

November 4, 2014

Mr. Peter Dame
City Manager
City of Grosse Pointe
17147 Maumee
Grosse Pointe, MI 48230

Re: First Hour Free Analysis
Carl Walker, Inc. Project #S1-2013-090

Dear Pete,

This letter summarizes our consulting assignment concerning the implementation of a "First Hour Free" rate structure for the parking system in The Village of Grosse Pointe. Some property owners and business owners in The Village have been advocating for a first increment free rate structure as a way to help draw more people to the downtown area. The "First Hour Free" rate structure is however a slight misnomer and is more accurately described as First Increment Free – The first increment could be 30 minutes, one hour, two hours, or other increments. "First Hour Free" rate structures have been successfully implemented in cities throughout North America.



Offering the first hour of parking (or first half hour) free of charge can become an effective marketing tool for The Village. However, care must be taken so that the financial impact of the first hour free rate structure does not adversely affect the municipal parking system. The purpose of our consulting services is to assist the City of Grosse Pointe in reaching an informed decision about the implementation of such a rate structure.

In general, the advantages of implementing a First Hour Free rate structure include: increasing the number of visitors to The Village by reducing the impact of paid parking, encouraging off-street parking over on-street parking, and reducing on-street congestion. The general disadvantages include lower revenues for the parking system, potentially shorter stays as visitors hurry off to avoid a parking fee, potential for some employees to scam the system by moving their vehicles to avoid a charge, encouraging some visitors to drive to another lot versus walking, and increased maintenance as revenue control equipment is used more frequently.

EXISTING PARKING UTILIZATION

To analyze the financial impacts of a First Hour free rate structure data concerning the existing utilization patterns and length of stays was obtained from the City's parking revenue control system for the gated lots. This data was supplemented with data collected by surveyors who collected occupancy and turnover data for the un-gated lots. Table 1, on the next page, summarizes the parking duration information collected via the revenue control system or the manual surveys for the off-street parking facilities. The parking revenue model used in the analysis is based on this data. The data indicates that a large majority of parkers stay for less than one hour. Approximately 80% of all off-street parkers stay one hour or less. The percentage of parkers staying one hour or less by individual lot is as follows:

- Lot 1 = 85%
- Lot 2 = 60%
- Lot 3 = 40%
- Lot 4 = 85%
- Lot 5 (structure) = 80%
- Lot 6 = 36%.

Clearly, providing a free first hour of parking without generating additional revenue would significantly hurt the financial health of the City's parking fund. Preserving the financial stability of the parking fund is important to maintain the surface lots and parking structure, fund upgrades and aesthetic improvements, replace equipment as it ages, and provide sufficient operating capital.

This analysis also considers the effect of regularly enforcing the adopted parking meter hours until 9:00 pm. Since 1998, the City has had parking meter hours posted from 9:00 am until 9:00 pm but ticketing has not regularly occurred after 6:00 pm. The utilization data that was collected for the on-street spaces from 6:00 pm to 9:00 pm on three days is summarized in Table 2.

Table 2 – Summary On-Street Turnover and Violation Survey

	Thursday 7/31/2014	Friday 8/1/2014	Saturday 8/2/2014
Number of Spaces	143	143	143
Vehicles Observed	525	442	388
Average Turnover	3.67	3.09	2.71
Average Length of Stay	0.87	0.96	0.91
Vehicles in Violation	293	258	238
Percent in Violation	55.81%	58.37%	61.34%

PARKING REVENUE MODEL

A spreadsheet model of parking revenue was developed using the occupancy, length of stay, and turnover rates for baseline transient parking revenues of \$372,000. The model estimates weekly revenue for each lot and includes adjustments for seasonality. The rates in the model are adjustable to estimate the effect of changing rates for each time increment.

STAKEHOLDER INPUT

Three open meetings were held to obtain input from stakeholders in The Village’s parking system. The first meeting presented the concept, advantages/disadvantages, and some preliminary rate structure alternatives. The property owners and business owners in attendance were very vocal about their support for a First Increment Free rate structure and the benefits they believe will occur. As previously noted, the majority of parkers currently stay for one hour or less; the financial impact of not charging for the first hour would be substantial. During the meeting it was also determined that raising parking rates would be preferable to establishing a property/business assessment to generate the funds needed to cover the lost revenue. However, the increase in parking rates should be as minimal as possible.

A second meeting with The Village parking system stakeholders was held to present preliminary first increment free options. During the meeting and in subsequent phone and email communications 23 different options were developed. The options considered and the preliminary estimates of the resulting revenue are summarized in Table 3 (on page 5).

The number of options was judged to be too numerous for a large group to evaluate and consider. A separate meeting with a core group of stake holders was held to discuss and reduce the options to a more manageable number. This core group narrowed the options to four viable choices; those final four options are presented later in this report. The third open meeting was held to present and discuss the four viable options. During the third open meeting the group was able the select a preferred option which is also presented later in this report.

FIRST INCREMENT FREE OPTIONS

Table 3 presents a summary of the options for a first increment free rate structure. The first increments in the options vary from ½ hour to two hours. Some of the options include other parking rate changes. Others include raising rates for parking beyond the first increment. All of the options consider the additional revenue that could be generated by extending enforcement hours to 9:00 pm for the metered on-street and off-street spaces. The options with rate changes also assume that the current free parking on Sundays will be eliminated as well as discontinuing the free parking currently provided during the holidays.

TABLE 3 – Summary of Preliminary Options

Option	1	2	3	4	5	6	7	8	9	10	11	11a
	First 1/2 Hour Free	First Hour Free	First Hour Free	First Hour Free	First Hour Free	First Hour Free	First Hour Free	First 2 Hours Free	First 2 Hours Free	Reverse Rate Structure	First Hour Free	First Hour Free
Locations	All Locations	All Locations	All Locations	Lots 1 & 4 Not Included	Lot 5 Not Included	Lots 1 & 5 Not Included	Lots 1, 5 & 6 Not Included	All Locations	Lots 1 & 5 Not Included	All Locations	All Locations	Lot 4 Not Included
Rates	No Change	No Change	All Rates Double	No Change	No Change	No Change	No Change	No Change	No Change	1st 4 Hrs \$.25 / Hr. After 4 hrs \$.25 / 30 mins.	\$.80 / Hr. Max= \$8 Fees Charged 365 days	\$.80 / Hr. Max= \$8 Fees Charged 365 days
Change in Revenue	\$ (180,000)	\$ (253,000)	\$ (135,000)	\$ (163,000)	\$ (139,000)	\$ (89,000)	\$ (85,000)	\$ (305,000)	\$ (117,000)	\$ (131,000)	\$ (124,000)	\$ (92,000)
Extended Enforcement Revenue Increase	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000
Net Change	\$ (53,000)	\$ (126,000)	\$ (8,000)	\$ (36,000)	\$ (12,000)	\$ 38,000	\$ 42,000	\$ (178,000)	\$ 10,000	\$ (4,000)	\$ 3,000	\$ 35,000

Option	12	12a	13	14	15	16	17	18	19	20	21
	First 2 Hours Free	First 2 Hours Free	First Hour Free	First Hour Free	First Hour Free	First Hour Free	First Hour Free	First Hour Free	First 2 Hours Free	First 2 Hours Free	First 2 Hours Free
Locations	All Locations	Lot 4 Not Included	All Locations W/Other Changes	Lot 1 Not Included W/Other Changes	Lot 1 & 4 Not Included W/Other Changes	W/Other Changes	Lot 1 Not Included W/Other Changes	Lot 1 & 4 Not Included W/Other Changes	W/Other Changes	Lot 1 Not Included W/Other Changes	Lot 1 & 4 Not Included W/Other Changes
Rates	\$.50 / 30 Mins. Max = \$8 Fees Charged 365 days	\$.50 / 30 Mins. Max = \$8 Fees Charged 365 days	\$.80 / Hr. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays	\$.80 / Hr. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays	\$.80 / Hr. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays	\$.50 / 30 Mins. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays	\$.50 / 30 Mins. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays	\$.50 / 30 Mins. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays	\$.50 / 30 Mins. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays	\$.50 / 30 Mins. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays	\$.50 / 30 Mins. Max= \$8 Fees Charged 365 days \$10 increase in Permits \$1 / Hr. on-street & Sundays
Change in Revenue	\$ (215,000)	\$ (171,000)	\$ (17,000)	\$ 37,000	\$ 69,000	\$ 10,000	\$ 63,000	\$ 90,000	\$ (108,000)	\$ (48,000)	\$ (4,000)
Extended Enforcement Revenue Increase	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000	\$ 127,000
Net Change	\$ (88,000)	\$ (44,000)	\$ 110,000	\$ 164,000	\$ 196,000	\$ 137,000	\$ 190,000	\$ 217,000	\$ 19,000	\$ 79,000	\$ 123,000

- Lot 1 = 'Kroger' Lot - Metered
- Lot 2 = Lot behind Peets - Gated
- Lot 3 = 'Neighborhood Club' Lot - Gated
- Lot 4 = Lot behind CVS - Metered
- Lot 5 = Parking Structure - Gated
- Lot 6 = Lot behind City Kitchen - Metered

Table 4 presents the four options that were selected and presented to the larger stakeholder group. Options 1 and 2 are both first hour free scenarios; Options 3 and 4 are first two hours free scenarios. The estimated net annual increase in revenue ranges from \$46,000 in Option 4 to \$186,000 in Option 1. Option 2 outlined in red is the consensus choice of the larger stakeholder group attending the third input session. The net gain in annual revenue is estimated at about \$108,000.

TABLE 4 – Final Four Options

Option 1 - First Hour Free

- Metered lots (1&4) remain at status quo
- Gated Lots at \$.50 per 30 minutes
Daily Maximum at \$8.00
Fees charged 365 days per year
- No Increase in permit rates
- On-street meters at \$1.00 per hour
Fees charged 365 days per year

Results

Off-Street Revenue	\$355,000
On-Street Revenue	\$76,000
Evening Meter Increase	\$55,000
Evening Fine Increase	<u>\$72,000</u>
Total	\$558,000

Baseline Revenue	\$372,000
Net Increase	\$186,000

Option 3 - First Two Hours Free

- Metered lots (1&4) remain at status quo
- Gated Lots at \$.50 per 30 minutes
Daily Maximum at \$8.00
Fees charged 365 days per year
- No Increase in permit rates
- On-street meters at \$1.00 per hour
Fees charged 365 days per year

Results

Off-Street Revenue	\$261,000
On-Street Revenue	\$76,000
Evening Meter Increase	\$55,000
Evening Fine Increase	<u>\$72,000</u>
Total	\$464,000

Baseline Revenue	\$372,000
Net Increase	\$92,000

Option 2 - First Hour Free

- Metered lots (1&4) remain at status quo
- Gated Lots at \$.50 per hour
Daily Maximum at \$8.00
Fees charged 365 days per year
- No Increase in permit rates
- On-street meters at \$1.00 per hour
Fees charged 365 days per year

Results

Off-Street Revenue	\$277,000
On-Street Revenue	\$76,000
Evening Meter Increase	\$55,000
Evening Fine Increase	<u>\$72,000</u>
Total	\$480,000

Baseline Revenue	\$372,000
Net Increase	\$108,000

Option 4 - First Two Hours Free

- Metered lots (1&4) remain at status quo
- Gated Lots at \$.50 per hour
Daily Maximum at \$8.00
Fees charged 365 days per year
- No Increase in permit rates
- On-street meters at \$1.00 per hour
Fees charged 365 days per year

Results

Off-Street Revenue	\$215,000
On-Street Revenue	\$76,000
Evening Meter Increase	\$55,000
Evening Fine Increase	<u>\$72,000</u>
Total	\$418,000

Baseline Revenue	\$372,000
Net Increase	\$46,000

Note: Metered Lots are 1 and 4. Gated Lots are 2,3,5, (and 6)

All four options include an estimated \$127,000 resulting from extending regular ticketing of the existing parking meter hours between 6:00 pm and 9:00 pm. Survey data collected for this study indicated that 40% of the parking meter parkers comply with the posted hours. This estimate was developed by starting with the data presented in Table 2 and applying the following assumptions:

- 70% of the current vehicles in violation of the meters would pay the \$1.00 per hour rate
- 33% of the vehicles that remain in violation of the meters would be issued citations
- 70% of the citations issued would be paid
- 80% of the collected citations would be paid within 10 days (\$10 fine)
- 20% of the collected citations would be paid after 10 days (\$20 fine)

The extended enforcement program outlined above requires an aggressive enforcement effort and may not be realistic at this time in Grosse Pointe. Additional enforcement personnel might be required to cover the additional hours and enforcement on Sundays. The aggressive enforcement might also cause some visitors to avoid The Village entirely. This of course would undermine the main goal of implementing the First Hour Free rate structure. If the increased revenue from the evening fines and meter collections is excluded, the estimated net gain of \$108,000 for Option 2 becomes a net loss of \$19,000. Alternatively, if Sundays are left completely free of charge, the estimated net gain of \$108,000 becomes a gain of \$32,000.

SUMMARY

We agree with the stakeholders that Option 2 is the best choice among the final four potential options. It strikes the best balance between protecting parking system finances and providing a customer friendly rate structure. The same rate structure is applied evenly across all of the gated off-street lots, simplifying the choice of parking locations for visitor and customers. It also maintains a cost differential between the most convenient spaces (on-street) and the less convenient spaces (off-street). Providing two hours free could incentivize some employees to move their vehicles every two hours to avoid all parking fees. Option 2 also provides more flexibility for future conditions. If in the future the rate structure proves very successful the first increment could be easily extended to two hours, or to extend the first hour free to other surface lots if they are converted from single space meters. However, it would be more difficult, from a public relations standpoint, to revert from a two hour free increment to a one hour free increment, if projections prove too optimistic.

Very truly yours,
Carl Walker, Inc.



William L. Surna
Sr. Project Manager