MODEL ZONING PROVISIONS - TRANSIT-ORIENTED DEVELOPMENT

Transit-Oriented Development (TOD) is characterized by compact, mixed-use development centered on transit stations. Concentrating complementary residential, commercial, and office uses around transit stations in a pedestrian-friendly environment creates an efficient land use setting in support of transit usage and provides convenience, mobility, and economy for residents, employees, and visitors. The model zoning provisions for TOD, following, explicitly support the following characteristics that are typically associated with TODs:

- A mix of land uses including residential, retail, office, and civic space;
- A strong network of pedestrian connections, amenities and proximity of destinations to promote a safe, convenient, and walkable environment;
- More intense development closest to the transit facility, with a gradual reduction in intensity as one moves outwards;
- "Infilling" existing districts and neighborhoods;
- Orientation of buildings and building access to streets;

- Reduction in parking requirements where compared with conventional development;
- Balancing of land uses to maintain a steady flow of activity throughout the day and evening;
- Safe, attractive, and convenient transit stations; and
- Office and retail destinations within 1/8-mile of the transit station and the majority of residential units within 1/4-mile of the transit station. This configuration matches research that concludes that commuters will walk 1/8-mile from a transit station on a commute to work, but that they will walk a somewhat greater distance (1/4-mile) to transit stations from home.

ARTICLE Y: TRANSIT-ORIENTED DEVELOPMENT DISTRICTS

Y00	General Provisions
Y01	Permitted Uses
Y02	Development Standards — Development Parcels
Y03	Development Standards — Roadways
Y04	TOD Station District
Y05	TOD Primary Pedestrian District
Y06	TOD Secondary Pedestrian District

Y00 GENERAL PROVISIONS

Y00.01 Definitions.

Unless otherwise expressly stated, the following words shall, for the purpose of this Article, have the meanings indicated:

Cartway	The extent of a street from curb to curb, including the travelway, shoulders, and on-street parking
	areas

Neck-downA traffic calming device, usually at intersections, in which the curb line is brought out to the edge of the travelway. The effect of a neck-down is to reduce the effective width of the street for pedestrians, while maintaining the width of the street for the movement of traffic.

Primary pedestrian frontage A streetscape in which the front façades of buildings are constructed up to the street right-of-way and for which there are no building setbacks.

Right-of-way A strip of land occupied by a street, including its cartway, boulevard, and sidewalks.

StreetscapeThe area between building façades on either side of a street or between properties on either side of a street, encompassing its cartway, boulevards, sidewalks, setbacks, and property façades or frontages.

TOD station district A zoning district in the immediate vicinity of a transit station and encompassing lands generally within 1/8-mile of the transit station.

TOD primary pedestrian district A zoning district adjacent to a TOD Station District and encompassing lands generally with 1/4-mile of a transit station.

TOD secondary pedestrian district A zoning district adjacent to a TOD Primary Pedestrian District and encompassing lands generally with 1/2-mile of a transit station.

Traffic calmingPhysical measures taken within the right-of-way of a street that have the effect of increasing pedestrian safety. Traffic calming may be achieved by devices that lessen pedestrians' exposure to vehicles, increase pedestrians' visibility to motorists, reduce vehicular speeds, or have a combination of these effects.

Transit station A location for passenger boarding and alighting from public transportation vehicles traveling on

fixed guideways, including rail stations.

Travelway The lanes of a street for moving traffic and any shoulders between the lanes and on-street parking

areas

Y00.02 Permitted Uses.

Uses are Permitted by Right, as Special Exceptions, and as Conditional Uses in transit-oriented development districts in accordance with Section Y01.

Y00.03 Conditional Uses.

The [governing body] is authorized to grant Conditional Uses for uses specified in Section Y01 in accordance with Article ____ and for applications meeting the following criteria:

- A) The use shall not generate high levels of vehicular traffic, nor noise, noxious odors, air pollution, or glare;
- B) The manner, location, and hours of operations and of deliveries to the premises shall be compatible with the daily cycle of active and quiet periods associated with any adjacent or nearby residential uses;
- C) The use shall complement other uses in the district, creating a mixed-use character that contributes toward an increased rate of pedestrian access to local services, including transit, minimized auto-trip generation, and additional security for district businesses;
- D) Additional Conditional Use criteria specified in Sections of this Article are met, when appropriate.

Y00.04 Accessory Uses.

A	1 .		•.I A .• I	
Accessory uses of	ire permitted in	accordance	with Article	

Y00.05 Buffers.

Buffers shall be provided in accordance with Article _____.

Y00.06 Signs.

Signs shall be in accordance with Article _____.

Y00.07 Sewer and Water Facilities.

All development in transit-oriented development districts shall be served by central water and sanitary sewer facilities acceptable to the [governing body] and subject to the approval of the Pennsylvania Department of Environmental Protection or its successor agency and the appropriate municipal authority providing water or sewer facilities.

Y00.08 Performance Standards.

Any activity or use in transit-oriented development districts shall comply with the performance standards of Article _____.

Y00.09 Street and Parcel Layout.

Transit-oriented development districts shall consist of an interconnected grid or modified grid layout of streets with development parcels generally bounded by streets formed as part of this layout. Rights-of-way and streets shall be in accordance with Section Y03.

Y00.10 Pedestrian and Bicycle Orientation.

Transit-oriented development districts shall facilitate pedestrian and bicycle access to the transit station and a high level of mobility throughout TOD districts. Sidewalks and bike lanes shall be provided in accordance with Section Y03. Additional routes for pedestrians and cyclists, such as mid-block cut throughs and all-weather trails, shall also be provided. Intersection neck-downs shall be provided wherever feasible. Traffic calming techniques shall be employed to promote pedestrian safety.

Y00.11 Use Mix.

Transit-oriented development districts shall consist of a mix of land uses. TOD Station Districts shall substantially comprise street-level shops, with office and residential uses above. TOD Primary Pedestrian Districts shall substantially comprise residential uses with retail uses oriented to local residents. TOD Secondary Pedestrian Districts shall comprise a mix of residential, retail, and other uses. Institutional uses, ranging from community centers and post offices to day-care centers, schools, and libraries, are recommended in transit-oriented development districts and strongly recommended in TOD Station Districts.

Y00.12 Transit Station.

Transit stations shall be located centrally within a TOD Station District, with a high degree of accessibility, surrounded by a closely-related mix of retail, office, and residential uses. Transit stations shall provide covered platforms and bicycle storage space for transit patrons. Access, drop-off, and waiting opportunities for rubber-tired transit vehicles (feeder bus, shuttle bus) and other vehicles (private auto, taxi) shall be provided. Civic open space shall be provided adjacent to the transit station.

Y00.13 Parking and Loading.

On-street parking is required in accordance with Section Y03. Off-street parking and loading shall be provided in accordance with Article _____. On-street parking spaces located within five hundred (500) feet of a use may be credited toward required off-street parking spaces as specified in Article _____. Off-street parking should take the form of small lots behind buildings and as part of structures containing other uses, such as retail, residential, and office uses.

Y00.14 Open Space.

Linear open space corridors shall be provided to facilitate pedestrian and bicycle connections to the transit station as well as from TOD Station Districts to TOD Primary Pedestrian Districts and TOD Secondary Pedestrian Districts. Non-linear open space in TOD Station Districts shall be usable for civic and community functions. TOD Primary Pedestrian Districts

shall contain open space areas for passive recreation and tot-lots. TOD Secondary Pedestrian Districts shall contain substantial open space areas for active and passive recreation. Open space shall protect natural features, including floodplains, wetlands, and tree masses.

Y00.15 Natural and Landscaped Areas.

Except as provided for in specific sections of this Article, all portions of a tract not occupied by buildings and required improvements shall be maintained as landscaped areas consisting of natural environmental features and/or planted vegetation.

Section Y01: Permitted Uses - Transit-Oriented Development Districts

		DISTRICT	S
Use Classification	STN.	PP	SP
Use Classification			
1. Stores and personal service shops dealing directly with customers	Р	P	SE
2. Restaurants or other similar establishments, but excluding drive-in facilities	Р	Р	CL
3. Banks, but excluding drive-in facilities	Р	P	CL
4. Cinemas or similar recreational or cultural establishments	Р	P	CU
5. Exercise or fitness facilities	Р	P	SI
6. Studios for dance, art, music or photography	Р	Р	SI
7. Nursery schools or day care centers	Р	Р	SI
Business or professional offices, including:			
Operations designed to attract and serve customers or clients on the premises, such as the offices of physicians, lawyers, other professions, veterinarians (but excluding animal boarding facilities), insurance and stock brokers, travel agents, & government entities	P	P	Cl
Operations designed to attract little or no customer or client traffic other than employees of the entity operating the principal use	P	P	Cl
Hotels, motels or inns	Р	CU	
Bed & breakfast establishments	P	P	P
Lawn and garden centers			CL
Not-for-profit museums, libraries or other educational, cultural, religious, civic or philanthropic uses of a similar nature	Р	P	CL
Public or private not-for-profit open space and recreation uses	Р	Р	Р
For-profit open space and recreation uses		CU	Р
Transit stations or public utility facilities	Р	Р	Р
Animal hospital, veterinarian, or kennel		Р	CU
Single-family detached residential dwellings (SFD)			Р
Two-family residential dwellings (2F)		CU	Р
Single-family attached residential dwellings (SFA)		Р	Р
Multi-family residential dwellings (MF)	Р	P	Р
Residences, in mixed-use commercial-residential or institutional-residential buildings	Р	Р	SI
Drive-in facility			Cl
Non-accessory antennas			Cl
Public garage, motor-vehicle sales, service or repair shop, gasoline service station and motor vehicle parking lot		cu	CI

P Permitted

SE Special Exception

STN. Station District

PP Primary Pedestrian District

CU Conditional Use

SP Secondary Pedestrian District

Section Y02: Development Standards - Transit-Oriented Development Districts

		DISTRICTS	5
Standards	STN.	PP	SP
Maximum Tract Density (floor-area ratio[FAR])	1.2	0.8	0.6
Minimum Tract Density (floor-area ratio[FAR])	0.6	0.4	_
Maximum Tract Density (units per developable acre)	40	20	7
Minimum Tract Density (units per developable acre)	25	10	_
Minimum Tract Area (square feet)	1,000	2,500	5,000
Maximum Building Coverage (% of tract)*	55	45	35
Maximum Impervious Coverage (% of tract)	65	55	45
Central Water & Sewer Facilities Required	Yes	Yes	Yes
Maximum Height - Principal Structures (feet)	65	45	35
Minimum Height - Principal Structures (feet)	35	25	
Maximum Height - Accessory Structures (feet)	45	50% height of tallest principal structure	16
Minimum Lot Width at Right-of-Way Line (feet)	20	20	20
Minimum Lot Width at Building Setback Line (feet)	20	20	30
Minimum setbacks from streets (feet):			
 Any building face to arterial street ultimate right-of-way 	0	0	20
 Any building face to collector or local street ultimate right-of-way 	0	0	10
■ Any building face to common parking area	5	5	10
■ Surface parking areas to arterial street ultimate right-of-way	20	20	30
 Surface parking areas to collector street ultimate right-of-way 	10	10	15
■ Surface parking areas to local street ultimate right-of-way	10	10	10
Maximum setbacks from streets (feet):			
 Any building face to arterial street ultimate right-of-way 	5	10	-
 Any building face to collector or local street ultimate right-of-way 	0	5	-
Minimum principal structure setbacks from tract perimeter (excluding street frontages) (feet):			
■ From other like-zoned tracts	5	5	10
From other district boundary lines	10	10	15
Minimum principal building spacing (feet):	10	10	13
■ Window wall to windowless wall	20	20	20
■ Window wall to window wall			
a) Front to front	40	40	50
b) Rear to rear	35	35	45
c) End to end	25	25	
d) Front to rear	40	40	35 50
	II 40	40	50
e) Front to end	40	40	50

^{*} Excluding parking structures required to meet minimum off-street parking requirements.

Section Y03: Development Standards - Transit-Oriented Development Districts Roadway Types

	ROADW	ROADWAY TYPES				
Standards	Arterial	Collector	Boulevard	Mixed Use	Residential	Alley
Function	As per Maste	As per Place Master Plan	Entry Roadway into District or Development	Collector or Local Fronting Mixed Uses	Collector or Local Fronting Residential	Access to Interior of Blocks
Design Speed	40	30	30	25	25	15
Right-of-Way Width (feet)	98	64	78	64	52	18
Paved Width (Cartway) (feet)	99	44	$22 \times 2 = 44$	44	24 – 28	18
Parking, both sides	Yes	Yes	Yes	Yes	Yes *	o N
Parking, one side	ĝ	Ž	°Z	Ž	Yes **	S _O
Concrete or Granite Curbing	Yes	Yes	Yes	Yes	Yes	o Z
Central Landscaped Area (14-foot-wide boulevard)	Ŷ	Š	Yes	Š.	Š	°Z
Side Landscaped Areas (5 feet between cartway & sidewalks)	Yes	Yes	Yes	Yes	Yes	o Z
Sidewalks (both sides)	Yes	Yes	Yes	Yes	Yes	o Z
Bikeways (both sides)	Yes	Yes	Yes	Yes	°Z	o Z
Street Lights (both sides)	Yes	Yes	Yes	Yes	Yes	One Side
Street Lights Maximum Height (feet)	16	16	16	16	16	16
Street Lights Maximum Spacing (one side) (feet)	06	08	70	09	09	09
Shade (Street) Trees (both sides)	Yes	Yes	Yes + Blvd.	Yes	Yes	No
Shade (Street) Trees Maximum Spacing (one side) (feet)	80	70	99	40	40	-

28-foot-wide cartway** 24-foot-wide cartway

Y04 TOD STATION DISTRICT

Y04.01 Intent.

The intent of the TOD Station district is to provide for the combining of offices, stores and shops, hotels and inns, higher-intensity residential uses, and civic, public, and semi-public uses in a closely-knit walking precinct at transit stations. It is the purpose of these regulations to encourage a diversification of uses in each TOD Station district and to promote close interrelationships among different uses; high-quality, visually-attractive, and environmentally-responsible site design and buildings; efficient circulation systems; conservation of land and energy resources; reduced rates of auto-trip generation; and increased opportunities for pedestrian circulation. In addition, the specific intent of the district is to:

- A) Encourage the development of land and buildings at transit stations for a variety of uses, either individually or together within the same building, for compatible mixed-use developments;
- B) Permit the development of functionally-related land uses in a manner that is supportive of transit usage and that is more efficient, environmentally-sensitive, and mutually-supporting than conventional sprawling, strip-type, low-intensity suburban development;
- C) Maximize transit patronage and minimize auto-trip generation through maximizing opportunities for pedestrian mobility to transit and pedestrian movement and patronage of multiple facilities in a development district that emphasizes the interrelationship of uses and structures;
- Establish a framework for development that anticipates and encourages the necessary conditions for a high level of transit utilization and pedestrian circulation;
- E) Provide for civic, public, and semi-public uses, including exterior common use areas, convenient to office and commercial concentrations, so as to function for the general benefit of the community as places for relaxation, recreation, and social activity;
- F) Enhance the functional values of natural and landscaped areas for developed areas, including groundwater recharge, runoff control, and microclimate moderation.

Y04.02 Permitted Uses.

Uses are Permitted by Right, as Special Exceptions, and as Conditional Uses in TOD Station districts in accordance with Section Y01.

Y04.03 Development Standards.

Uses shall occur in accordance with the standards of Section YO2.

Y04.04 Pedestrian Frontages.

At least seventy-five percent (75%) of streetscapes in TOD Station districts shall be primary pedestrian frontages.

Y04.05 Building Size and Spacing.

The greatest dimension of a structure, measured parallel to exterior walls, shall not exceed two hundred (200) feet. The minimum distance between structures shall be ten (10) feet, except that all structures connected by a common roof line or effectively connected by means of intervening covered areas shall be considered as one (1) structure.

Y05.06 Orientation of Retail and Service Commercial Premises.

Patron access to commercial premises shall be by way of a door or similar opening giving access directly from the sidewalk along the front of the property or directly from the street right-of-way.

Y04.07 Pedestrian Circulation Provisions for Natural and Landscaped Areas.

Natural and landscaped areas, as provided for in Section Y00.15, shall predominantly consist of natural environmental features or planted and maintained vegetation, but up to twenty percent (20%) of the total area may also consist of exterior common use areas such as pedestrian paths, sidewalks, plazas, courtyards, and recreational amenities. Whenever practicable, ground surfaces in common use areas shall be constructed of pavers in a sand setting bed with permeable joints, or similar partly-pervious surface treatments.

YO5 TOD PRIMARY PEDESTRIAN DISTRICT

Y05.01 Intent.

The intent of the TOD Primary Pedestrian district is to provide for the combining of medium-high intensity, residential uses, stores and shops, offices, and civic, public, and semi-public uses in a closely-knit walking precinct close to transit stations. It is the purpose of these regulations to encourage a diversification of uses in each TOD Primary Pedestrian district and to promote close interrelationships among different uses; high-quality, visually-attractive, and environmentally-responsible site design and buildings; efficient circulation systems; conservation of land and energy resources; reduced rates of auto-trip generation; and increased opportunities for pedestrian circulation. In addition, the specific intent of the district is to:

- A) Encourage the development of land and buildings close to transit stations for a variety of uses, either individually or together within the same building, for compatible mixed-use developments;
- B) Permit the development of functionally-related land uses in a manner that is supportive of transit usage and that is more efficient, environmentally-sensitive, and mutually-supporting than conventional sprawling, strip-type, low-intensity suburban development;
- C) Maximize transit patronage and minimize auto-trip generation through maximizing opportunities for pedestrian mobility to transit and pedestrian movement and patronage of multiple facilities in a development district that emphasizes the interrelationship of uses and structures;
- D) Establish a framework for development that anticipates and encourages the necessary conditions for a high level of transit utilization and pedestrian circulation;

- E) Provide for public and semi-public uses, including exterior common use areas, convenient to medium-high density residential concentrations, so as to function for the general benefit of the community as places for relaxation, recreation, and social activity;
- F) Enhance the functional values of natural and landscaped areas for developed areas, including groundwater recharge, runoff control, and microclimate moderation.

Y05.02 Permitted Uses.

Uses are Permitted by Right, as Special Exceptions, and as Conditional Uses in TOD Primary Pedestrian districts in accordance with Section Y01.

Y05.03 Development Standards.

Uses shall occur in accordance with the standards of Section XO2.

Y05.04 Pedestrian Frontages.

At least fifty percent (50%) of streetscapes in TOD Primary Pedestrian districts shall be primary pedestrian frontages.

Y05.05 Retail and Service Commercial Uses.

Retail and service commercial uses shall be contained in multistory, mixed-use structures with retail and service commercial uses on the ground level and office and/or dwellings on the upper levels. The greatest dimension of a structure, measured parallel to exterior walls, shall not exceed two hundred (200) feet. The maximum ground level footprint of a retail and service commercial building shall be twenty thousand (20,000) square feet. The minimum distance between structures shall be ten (10) feet, except that all structures connected by a common roof line or effectively connected by means of intervening covered areas shall be considered as one (1) structure.

Y05.06 Orientation of Retail and Service Commercial Premises.

Patron access to commercial premises shall be by way of a door or similar opening giving access directly from the sidewalk along the front of the property or directly from the street right-of-way.

Y05.07 Pedestrian Circulation Provisions for Natural and Landscaped Areas.

Natural and landscaped areas, as provided for in Section Y00.15, shall predominantly consist of natural environmental features or planted and maintained vegetation, but up to twenty percent (20%) of the total area may also consist of exterior common use areas such as pedestrian paths, sidewalks, plazas, courtyards, and recreational amenities. Whenever practicable, ground surfaces in common use areas shall be constructed of pavers in a sand setting bed with permeable joints, or similar partly-pervious surface treatments.

Y06 TOD SECONDARY PEDESTRIAN DISTRICT

Y06.01 Intent.

The intent of the TOD Secondary Pedestrian district is to provide for the combining of moderate-intensity residential uses, stores and shops, offices, and civic, public, and semi-public uses in areas near to transit stations. It is the purpose of these regulations to encourage a diversification of uses in each TOD Secondary Pedestrian district and to promote close interrelationships among different uses; high-quality, visually-attractive, and environmentally-responsible site design and buildings; efficient circulation systems; conservation of land and energy resources; reduced rates of auto-trip generation; and increased opportunities for pedestrian circulation. Furthermore, it is the intent to:

- A) Establish or reinforce moderate-intensity, mixed-use areas, following the precedent of traditional towns, by keeping a variety of different, reasonably-compatible uses together in a closely-knit setting;
- B) Provide for convenient, local services for residents living in and near to these areas and opportunities for short-distance trips by automobile or alternate means, such as by bicycle or on foot;
- C) Encourage the use of transit;
- D) Allow for moderate-intensity commercial uses where more intensive commercial use would have adverse effects on adjacent and neighboring residential areas;
- E) Minimize auto-trip generation through maximizing opportunities for pedestrian movement and patronage of multiple facilities in a development district that emphasizes the interrelationship of uses and structures;
- F) Establish a framework for development that anticipates and encourages the necessary conditions for a high level of pedestrian circulation.
- G) Enhance the functional values of open space and landscaping for developed areas, including groundwater recharge, runoff control, microclimate moderation, noise attenuation, and visual buffering.

Y06.02 Permitted Uses.

Uses are Permitted by Right, as Special Exceptions, and as Conditional Uses in TOD Secondary Pedestrian districts in accordance with Section Y01.

Y06.03 Development Standards.

Uses shall occur in accordance with the standards of Section XO2.