where flag lots proliferate on a state or county thoroughfare, property owners should be contacted and strongly encouraged to consolidate access with adjacent properties--especially in the case of abutting flag lots.

Section 17. Lot Width-to-Depth Ratios

1. To provide for proper site design and prevent the creation of irregularly shaped parcels, the depth of any lot or parcel shall not exceed 3 times its width (*or 4 times its width in rural areas*).

Commentary: Minimum lot frontage and maximum lot width-to-depth ratios prevent the creation of long and narrow or irregularly shaped lots that can lead to access and circulation problems. This standard is especially useful in rural areas, to govern the dimensions of newly created lots and parcels. Note: Rural areas may adopt a maximum width-to-depth ratio of 1:4, meaning that parcels with 100 feet of frontage may not be deeper than 400 feet. Urban or suburban areas may use maximum ratios of 1:2.5 or 1:3. Width-to-depth ratios that are somewhat deeper may be permitted along arterials to provide for berms or buffer yards in reverse frontage situations.

Section 18. Shared Access

1. Subdivisions with frontage on the State Primary Road System shall be designed into shared access points to and from the highway. Normally a maximum of two accesses shall be allowed regardless of the number of lots or businesses served (see Figure 12).
2. Subdivisions on a single residential access street ending in a cul-de-sac shall not exceed 25 lots or dwelling units, and the cul-de-sac shall have a minimum cartway radius of 30 feet.

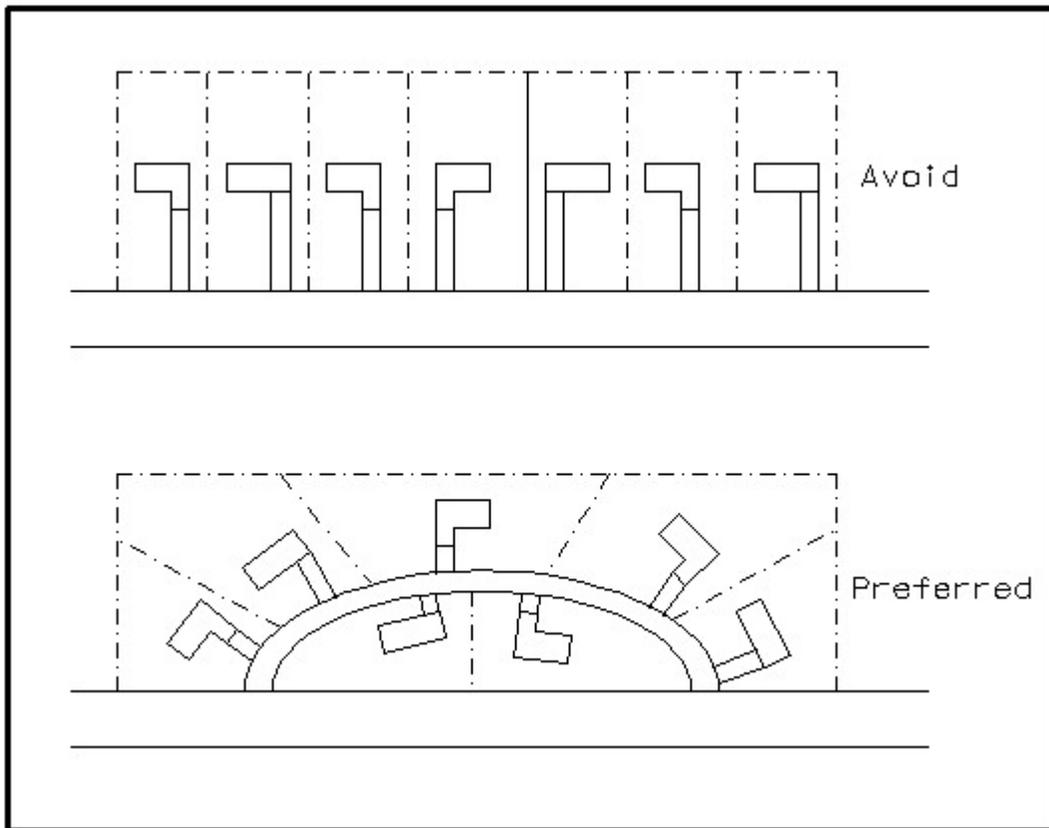


Figure 12: Shared Access on Major Thoroughfares

Commentary: Subdivisions served by a single access street ending in a cul-de-sac may inhibit emergency access and increase traffic congestion during peak hours by providing only one point of ingress and egress. Single access problems may also result in phased subdivisions where additional access is proposed for future phases. If future phases are not built, the remaining subdivision may have insufficient access. Although this is not a problem where only a few dwelling units are served, how many lots is too many? Average daily trips for residential streets provide a baseline for access and cul-de-sac standards. Listokin and Walker (1989) recommend that when a subdivision on a single access residential access street exceeds 25 lots (or 25 dwelling units), it should have at least two access points. A minimum turning radius that accommodates emergency vehicles should be required for cul-de-sacs.

The above provisions for shared access are intended to prevent a proliferation of driveways on the State Primary Road System--a common problem in some semi-rural and rural areas. Provisions for shared access also promote land development patterns that are more compatible with the rural character of the landscape.

Section 19. Connectivity

1. The street system of a proposed subdivision shall be designed to coordinate with existing, proposed, and planned streets outside of the subdivision as provided in this Section.
2. Wherever a proposed development abuts unplatted land or a future development phase of the same development, street stubs shall be provided as deemed necessary by the *(city/county)* to provide access to abutting properties or to logically extend the street system into the surrounding area. All street stubs shall be provided with temporary turn-around or cul-de-sacs unless specifically exempted by the **Public Works Director**, and the restoration and extension of the street shall be the responsibility of any future developer of the abutting land.
3. Collector streets shall intersect with collector or arterial streets at safe and convenient locations.
4. Subcollector and local residential access streets shall connect with surrounding streets to permit the convenient movement of traffic between residential neighborhoods or facilitate emergency access and evacuation, but such connections shall not be permitted where the effect would be to encourage the use of such streets by substantial through traffic.
5. Pedestrian connections should be provided between adjacent properties in addition to roadway connections. These pedestrian connections should provide for safe pedestrian travel along roadways and across parking areas to the buildings.

Commentary: Local governments must maintain a tenuous balance between enhancing accessibility and limiting excessive through traffic in residential areas. These standards strive to address both considerations. Properly used traffic calming measures are another means of minimizing through-traffic in residential areas.

Section 20. Minor Subdivisions

1. The *(approving Department)* may approve a Minor Subdivision that conforms to the following standards:
 - a. Each proposed lot must be buildable in conformance with the requirements of this Code and all other applicable regulations.
 - b. Each lot shall abut a public or private street for the required minimum lot frontage for the zoning district where the lots are located.
 - c. If any lot abuts a street right-of-way that does not conform to the design specifications of this Code, the owner may be required to dedicate one-half the right-of-way width necessary to meet minimum design requirements.
2. Further subdivision of the property shall be prohibited unless applicants submit a plat or development plan in accordance with requirements for major subdivisions in this Code.

Commentary: This standard prohibits property owners from incrementally subdividing land to avoid review.

3. The (*approving Department*) shall consider a proposed Minor Subdivision upon the submittal of the following materials:
 - a. An application form provided by the (*city/county*);
 - b. _____ () copies of the proposed Minor Subdivision plat; *[Note: The number of copies required should be based on number of entities that will review the plan under adopted procedures.]*
 - c. A statement indicating whether water and/or sanitary sewer service is available to the property; and
 - d. Land descriptions and acreage or square footage of the original and proposed lots and a scaled drawing showing the intended divisions shall be prepared by a professional land surveyor registered in the Commonwealth of Kentucky. In the event a lot contains any principal or accessory structures, a survey showing the structures on the lot shall accompany the application.

4. Review Procedure
 - a. The (*approving official*) shall transmit a copy of the proposed Minor Subdivision to the appropriate (*departments or officials*) for review and comment.
 - b. If the proposed Minor Subdivision meets the conditions of this section and otherwise complies with all applicable laws and ordinances, the (*approving official*) shall approve the Minor Subdivision by signing the application form.
 - c. Upon approval of the Minor Subdivision, the (*approving official*) shall record the plat on the appropriate maps and documents, and shall, at the applicant's expense, record the plat in the official county records.

Commentary: These requirements for minor subdivisions are provided here to emphasize the importance of adequate land division controls in access management. They provide for local review of divisions of land or "lot splits" that would otherwise be exempted from subdivision review and platting requirements. A review process for lot splits prevents creation of lots that are not in conformance with land development regulations and thus could be rendered unbuildable. It further prevents creation of lots with inadequate or inappropriate access to a public road. This allows local governments to prevent access problems attributable to flag lots, through lots, and corner lots. This review process is streamlined and platting requirements are less costly than those of a major subdivision, so as not to create a hardship for property owners engaged in only minor subdivision activity. Local governments are strongly advised not to provide exemptions from public review of land division activity based on lot size or number of lots, because this creates long term problems that can seriously undermine the local planning and regulatory program.

Section 21. Private Roads

1. Private roads may be permitted in accordance with the requirements of this Section and the following general standards shall apply:
 - a. All (*city/county*) roads shall be constructed to public specifications and have an easement of a minimum of sixty-six feet in width, except as otherwise provided in Section 21 (2).
 - b. Private roads that by their existence invite the public in shall have all traffic control features, such as striping or markers, in conformance with the Manual of Uniform Traffic Control Devices.
 - c. The minimum distance between private road outlets on a single side of a public road shall be 600 feet, or less where provided by access classification and standards for state roads and local thoroughfares.
 - d. All properties served by the private road shall provide adequate access for emergency vehicles and shall conform to the approved local street numbering system.
 - e. All private roads shall be designated as such and will be required to have adequate signage indicating the road is a private road and not publicly maintained.
 - f. All private roads shall have a posted speed limit not to exceed twenty miles an hour.
 - g. All private roads shall have adequate provisions for drainage and stormwater runoff as provided in Section (*refer to appropriate section of the local subdivision regulations*).
 - h. A second access connection to a public road shall be required for private roads greater than 2000 feet in length.
2. Private roads in rural and semi-rural areas may be permitted reductions in easement and roadway width and pavement standards to provide for adequate access while retaining the rural character of the landscape and design flexibility. At a minimum, the private road shall meet the (*city/county*) specifications for gravel roadway construction. Other standards shall apply in accordance with the following schedule:
 - a. A private road serving up to two lots shall have a minimum right-of-way easement of 30 feet and a roadbed of at least 12 feet.
 - b. A private road intended to serve no more than three to six lots shall have a minimum right-of-way easement of 30 feet and a roadbed of at least 16 feet.
 - c. A private road intended to serve no more than seven to twelve lots shall have a minimum right-of-way easement of 66 feet and a roadbed of at least 20 feet. Paving shall be required for all areas with grades of greater than three (3%) percent. Such pavement shall be a minimum of 18 feet in width.
 - d. A private road intended to serve no more than 13 to 24 lots shall have a minimum right-of-way easement of 66 feet, a roadbed of at least 20 feet and shall be paved.

- e. A private road intended to serve 25 or more lots or parcels shall provide at least two access connections to a public road and shall meet the minimum design requirements for public roads.

Commentary: This section provides a sliding scale approach, allowing gravel roads of about 12 feet to 18 feet wide for 2-4 parcels and requiring higher design specifications for larger developments. The standards are intended to provide flexibility and to preserve the character of rural areas. Communities considering a sliding scale approach to private roads should also adopt a site plan review process aimed at encouraging creative site design and landscape preservation.

3. Applications for subdivision approval that contain private roads shall include a drainage plan and road construction plan, prepared by a registered engineer. The (city/county) Public Works Official shall review private road plans for conformance with this Code.
4. Construction permits are required for connection to public roads. Application for road construction shall be made concurrent with the creation of a lot that does not have frontage on a public road. A road construction permit shall be issued after approval of the private road plan and the entire length of the road shall be inspected during construction and upon completion. If found in conformance, a final use permit shall be issued.
5. No building permit shall be issued for any lot served by a private road until the private road has been constructed and approved, so that all lots to be served by the private road have access to a public road.
6. A road maintenance agreement, prepared by the (city/county) attorney shall be recorded with the deed of each property to be served by a common private road. The agreement shall provide for:
 - a. A method to initiate and finance a private road and maintain that road in good condition;
 - b. A method of apportioning maintenance costs to current and future users;
 - c. A provision that the (city/county) may inspect, and if necessary, require that repairs be made to the private road to ensure that safe access is maintained for emergency vehicles. If required repairs are not made within six months of date of notice, the (city/county) may make the necessary repairs and assess owners of parcels on the road for the cost of all improvements plus an administrative fee, not to exceed 25% of total costs;
 - d. A provision that the majority vote of all property owners on the road shall determine how the road is maintained except in the case of emergency repairs as outlined above;
 - e. A statement that no public funds shall be used to construct repair or maintain the road;
 - f. A provision requiring mandatory upgrading of the roadway if additional parcels are added to reach the specified thresholds; and
 - g. A provision that property owners along that road are prohibited from restricting or in any manner interfering with normal ingress and egress by any other owners or persons needing to access properties with frontage on that road.

7. No private road shall be incorporated into the public road system unless it is built to public road specifications of the (city/county). The property owners shall be responsible for bringing the road into conformance.
8. All private roads shall have a sign and name meeting (city/county) standards and shall include the following notice: "Private Road" "Not maintained by the (city/county)".
9. An application fee will be established by the Director of Public Works to cover administrative, processing, and inspection costs.
10. All purchasers of property served by a private road shall, prior to final sale, be notified that the property receives access from a private road that shall be maintained collectively by all property owners along that road; that the (city/county) shall not be held responsible for maintaining or improving the private road; and that a right-of way easement to provide the only access to that property has been recorded in the deed for that property.
11. The United States postal service and the local school (board/district) is not required to use the private road for access to the parcels abutting the private road and may require that service be provided only at the closest public access point.

Commentary: These private road standards were adapted from sample regulations prepared for the Grand Traverse Bay Region (Planning & Zoning Center, Inc., Lansing, Michigan, September 1992). Some communities prohibit private roads altogether or require all private roads serving more than one dwelling unit to be built to public specifications and paved. This is because of problems associated with private roads, such as pressure to adopt the private road into the public road system in the future. Yet if properly regulated, private roads can offer an effective means of access to small subdivisions in rural areas. In the absence of private road regulations, common practice is the creation of multiple lots served by a common lot, easement, or multiple easements as in the example of stacked flag lots. The easement then becomes a private unpaved road serving several properties.

Unregulated private roads raise several problems. They may be inaccessible to emergency vehicles or large delivery trucks, placing public safety and private property at risk. Substandard roads deteriorate quickly and without a maintenance agreement, the local government may be called upon to maintain it. Buyers may not be aware of the maintenance issues associated with the road until after purchasing the property. Narrow rights-of-way may impede placement of utilities, and private roads can exacerbate inefficient land development patterns. These problems can be avoided through private road regulations that address design, construction, joint maintenance agreements, signage, and review. Private roads should be permitted for residential uses only and standards should be tied to lot split (minor replat) or subdivision regulations. Limitations should be placed upon the number of residences that may be served by a single access to a public road.

As in other land development regulations, private road provisions must be made for grandfathering existing nonconforming situations. Some ordinances address the situation by providing a different set of standards for nonconforming private access or by providing for expansion of existing substandard private roads or easements pursuant to the special use permit process.

Section 22. Regulatory Flexibility

1. The Planning Commission may permit departure from dimensional lot, yard, and bulk requirements of the zoning district where a subdivision or other development plan is proposed to

encourage creativity in site design, protect natural resources, and advance the access objectives of this Code. Such regulatory modifications under this section are not subject to variance approval by the Board of Adjustment.

Section 23. Site Plan Review Procedures

1. Applicants shall submit a preliminary site plan for review *by (name of department responsible for conducting review)*. At a minimum, the site plan shall show:
 - a. Location of access point(s) on both sides of the road where applicable;
 - b. Distances to neighboring constructed access points, median openings, traffic signals, intersections, and other transportation features on both sides of the property;
 - c. Number and direction of lanes to be constructed on the driveway plus striping plans;
 - d. All planned transportation features (such as auxiliary lanes, signals, etc.);
 - e. Trip generation data or appropriate traffic studies;
 - f. Parking and internal circulation plans;
 - g. Plat map showing property lines, right-of-way, and ownership of abutting properties; and
 - h. A detailed description of any requested variance and the reason the variance is requested.
2. Subdivision and site plan review shall address the following access considerations:
 - a. Is the road system designed to meet the projected traffic demand and does the road network consist of hierarchy of roads designed according to function?
 - b. Does the road network follow the natural topography and preserve natural features of the site as much as possible? Have alignments been planned so grading requirements are minimized?
 - c. Is access properly placed in relation to sight distance, driveway spacing, and other related considerations, including opportunities for joint and cross access? Are entry roads clearly visible from the major arterials?
 - d. Do units front on residential access streets rather than major roadways?
 - e. Is automobile movement within the site provided without having to use the peripheral road network?
 - f. Does the road system provide adequate access to buildings for residents, visitors, deliveries, emergency vehicles, and garbage collection?
 - g. Have the edges of the roadways been landscaped? If sidewalks are provided alongside the road, have they been set back sufficiently from the road, and has a landscaped planting strip between the road and the sidewalk been provided?

- h. Does the pedestrian path system link buildings with parking areas, entrances to the development, open space, and recreational and other community facilities?

Commentary: The subdivision and site plan review process provides local governments with the most effective opportunity for addressing access considerations and preventing access problems before they occur. This should be done as early as possible in the process. Developers will be far less amenable to revising the access plan later in the process or after the site plan or plat has been approved.

3. The *(city/county)* reserves the right to require traffic and safety analysis where safety is an issue or where significant problems already exist.
4. After 30 days from filing the application, applicants must be notified by the *(permitting department)* if any additional information is needed to complete the application.
5. Upon review of the access application, the *(permitting department)* may approve the access application, approve with conditions, or deny the application. This must be done within 90 days of receiving the complete application.
6. Any application that involves access to the State Primary Road System shall be reviewed by the Kentucky Transportation Cabinet for conformance with state access management standards. Where the applicant requires access to the State Primary Road System, and a zoning change, or subdivision or site plan review is also required, development review shall be coordinated with the Kentucky Transportation Cabinet, as follows:
 - a. An access management/site plan review committee, that includes representatives of local KYTC District Office and the local government, shall simultaneously review the application. The committee shall inform the developer what information will be required for access review. Information required of the applicant may vary depending upon the size and timing of the development, but shall at a minimum meet the requirements of this section.
 - b. Upon review of the application, the access management review committee shall advise the *(local permitting department)* whether to approve the access application, approve with conditions, or deny the application.
7. If the application is approved with conditions, the applicant shall resubmit the plan with the conditional changes made. The plan, with submitted changes, will be reviewed within 10 working days and approved or rejected. Second applications may only be rejected if conditional changes are not made.
8. If the access permit is denied, the *(city/county)* shall provide an itemized letter detailing why the application has been rejected.
9. All applicants whose application is approved, or approved with conditions, have thirty days to accept the permit. Applicants whose permits are rejected or approved with conditions have 60 days to appeal.

Commentary: Effective coordination with the Kentucky Transportation Cabinet, the local traffic engineer, transportation planner, and/or public works official is essential to ensure conformance with land division and access requirements. One method of improving coordination is to establish the building permit as the lead permit during development review. In this way, property owners

would be required to submit the necessary permits or certificates of approval from regulatory agencies involved in development review before issuing a building permit. This should include a notice of intent to approve the proposed access connection from Kentucky Transportation Cabinet where the State Primary Road System is involved to assure conformance with the State Primary Road System access management policies and regulations. The above review process would be incorporated into the community's overall subdivision and site plan review process. A conceptual review, before submission of the preliminary site plan or plat, is highly recommended. Communities should also set fees and develop the necessary forms to carry out the provisions of this code.

Section 24. Variance Standards

1. The granting of the variation shall be in harmony with the purpose and intent of these regulations and shall not be considered until every feasible option for meeting access standards is explored.
2. Applicants for a variance from these standards must provide proof of unique or special conditions that make strict application of the provisions impractical. This shall include proof that:
 - a. indirect or restricted access cannot be obtained;
 - b. no engineering or construction solutions can be applied to mitigate the condition; and
 - c. no alternative access is available from a street with a lower functional classification than the primary roadway.
3. Under no circumstances shall a variance be granted, unless not granting the variance would deny all reasonable access, endanger public health, welfare or safety, or cause an exceptional and undue hardship on the applicant. No variance shall be granted where such hardship is self-created.

Commentary: Each local government has its own process for handling appeals and variances. The standards above should be incorporated to this process. Providing for variances and other remedial measures is crucial to avoiding a takings claim by providing due process to the property owner and avoiding unreasonable hardship that may arise in relation to the regulatory framework. Federal case law has established that property owners should first exhaust available administrative remedies, including appeals to the local board of adjustment, before the case may be heard in a court of law. If local appeal procedures exist and the property owner sues before first pursuing a variance or other remedial action, the case may be invalidated on this basis.