ד"ר אפרת טולקובסקי
מנהלת כללית מכון גזית-גלוב לחקר נדל"ן
המרכז הבינתחומי הרצליה

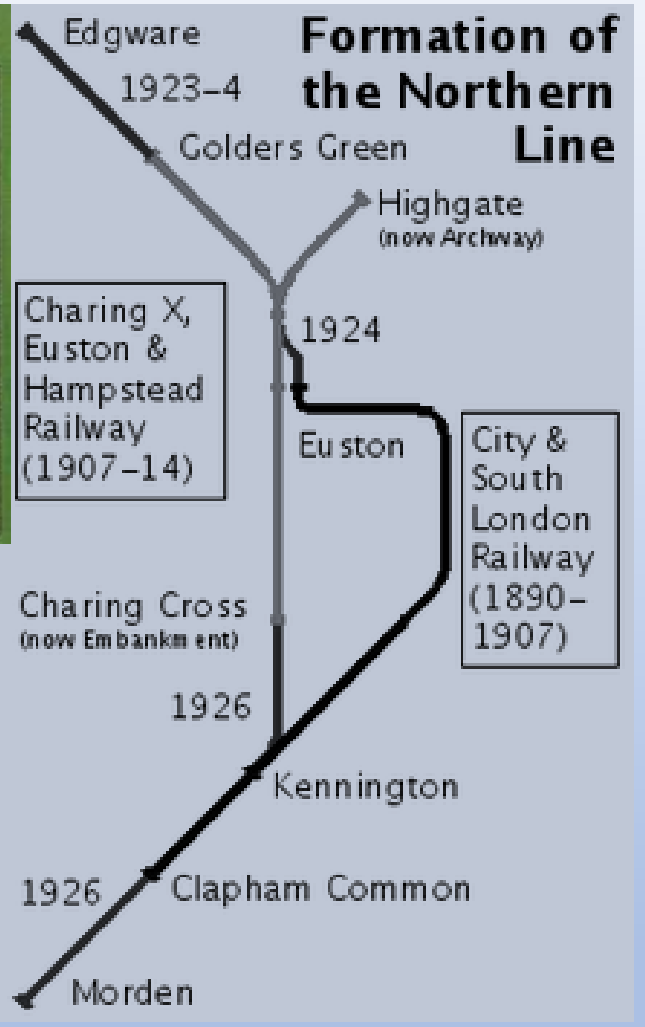
King Charless II, 1660

Whereas the excessive number of hackney coaches, and coach horses, in and about the Cities of London and Westminster, and the suburbs thereof, are found to be a common nuisance to the publique dammage of our people, by reason of their rude and disorderly standing, and passing to and fro, in and about Our said Cities and Suburbs, the streets and highways being thereby pestred and made unpassable, the pavements broken up, and the common passages obstructed and become dangerous, Our peace violated, and sundry other mischiefs and evils occasioned . . .

The king therefore commanded that coaches were not to stand in the streets when waiting for passengers, but must wait in stables or yards.[4] Two centuries later, traffic congestion

תקן חניה דור 1

Figure 1.1: Gustav Doré's view of London congestion, 1872.

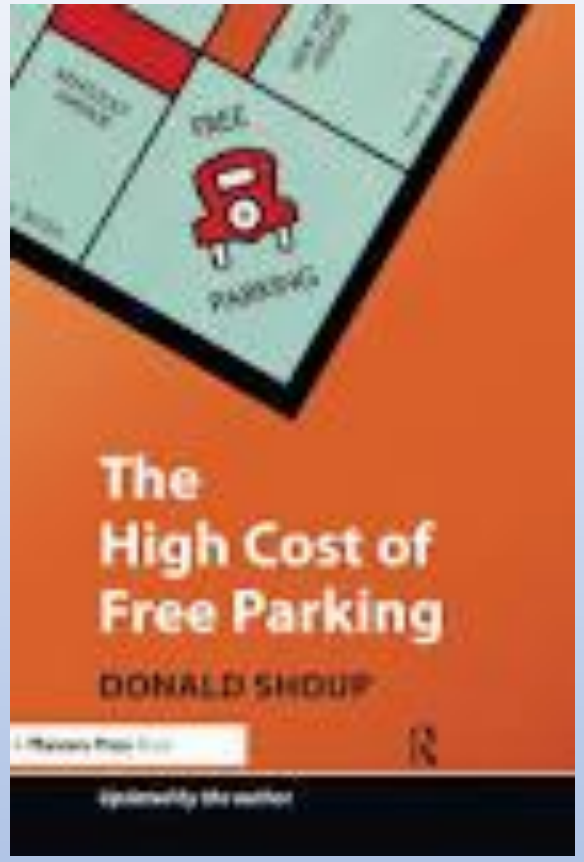


The world's first underground railway, it opened in January 1863 between Paddington and Farringdon

RESIDENTIAL PARKING REQUIREMENTS IN NEW YORK CITY

"City policymakers first moved to address "parking shortages" in 1938 when new provisions were added to the zoning code to regulate the construction of off-street lots and garages. By the **1950s**, **the city began to use its own resources** to increase public parking capacity by constructing municipal parking garages and by metering public spaces. **By 1954**, as in many other cities, New York's zoning code **began to require** developers of certain types of projects to provide off-street parking. **This approach, requiring no direct outlay of city funds**, became the bedrock of parking policy and was enforced and strengthened when the new zoning resolution was adopted in 1961. Parking requirements were imposed for all residential, commercial, and manufacturing districts, **with the exception of congested areas in Lower Manhattan**. In the early **1980s, the exemption was extended** to new construction in most of Manhattan and part of Queens as a result of air-quality concerns. Until recently, parking requirements remained largely unchanged or were even increased in some cases".

City Hall station of the IRT Lexington Avenue Line, part of the first underground line of the subway **that opened on October 27, 1904**



- תקן מינימום הפך לנפוץ החל בשנות ה 60 ברוב העולם המערבי. כמעט כל תכנית בניין כללה תקן מינימום.
- הספר The High Cost of Free Parking שהתפרסם בשנת 2005 שימש כנקודת מפנה בחשיבה הציבורית בנושא.
- החל משנות ה 80 בעולם התכנון החל דיון פנימי שאומר שתקן מינימום הוא תקלה שצריך לתקן. עיוות תכנוני בו מערכות התכנון מכריחות את היזמים לעשות דבר שלא בטוח שהיו בוחרים לעשות – לבנות חניות בהיקפים המוכתבים.
- לטענת הספר – תקנות הבנייה גוררות עודף היצע של חניות שמצידו גורר עודף שימוש ברכב פרטי.
- עצם קיום החניה גורר שימוש ברכב.

כדי להבין את הביקוש לחניות יש לגרום לכך שעלות החניה תהיה עלות שוטפת כפי שהשימוש ברכב הינו עלות שוטפת

הביקוש לרכב נגזר מנגישות לחניה ולכן הביקוש לתחבורה ציבורית נגזר מהנגישות לחניה – מעגל חיובי או מעגל שלילי

In **2001, the government** then published Planning Policy Guidance 13-Transport, which stated, “There should be no minimum standards for development, other than parking for disabled people,” and that “maximum standards should be designed to be used as part of a package of measures to promote sustainable transport choices.”

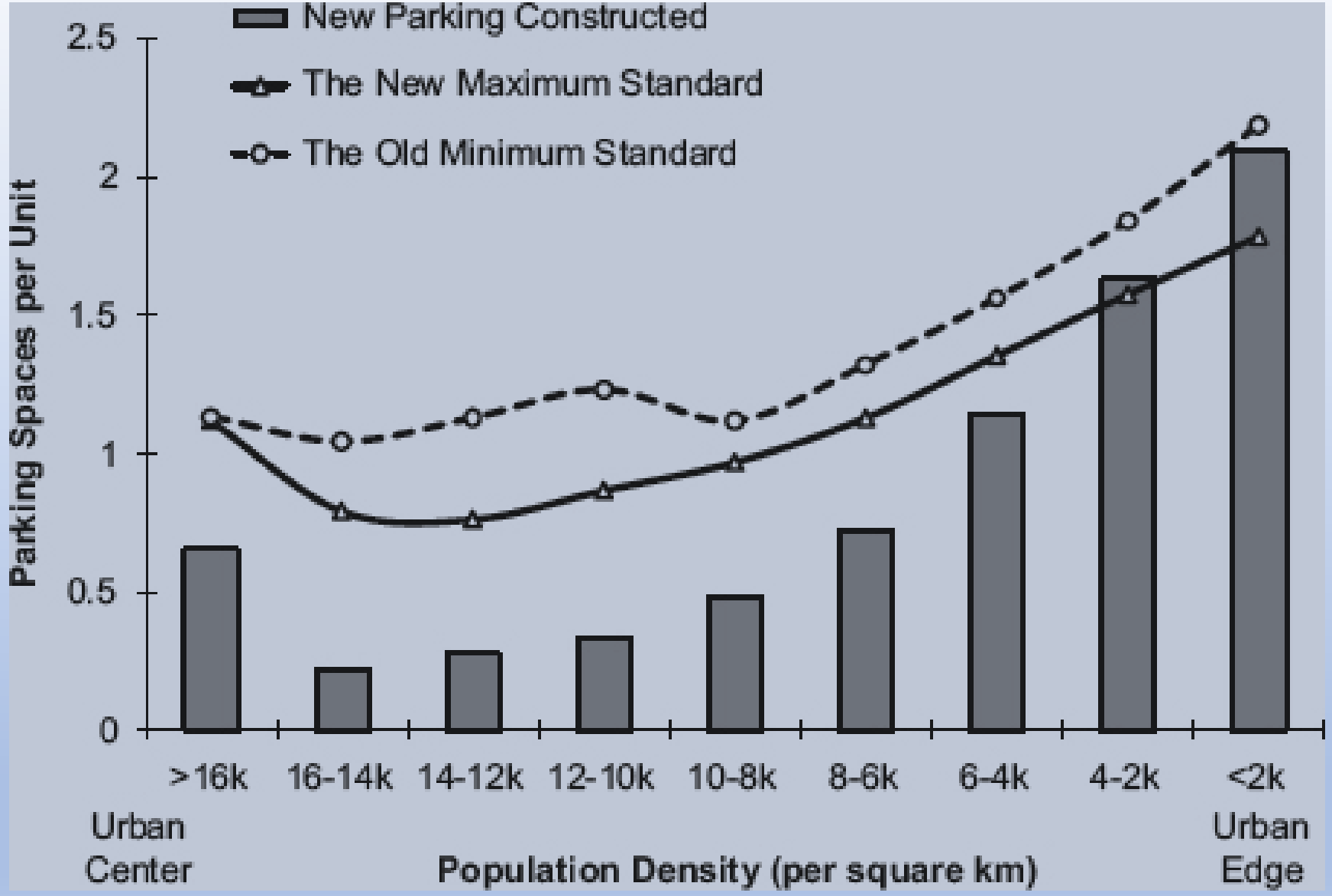
Following these national policies, the Greater London Authority (GLA), the regional government for the metropolitan area, passed the London Plan in February 2004, requiring local authorities to **shift from parking minimums to maximum**s. As a result of the national and regional policy changes, 30 of London’s 33 boroughs updated their local plans to replace parking minimums with maximums and used these standards in the review process for planning applications.

Table 1
Parking standards, car ownership and car usage in the 12 boroughs.[a]

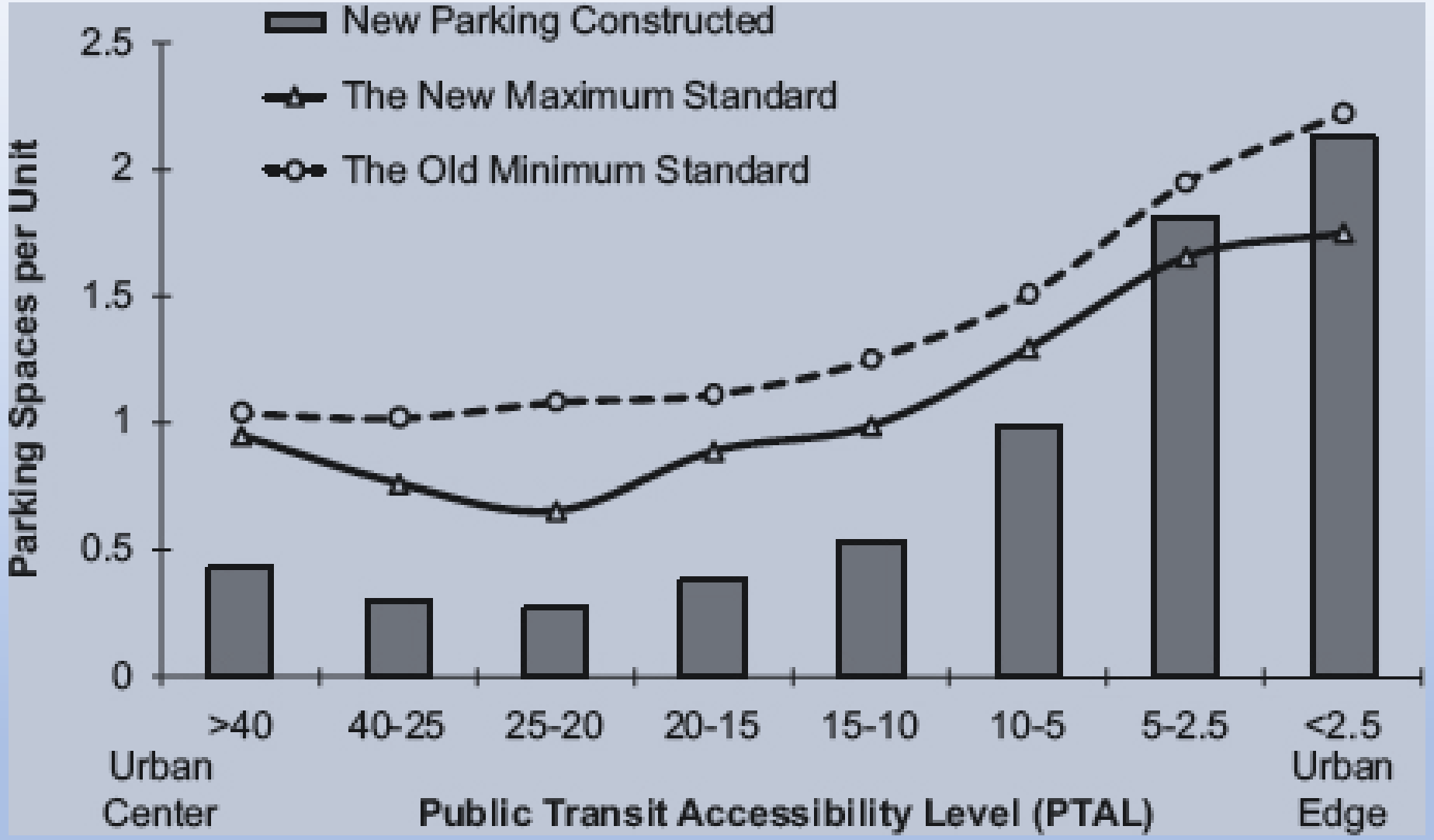
	Borough	Parking standards[b] (# of spaces per unit)			# of cars per household		No-car households (%)		Commuting by car (%)	
		Min (Pre-reform)	Max (Post-reform)	Change	2001	2011	2001	2011	2001	2011
Inner London	Hammersmith and Fulham (H & F)	1–1.6	1–1.6	None	0.65	0.54	48.56	55.25	19.00	8.73
	Islington	0–1	0.5	Mixed	0.51	0.41	57.62	64.65	16.82	6.39
	Lambeth	0–1	0.25–1	Mixed	0.61	0.51	50.94	57.85	20.07	9.12
	Lewisham	1–1.5	1–1.5	None	0.74	0.66	42.77	48.15	30.82	15.29
	Newham	1.5–3	1–3	Reduced	0.63	0.60	48.86	52.06	29.25	12.67
	Southwark	1.1	0–2	Mixed	0.59	0.50	51.93	58.39	21.84	8.66
	Westminster	1	1–1.5	Increased	0.54	0.46	56.43	62.90	14.43	6.48
Outer London	Bexley	1.33–2.5	1–2	Reduced	1.13	1.17	23.72	23.67	50.75	33.43
	Brent	1.2–2.16	1–2	Reduced	0.88	0.80	37.29	43.00	36.11	18.67
	Bromley	1.5–3	1–2	Reduced	1.16	1.18	23.00	23.48	45.23	28.91
	Greenwich	1–2	1	Reduced	0.79	0.77	40.83	42.02	36.59	18.71
	Richmond upon Thames	1–3	1–2	Reduced	1.09	1.06	23.70	24.74	40.70	24.40

[a] Data sources: local planning documents; 2001 and 2011 UK censuses.
[b] The range of minimum (pre-reform) or maximum (post-reform) parking standards for all sizes and types of housing.

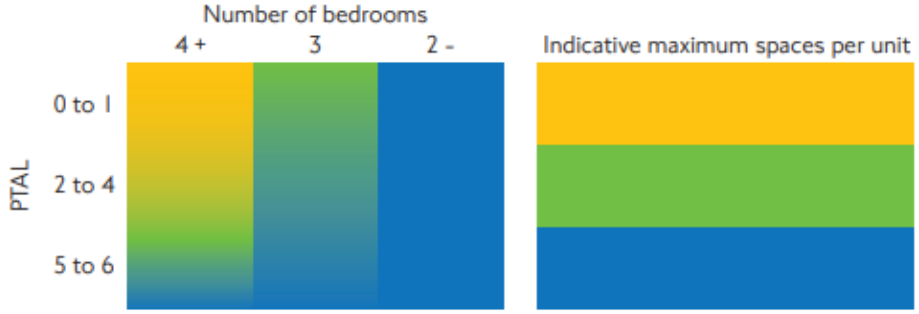
ירידה חדה בשימוש ברכב ירידה פחות חדה בבעלות על רכב


New Parking Constructed
The New Maximum Standard
The Old Minimum Standard
Parking Spaces per Unit
2.5
2
1.5
1
0.5
0
>16k
16-14k
14-12k
12-10k
10-8k
8-6k
6-4k
4-2k
<2k
Urban Center
Population Density (per square km)
Urban Edge


השלכות תקן החניה החדש
בתל-אביב-יפו
על בנייה למגורים


New Parking Constructed
The New Maximum Standard
The Old Minimum Standard
Parking Spaces per Unit
2.5
2
1.5
1
0.5
0
>40
40-25
25-20
20-15
15-10
10-5
5-2.5
<2.5
Urban Center
Public Transit Accessibility Level (PTAL)
Urban Edge

Matrix 1



Matrix 2

	PTAL 0 to 1		PTAL 2 to 4		PTAL 5 to 6	
Suburban	**150-200 hr/ha**	**Parking provision**	**150-250 hr/ha**	**Parking provision**	**200-350 hr/ha**	**Parking provision**
3.8-4.6 hr/unit	35-55 u/ha	Up to 2 spaces per unit	35-65 u/ha	Up to 1.5 spaces per unit	45-90 u/ha	Up to one space per unit
3.1-3.7 hr/unit	40-65 u/ha		40-80 u/ha		55-115 u/ha	
2.7-3.0 hr/unit	50-75 u/ha		50-95 u/ha		70-130 u/ha	
Urban	**150-250 hr/ha**		**200-450 hr/ha**		**200-700 hr/ha**	
3.8-4.6 hr/unit	35-65 u/ha	Up to 1.5 spaces per unit	45-120 u/ha	Up to 1.5 spaces per unit	45-185 u/ha	Up to one space per unit
3.1-3.7 hr/unit	40-80 u/ha		55-145 u/ha		55-225 u/ha	
2.7-3.0 hr/unit	50-95 u/ha		70-170 u/ha	Up to one space per unit	70-260 u/ha	
Central	**150-300 hr/ha**		**300-650 hr/ha**		**650-1100 hr/ha**	
3.8-4.6 hr/unit	35-80 u/ha	Up to 1.5 spaces per unit	65-170 u/ha	Up to one space per unit	140-290 u/ha	Up to one space per unit
3.1-3.7 hr/unit	40-100 u/ha		80-210 u/ha		175-355 u/ha	
2.7-3.0 hr/unit	50-110 u/ha	Up to one space per unit	100-240 u/ha		215-405 u/ha	

Up to 2 spaces per unit

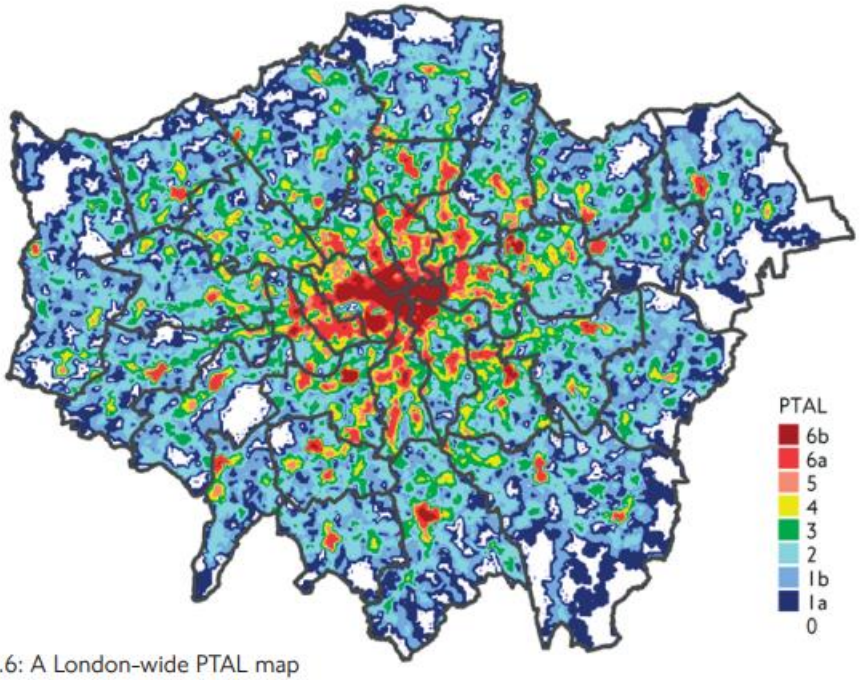


Figure 2.6: A London-wide PTAL map

Maximum parking standards

Maximum residential parking standards

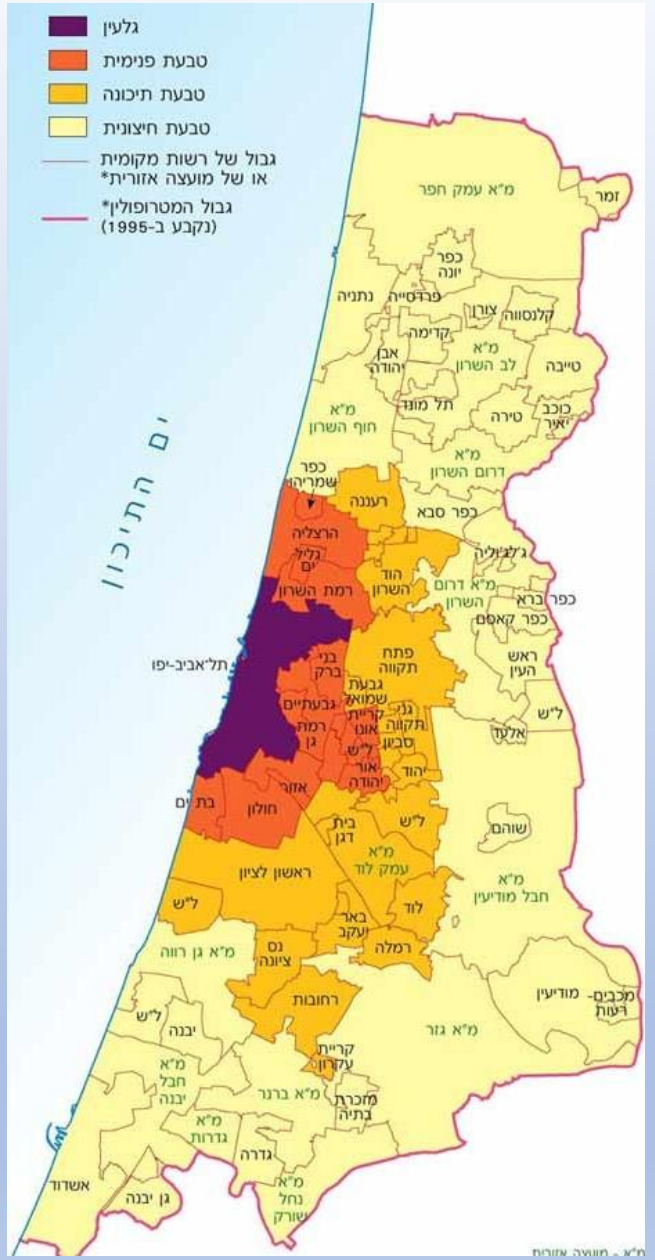
number of beds	4 or more	3	1-2
parking spaces	up to 2 per unit	up to 1.5 per unit	less than 1 per unit

According to the ITDP report, 'Europe's Parking U-turn: From Accommodation to Regulation':

If a development is 500 meters from a metro stop, there is no obligation to build parking, though it is allowed. ... Every 500–600 meters there is a metro in Paris and every 1.5–2 kilometers a regional rail station. Minimum requirements were eliminated while maximum parking for housing is one spot for every 100 m2.

Area	
• Total[A]	607 sq mi (1,572 km²)
• Urban	671.0 sq mi (1,737.9 km²)
• Metro	3,236 sq mi (8,382 km²)
• City of London	1.12 sq mi (2.90 km²)
• Greater London	606 sq mi (1,569 km²)
Elevation[3]	36 ft (11 m)
Population (2018)[5]	
• Total[A]	8,961,989[1]
• Density	14,670/sq mi (5,666/km²)
• Urban	9,787,426
• Metro	14,257,962[4] (1st)
• City of London	8,706 (67th)
• Greater London	8,899,375

Area	
• City	52 km² (20 sq mi)
• Urban	176 km² (68 sq mi)
• Metro	1,516 km² (585 sq mi)
Elevation	5 m (16 ft)
Population (2019)[1]	
• City	460,613
• Rank	2nd in Israel
• Density	8,468.7/km² (21,934/sq mi)
• Density rank	12th in Israel
• Urban	1,388,400
• Urban density	8,057.7/km² (20,869/sq mi)
• Metro	3,854,000
• Metro density	2,286/km² (5,920/sq mi)



Putting a Cap on Parking Requirements

A way to make cities function better. By **DONALD SHOUP,** FAICP

How will reducing off-street parking requirements affect development? Zhan Guo and Shuai Ren at New York University studied the results when in 2004 London shifted from minimum parking requirements with no maximum to maximum parking limits with no minimum. Comparing developments completed before and after the reform, they found that the parking supplied after the reform was only 68 percent of the maximum allowed and only 52 percent of the previous minimum required.

This result implies that the previous parking minimum was almost *double* the number of parking spaces that developers would have voluntarily provided. The researchers concluded that removing the parking minimum caused 98 percent of the reduction in parking spaces, while imposing the maximum caused only two percent of the reduction. Removing the minimum was far more important than imposing a maximum.

"On-street parking is the most contested public land outside the Gaza Strip."

City Beautiful

Planning, Mapping, Cities, Snark, and Oxford Commas

What would a free market for parking look like? It'd look a lot like Japan.

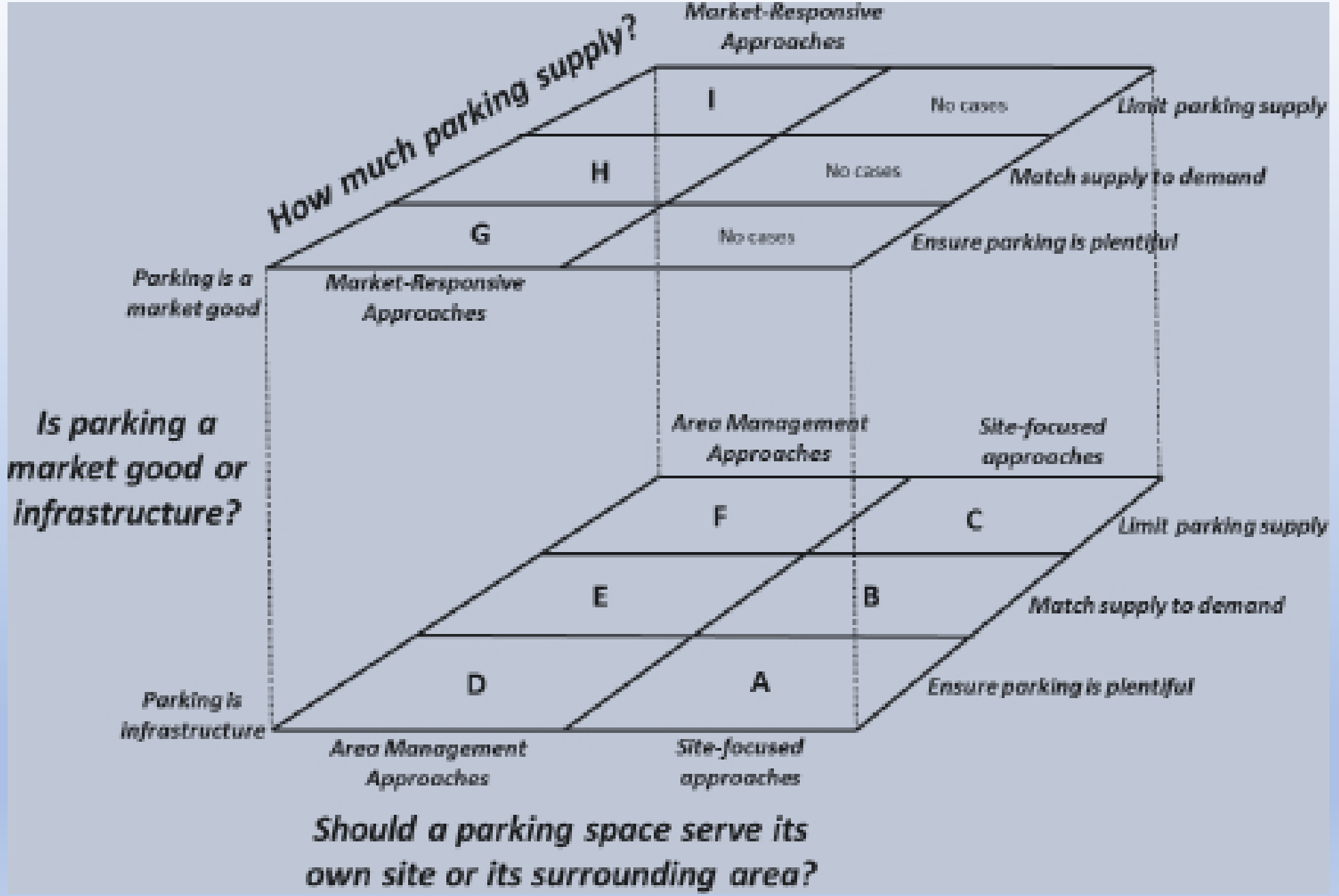
Stephen Davis | 21 September 2018

The week before last I wrote about why parking minimums are bad policy, and how easy it might be to end them. The excellent urban activist group Greater Auckland reposted it, and there were some interesting points raised in the comments section.

Today, I wanted to look by comparison at Japan, a country with a radically different approach to parking. Japanese policy, like New Zealand's, was not consciously designed in one go, and in part reflects an evolution over time. It has its own flaws, but does, however, represent a different philosophy that's worth examining.

In a nutshell

- In Japan, making sure that there is adequate parking is chiefly seen as a responsibility of the individual owner of the car, not property developers, businesses, or the government.
- Thanks to an urban form that makes walking easier, and strong competition from rail and subways, cars are seen by many city dwellers as a leisure item, rather than a necessity.
- In rural areas, cars are still a necessity, but the market model still provides both on-site and shared parking.
- Since there is little or no on-street parking, and illegal parking is relatively heavily policed, there is no such thing as an "overspill" of street parking.
- "Prices do the planning".


How much parking supply?
Market-Responsive Approaches
I
No cases
Limit parking supply
H
No cases
Match supply to demand
G
No cases
Ensure parking is plentiful
Parking is a market good
Market-Responsive Approaches
Is parking a market good or infrastructure?
Area Management Approaches
Site-focused approaches
F
C
Limit parking supply
E
B
Match supply to demand
D
A
Ensure parking is plentiful
Parking is infrastructure
Area Management Approaches
Site-focused approaches
Should a parking space serve its own site or its surrounding area?


השלכות תקן החניה החדש
בתל-אביב-יפו
על בנייה למגורים