

## **APPENDIX G**

### **Floor Area Ratio Examples**

*Discussed at the Planning Commission Meeting  
- May 7, 2003*

## Floor Area Ratio Comparisons

June 4, 2003

Figure	Type of Structure	Lot Size (sq. ft.)	Floor Area Per DU (sq. ft.)	Parking Spaces Per DU	Number of Stories	Lot Area per DU (sq. ft.)	DU's per Net Acre	Floor Area Ratio (FAR)	Coverage (percent)
H	3-story apartment over parking	20,000	1,000	1.0	3 res 1 pkg	690	63	1.4 1.9	48
Ha	3-story apartment over commercial	20,000	1,000		4	667	65	2.0	50
Hb	4-story apartment with below grade parking	20,000	750		4	500	87	2.0	50



# *Floor Area Ratio & Underlying Density Comparison*

## *Definitions*

*Floor Area Ratio (FAR): The gross floor area permitted on a site divided by the total net area of the site, expressed in decimals to one or two places. For example, on a site with 10,000 net sq. feet of land area, a Floor Area Ratio of 1.0 will allow a maximum of 10,000 gross sq. feet of building floor area to be built.*

10,000 sq. foot  
parcel

=

10,000 sq. foot  
building

## *FAR vs. Underlying Density*

### *FAR – Controls the Structure*

- *Performance based – establishes maximum limits of a structure on site, but allows flexibility in how many units go in the structure.*
- *Allows more flexibility in development for market factors (smaller vs. larger units).*

### *Underlying Density – Controls the units*

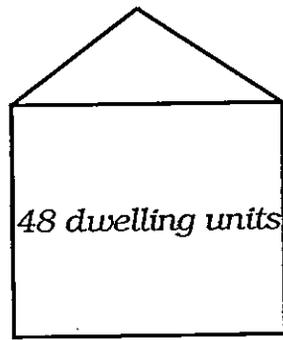
- *Establishes maximum number of units on a site.*
- *Limits the type and amount of development possible within a structure.*
- *(W.V. Code also controls structure thru “bulk requirements”)*

## *FAR vs. Underlying Density Continued*

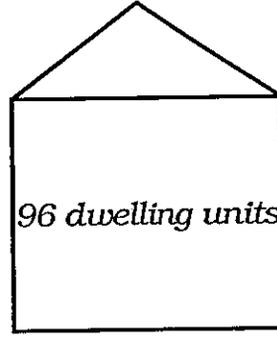
### *Summary – Both control development intensity*

- *Possible uses of FAR in the Downtown – Little Bear Creek Corridor Master Plan include:*
  1. *Allow FAR to achieve pedestrian-oriented downtown.*
  2. *Allow FAR to achieve special purposes, such as to encourage affordable housing or transit use.*
  3. *Allow FAR as an incentive to achieve desired amenities.*

## *FAR vs. Underlying Density Continued*



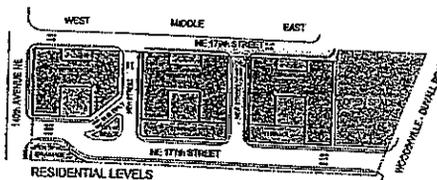
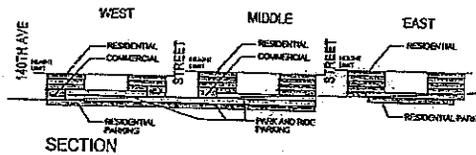
48 du/acre



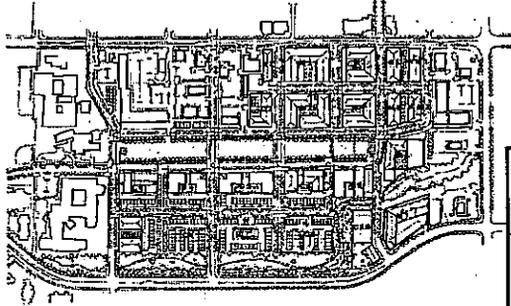
2:1 FAR

## *Sound Transit TOD Feasibility Report*

FAR 2.5	388 dwelling units
48 du/acre underlying density	172 dwelling units



## Consultant Analysis

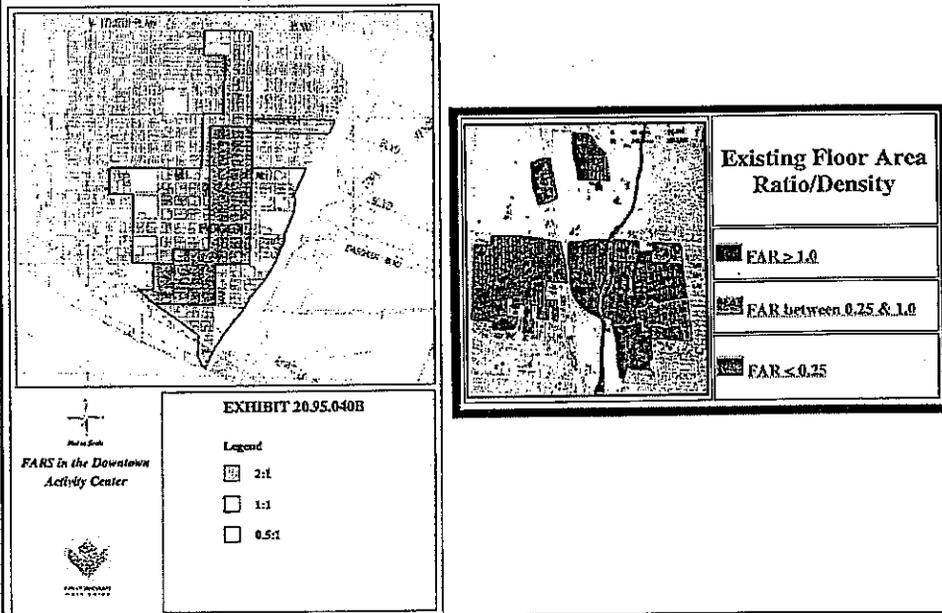


		Existing City Underlying Density	
		45' @ 48 du/ac (33.5 acres)	1,608 du
55' @ 2.5 FAR	2,842 du (800 sq. ft.)		
45' @ 2.5 FAR	2,131 du (800 sq. ft.)		

## Uses of Floor Area Ratio

- Floor Area Ratio can be used to specify different densities in different areas.

## Examples of Different FAR's in a Downtown



## FAR or Underlying Density Can be Used as Incentives to Gain Amenities Mercer Island Method:

**All new development in the Town Center must provide at least 3 "minor site features":**

- Decorative Landmarks (special paving, artwork, water features)
- All-weather features (awnings, canopies, covered arcades)
- Kiosks
- Courtyards
- Additional sidewalk setbacks

**Any new development which exceeds two stories must provide at least one "major site feature" :**

- Pedestrian connection,
- Public plaza or pocket park,
- Artwork,
- Water feature, and
- Affordable housing.

## *Density Comparison of Neighboring Cities*

City	Maximum Height (feet)	Floors	FAR Residential	Dwelling Unit Limit
Woodinville	45'	4	Not allowed	48 du/ac
Redmond	Up to 75' possible Depends on design district.	5 Higher possible	1-2.5 based on design district	55 du/ac More possible
Kirkland	Dep. on use 15' retail 13' office 10' res	Up to 5 W/res Up to 4 w/o res	No limit	None
Mercer Island	65'	5	No limit	None
Bothell	35'-65'	4-6	No limit	None
Renton	95'	Depends on height	No limit	100-150 du/ac

STANDARDS	Z O N E S	COMMERCIAL/INDUSTRIAL						
		PUBLIC						
		PUBLIC/ INSTITUTIONAL	NEIGHBORHOOD BUSINESS	TOURIST BUSINESS	GENERAL BUSINESS	CENTRAL BUSINESS	OFFICE	INDUSTRIAL
	P/I	NB	TB	GB	CBD	O	I	
Base Density: Dwelling Unit/Acre				8 du/ac		36 du/ac	36 du/ac	
Maximum Density: Dwelling Unit/Acre				12 du/ac (3)		48 du/ac (3)	48 du/ac (3)	
Minimum Lot Area								
Minimum Depth/ Width (1)								
Minimum Street Setback (17)	10 ft	10 ft (5) 20 ft (11)	10 ft (2) (5) (14)	10 ft (5) 25 ft (15)	10 ft (10) (5)	10 ft	25 ft 10 ft (9) (14) (15)	
Minimum Interior Setback (13)	20 ft (7) (16)	10 ft	20 ft (7) (14)	25 ft (7) (15)	20 ft (7)	20 ft (7)	20 ft (7) (14) (15) 50 ft (8) (14)	
Base Height (10)	45 ft (4)	35 ft	35 ft (14)	35 ft	35 ft (6) (12)	45 ft (4)	45 ft (14)	
Maximum Building Coverage: Percentage								
Maximum Floor/Lot Ratio: Square Feet	4/1	1/1	1/1	2/1	2.5/1	4/1	3/1	
Maximum Impervious Surface: Percentage	85%	75%	85% (14)	85%	90%	75%	90% (14)	
Maximum Building Sq. Footage		10,000						

## 21.12.040 B. Development Conditions.

- (1) The depth-to-width ratio shall be no greater than the ratio indicated.
- (2) Ten (10) foot setback may not be required on those sites abutting a designated pedestrian-oriented street pursuant to City of Woodinville Design Guidelines, or as may hereafter be amended.
- (3) These densities may only be achieved through the application of residential density incentives or transfer of density credits, see WMC 21.34 and 21.36.
- (4) Height is limited to thirty-five (35) feet when development abuts a low or moderate residentially zoned property.
- (5) Gas station pump islands shall be placed no closer than twenty-five (25) feet to street front lines.
- (6) Mixed use developments that include a minimum of 25% of the total area as office space may increase height limits to a maximum of forty-five (45) feet.
- (7) Twenty (20) foot setback only required along property lines adjoining residential zones, otherwise no specific interior setback requirement.
- (8) Fifty (50) foot setback only required along property lines adjoining residential zones for industrial uses established by conditional use permits, otherwise no specific interior setback requirement.

(9) Ten (10) foot setback permitted only on those sites not abutting a designated arterial street.

(10) Height limits may be increased when portions of the structure or building which exceed the base height limit provide one (1) additional foot of street and interior setback beyond the required setback for each foot above the base height limit, provided the maximum height may not exceed forty-five (45) feet.

(11) Twenty (20) foot setback required only along property lines adjoining the Woodinville-Duvall Road right-of-way.

(12) Developments that provide underground parking may exceed the height limit by one (1) story for every level of parking provided, to a maximum of forty-five (45) feet.

(13) See WMC 21.16.060, Landscaping - interior lot lines.

(14) If located in the Tourist District, see WMC 21.38.065.

(15) Twenty-five (25)-foot setback only required along property lines adjoining the SR 202, and Woodinville-Snohomish Road rights-of-way. See WMC 21.16.080(2) for landscaping requirements.

(16) Fifty (50)-foot setback required along property lines abutting agriculturally zoned parcels.

(17) Does not apply to signage. For applicable sign setbacks, see WMC 21.20.

21.12.050

Measurement methods. The following provisions shall be used to determine compliance with this title:

(1) Street setbacks shall be measured as follows:

- a. Where existing or planned street and sidewalk improvements are both located on a public right-of-way, the street setback shall extend perpendicularly from the lot line,
- b. Where existing or planned street improvements are located on a public right-of-way and the City has obtained a public access easement for placement of existing or planned sidewalk improvements, the street setback shall extend perpendicularly from the lot line and may overlap the public easement,
- c. Where the existing street improvements are on private property and consist of a separate tract, the street setback shall extend perpendicularly from the lot line, and
- d. Where the existing street improvements are located over a private access easement, the street setback shall extend perpendicularly from the edge of the easement closest to the structure.

(2) Lot widths shall be measured by scaling a circle of the applicable diameter within the boundaries of the lot, provided that an access easement shall not be included within the circle,

(3) Building height shall be measured from the average finished grade to the highest point of the coping of a flat roof, or to the deck line of a mansard roof,