

## Tilley Award Submission 2004

**Title:** Tackling Forecourt Crime

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**Force:** Metropolitan Police Service

**Endorsing Officers:** Chief Supt. Mark Simmons  
Borough Commander Tower Hamlets

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Dear Sir/Madam.

**Subject: Tilley Award 2004**

I understand that PC Ruari Robertson is to submit his report on the excellent crime reduction partnership scheme, in Tower Hamlets, for the above award.

It is with pleasure that I write to support his submission, in that it exemplifies the true tenets of partnership working and clearly demonstrates the cost effect benefits to be gained by all concerned, from such a well-organised scheme.

It would be beneficial to many police forces if they were to follow such a scheme, as it would deliver operational cost savings, whilst addressing serious criminal activity.

I commend the report for your favourable consideration.

Yours faithfully

Kevin Eastwood  
Executive Director  
British Oil Security Syndicate.

## Tackling Forecourt Crime

### Summary

Since June 2002, Tower Hamlets have participated in a scheme, supported by BOSS<sup>1</sup> and TPHQ<sup>2</sup>, aimed at reducing forecourt crime. In February 2003, problem-solving methodology was implemented to tackle the issues experienced by one particular forecourt.

Orchard Wharf Service Station was identified as having a higher incidence rate compared with other forecourts. An increase of 58% was experienced in the first quarter of 2003 compared with 2002.

Research conducted, using data submitted to Police by the forecourt and into other retail markets, indicated that the problem was:

*Competitive market forces require Service Station retailers to allow motorists to fill their vehicles with fuel before payment is made, when no systems are in place to prevent drivers from making off without payment.*

Other issues highlighted were the lack of CCTV cover on the forecourt, and, difficulties experienced due to the current layout.

Esso counteracted this deficiency and installed a new digital system. This new system has provided staff with an effective tool in combating crime on the forecourt.

An aim was set to achieve a reduction of 30% in the number of incidents when comparing 1<sup>st</sup> April 2003-31<sup>st</sup> December 2003 with 1<sup>st</sup> April 2002-31<sup>st</sup> December 2002.

Analysis has been used to develop interventions that provide an achievable and sustainable reduction in the levels of crime, with staff encouraged to participate in making a safer working environment. This has been in the form of a 'forecourt patrol', which provides an effective means of natural surveillance. This has provided benefits to the forecourt whereby many drive-offs have been prevented due to the staff presence.

Another successful intervention has been the circulation of repeat offenders to all forecourts within the borough. The dedicated officer employed in a 'Forecourt Crime Unit' carries this out. To date, of all the vehicles circulated, less than 15% have further offended.

Other interventions employed include the deployment of ANPR<sup>3</sup> equipment, use of pre-payment during specified periods and letters to the keepers of vehicles identified. These have achieved a small degree of success in the short term.

The close and effective partnership established between Police, the forecourt retailer and the parent oil company, has had a significant impact, whereby the original aim was exceeded and a total reduction of 33.5% was recorded. This has reflected on other forecourts where the same tactics have been employed and similar reductions have been experienced.

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<sup>1</sup> BOSS-British Oil Security Syndicate

<sup>2</sup> TPHQ-Territorial Policing headquarters (A dept. within MPS)

<sup>3</sup> ANPR-Automatic Number Plate Recognition

## Tackling Forecourt Crime

By

P.C. Ruari Robertson

### Introduction

Over recent years there have been several changes in policy, at both local and national levels, regarding the reporting and investigation of incidents of **Making off Without Payment** from petrol forecourts. All changes have been designed around crime management principles in an effort to reduce the number of incidents reported by Police.

With the implementation of the *National Policing Model* and *Ethical Reporting* under the *National Crime Recording Standards*, Police services throughout the UK have seen increases in the number of reported incidents.

In June 2002, the Metropolitan Police Service entered into partnership with the British Oil Security Syndicate (BOSS), with the goal of actively targeting and reducing forecourt crime. This came under the portfolio of Territorial Policing Headquarters (TPHQ), who monitors the progress of the scheme in conjunction with BOSS.

Formed in 1991 by the oil industry, BOSS is steered and funded by the leading petroleum companies. BP, Chevron Texaco, Esso, Shell and TotalFinaElf are members. The Petrol Retailers Association (PRA), the United Kingdom Petroleum Industry Association (UKPIA) and the Association of Chief Police Officers (ACPO) support it.

Five Borough Operational Command Units (BOCU) were selected to pilot the scheme. These are:

- Brent
- Ealing
- Tower Hamlets
- Newham
- Barking & Dagenham

The main aims of the pilot project were defined as:

- To reduce crime
- To make forecourts safer for customers and staff
- To provide intelligence
- To deny criminals the use of the highway

In the first six months of the project, Brent and Ealing recorded reductions in the number of incidents, whereas Newham, Tower Hamlets and Barking & Dagenham were recording increases.

In February 2003, Tower Hamlets adopted a more positive stance in tackling this particular problem. Research was conducted into two forecourts that had been identified as the worst offenders. A report outlining the research and issues raised was delivered to TPHQ and BOSS. The framework of the report, based on the principles of Problem Solving, altered the thinking behind the schemes mechanics and a new structure was adopted.

From this point forward, Tower Hamlets became the focus of attention as it took a lead role in tackling forecourt crime.

Orchard Wharf Service Station was identified as having a higher rate of incidents of making off without payment, compared with other forecourts. A problem solving initiative was produced to tackle the level of crime experienced by this site.

## What is the Demand?

This can be described in two ways:

- Nature
- Significance

*Nature:* this can be defined simply as a reduction in the incidences of Making off Without Payment at Orchard Wharf Service Station.

*Significance:* in examining previous protocols, it was found that the amount of Police time spent dealing with such incidents was considerable. Prior to the implementation of BOSS and the principles behind Telephone Reporting, such incidents would have required the attendance of a Police Officer. In most cases the cashier witnessing the offence was unavailable, and when incidents occurred during the night, CCTV could not be viewed until the following day.

With the advent of Telephone Reporting, the majority of these incidents were reported 'over the phone', however this still occupied considerable time, as the reporting officer would still have to speak with the appropriate cashier to obtain all the relevant details.

Since the introduction of the BOSS scheme, a pro-forma has been introduced, which not only reduces the amount of Police time used, but that of the service station employee also. This reduction has allowed for officers to be more pro-actively tasked to areas that require the need.

Tower Hamlets have progressed and developed further this practice. Changes have been made to the original pro-forma to improve the quality of information. Packs have also been designed in relation to CCTV footage, thus eliminating the need for officers to attend the forecourt.

The reduction in man-hours now spent dealing with such incidents, for both Police and forecourt staff has proved quite significant.

With the above principles in mind stakeholders were identified that would have a potential influence over the issue. These were identified as:

- Metropolitan Police Service
- British Oil Security Syndicate
- Esso
- Retail Manager, Orchard Wharf
- Customs & Excise

A Problem Solving Meeting was called, with representatives from each of the stakeholders attending. The purpose of the meeting being:

- Identify the problem
- Set an aim
- Propose options
- Develop good practice

Customs & Excise were initially identified as a potential stakeholder in relation to the Duty paid on sales of petroleum. However Esso clarified this position, whereby all duty is paid as the product leaves the refinery and not when delivered from the pumps on the forecourt.

## What is the Problem?

Orchard Wharf Service Station is operated by Esso. The land and equipment is owned by the Company, however the Retail Manager is engaged by contract and is responsible for employing his own staff. The retail manager also has a degree of control over what goods are sold in the forecourt shop, from which a percentage of any profit is paid to the parent company.

The forecourt occupies a large plot of land on the northeast side of the Leamouth Roundabout, London E14, which is served by three major roads. These are the East India Dock Road (A13), Aspen Way (A1206) and the Lower Lea Crossing. The main entrance and exit are situated on the Bow Creek side of the forecourt, with a further entrance situated on the Leamouth Road side.

The forecourt operates 8 pumps, delivering 4 Star LRP, Unleaded, Super Unleaded and Diesel fuel. The forecourt shop is fitted with a cash machine and sells a variety of goods including fresh products and pastries. In terms of volume, the forecourt dispenses, on average, the equivalent of a full tanker's worth of fuel per day. This is probably Esso's busiest forecourt in the South-East.

For the first quarter of 2003, this forecourt reported 82 incidents of making off without payment, compared to 52 for the same period in 2002. This equated to a **58%** increase in the number of incidents reported to Police.

Based on the initial research conducted, over a four month period (Nov'02-Feb'03), two perceived problems became apparent. These were identified as:

1. Making off without payment for fuel obtained.
2. Theft-employee by staff making false reports.

After consultation with Esso, an internal audit was conducted based on the information supplied. The results painted a different picture, as it became apparent that shift supervisors were taking responsibility for reporting incidents, whether they had witnessed the event or not. From these findings Point 2 was discarded.

Further research was then conducted with focus on retail markets where goods/services are supplied with payment made after the goods/services have been obtained, e.g., licensed taxi's/mini-cabs, restaurants, car-parks. In all cases it was found that some form of barrier existed, preventing would-be offenders from making off without paying. When applied to forecourts this was not so, with motor vehicles having unrestricted access to the fuel pumps.

This revealed that the actual problem could be defined as:

*Competitive market forces require Service Station retailers to allow motorists to fill their vehicles with fuel before payment is made, when no systems are in place to prevent drivers from making off without payment.*

This problem will continue to exist, as competition between oil companies is high and profit margins are low. There is an air of reluctance to take any radical steps with the perception that forecourts will lose potential business to their rival operators.

A possible way of combating this would be a Government directive, similar to that adopted in parts of the USA, where as any tourist on a fly/drive holiday will have experienced, fuel has to be paid for prior to its delivery.

In conducting the initial research, there were no other significant problems identified.

## The Aim

This was based on the fundamental aim of the entire scheme, i.e., to reduce crime on petrol station forecourts.

Prior to determining the aim, the Impact Scale was used to determine the level of response. This scale is defined as:

- Eliminating a problem; or
- Reducing a problem by x%; or
- Reducing the seriousness of a problem; or
- Dealing with a problem more efficiently; or
- Persuading another organisation to take the lead

In considering our partners, it was determined that to eliminate the problem would not be a viable objective. This would rely on the forecourt adopting a pre-payment method on a 24/7 basis. Within the industry, this type of action is deemed as a negative approach and would have a detrimental effect on the industry at all levels. The factors behind this are:

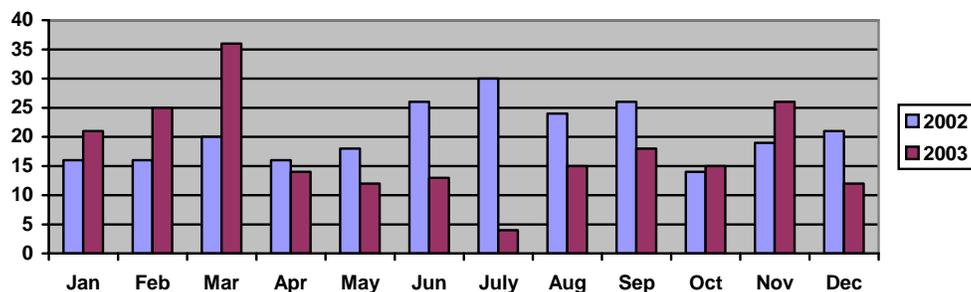
- The potentially high costs of replacing existing equipment in order to comply with Weights & Measures
- Potential losses, incurred by retailers, in the sale of goods from forecourt shops
- A general consensus that consumers will no longer wish to purchase goods from forecourt shops

It was agreed that the next level of the impact scale was achievable and sustainable.

After further consultation, an aim was set to reduce the total number of reported incidents by **30%** when comparing 1<sup>st</sup> April 2003 to 31<sup>st</sup> December 2003 against 1<sup>st</sup> April 2002 to 31<sup>st</sup> December 2002.

A reduction of **33.5%** was recorded for the specified period.

The graph, depicted below, provides a picture of the level of crime experienced by this forecourt, when comparing 2002 with 2003.



This clearly illustrates how the levels of crime rose significantly during the first quarter of the year, and, the subsequent reduction in incidents, except October and November, for the rest of the year.

Of significance were the months of June, July and December where reductions of **50%**, **87%** and **43%** were recorded respectively.

The work carried out also had a positive impact on other forecourts in Tower Hamlets, where a reduction of **28%** has been recorded for the same period (Apr-Dec).

## How was this achieved?

In conducting the initial research, several issues became apparent that required immediate action. These centred on the forecourt itself. The main points raised were:

- When are these offences taking place
- What pumps are used
- What is the CCTV coverage on the forecourt
- What vision do staff have of the forecourt
- What is the rationale behind the layout of the forecourt

An on-site survey highlighted that the vision of forecourt staff operating the point-of-sale was hindered due to the layout. Instead of vehicles facing the point-of sale when entering the forecourt, it was found that they were at a 90 degree angle. This allowed for vehicles to be obscured from view by the positioning of the stanchions. It was recognised that to enforce any changes would be a costly measure and would not be proportional to the need in reducing the problem.

Further investigation into the CCTV system fitted found that there was only partial coverage of the forecourt with Pumps 1 and 2 having no coverage at all. This was of paramount concern. Esso recognised the issue and immediately moved to counteract this. In April 2003 a new digital CCTV system was installed, providing full coverage of all pumps from either direction and included coverage of the entrances and exit. As a further deterrent, all the cameras were painted yellow to make them more visible to forecourt users.

Since the installation of the new system, forecourt staff have been able to provide useful information and intelligence on offending vehicles and their users.

Further analysis, conducted on a month-by-month basis has provided statistics in relation to the day, time and pump used in committing these offences.

Using this information, strategies have been developed to combat the effects. These figures have varied for each month, whereby any strategies employed have been re-evaluated to tackle the changing trends, e.g., the closure of pumps at designated times.

These have been short-term measures and were designed to have a direct impact for that month and did not necessarily prevent offenders from committing offences.

The overall findings of the research provided a clear picture of how we should approach the problem from a wider perspective in achieving a sustainable reduction in the long-term, and taking into account the needs of our partners.

Using the information obtained from the analysis, options and interventions were designed for encompassing the principles of the problem analysis triangle, i.e., [Victim](#), [Offender](#) and [Location](#).

The options listed were:

### *Victim*

- Introduction of pre-payment methods
- Introduction of forecourt patrol by staff
- Pump attendant service
- Letter to registered keeper of offending vehicles
- Collection of car keys prior to fuel authorisation
- Circulation of repeat offenders to forecourt staff
- BOSS Form 3 pro-forma adoption

### *Offender*

- Active identification and prosecution of repeat offenders
- ANPR driven operations
- Circulation of repeat offenders to local response officers and TfL<sup>1</sup>

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<sup>1</sup> TfL: Transport for London

### *Location*

- BOSS point-of-sale stationary display
- Introduction of a barrier system at all entrances/exit
- Thumb scan on stanchions prior to fuel authorisation
- Change forecourt layout to 'starting grid' formation
- Closure of Leamouth Road entrance
- ANPR installation

In discussing the viability of the above options, the Pareto principle was applied to determine whether the intervention would prove effective without having an adverse effect elsewhere.

## **Evaluation of Options**

### *Victim*

*Pre-payment:* this has been used as an effective tool in combating crime. This method was adopted during night-time periods usually between 2200 hours and 0500 hours, when the forecourt is quieter and was at the discretion of the staff. This itself posed problems, as confrontations would arise between varying customers being required to make payment first. The retail manager also experienced pressure from within the company not to continue this method on a long-term basis. As stated earlier, the company belief being that this method had a negative impact in inducing consumers to use the forecourt.

*Forecourt patrol:* the principle of this method is for employees to conduct their daily duties on the forecourt during busy periods. This provides an extra 'presence' on the forecourt and an effective means of natural surveillance. This, coupled with good quality images from the CCTV system, allows staff to work together when either at the point-of-sale or on the forecourt.

The retail manager has received comments from consumers who have been happy to see staff on the forecourt. Furthermore the manager has stated that several potential 'drive-offs' have been prevented whilst staff have been patrolling the forecourt.

This has proved to be the most successful intervention employed, coupled with changes to the nearby road infrastructure, making it a more difficult environment for the would-be offender.

*Pump Attendant Service:* this method was not adopted due to Health & Safety reasons. Esso and the retail manager voiced concerns that staff would be placed at an undue risk due to the volume of traffic that use the forecourt and the increased congestion that would be caused.

*Letter to registered keeper:* this achieved a small degree of success, but on the whole was found to be ineffective in combating forecourt crime. Several problems were encountered as a heavy reliance is placed upon the accuracy of data held on the Police National Computer and DVLA database.

In most cases, letters were returned stating that the person no longer owned the vehicle, were not known at the address or had never owned a vehicle. This is not an uncommon problem experienced by all agencies using this database.

Recent changes in law regarding vehicle excise licence may improve the quality of the data, but until more radical reform is made with regard to the ownership of motor vehicles, many will remain unregistered and the problems will continue to exist.

*Collection of car keys:* this option was not considered further as there was a potential for staff to be placed in a confrontational situation with customers. It was also felt that many customers would feel victimised by having to relinquish keys, which would have the negative effect of turning customers away from the forecourt.

*Circulation of repeat offenders:* since March 2003, BOSS, in consultation with TPHQ, has produced posters listing the 5 worst offending vehicles for each borough on a monthly basis. These are known as 'hot registrations'. The posters are designed for display in high profile

positions that are visible to both staff and customers and are used in conjunction with existing point-of-sale stationary, also supplied by BOSS

The main purposes of the posters are:

- To inform consumers that the forecourt is a member of the scheme
- To inform repeat offenders that staff will not authorise fuel
- To persuade consumers to pass intelligence to CrimeStoppers

As an added incentive a small reward is available to any forecourt staff member providing intelligence on any of the vehicles highlighted, which leads to a conviction. In addition authority has been granted for participating forecourts to dial 999 whenever one of these 'hot registration' vehicles enters the forecourt.

This method has been further enhanced and is one of the main functions of the Borough's Forecourt Crime Unit.

As part of its function, the dedicated officer employed provides information to all the forecourts relating to repeat offenders, stolen vehicles and vehicles reporting VRM<sup>2</sup> plates stolen, that come to notice as a result of forecourt crime. This information is also disseminated to local response team officers via a 'Daily Briefing' PowerPoint presentation. It is also available to officers operating within TfL.

This method has seen significant success, which has attributed to the reduction in crime on the forecourt.

To date 47 vehicles have been circulated, of which only 5 further offended.

*Boss Form 3*: this form was originally designed, in conjunction with TPHQ, to provide forecourts with a simple method of reporting incidents of making off without payment. The main principle being that the necessity for Police to attend was removed. A completed pro-forma is faxed to the local station where the details are recorded and the relevant crime number is faxed back to the forecourt.

During the year it became apparent that revisions to the form were required. These centred on the use of CCTV in providing any relevant information. In addition, a guidance note was produced enabling staff to have a clear mindset of the information required by Police. Since the revisions were introduced the quality of the information received has greatly increased.

#### *Offender*

*Active identification of offenders*: the Borough Forecourt Crime Unit carries out this function. At present the unit depends on the ability of officers to stop offending vehicles and ascertaining the occupants details. This is an area that is currently subject to review to ascertain more efficient and timely methods.

*ANPR<sup>3</sup>*: the use of static and mobile ANPR has been widely publicised. As technology advances, the scope of such devices has widened. It is now possible to install such software into a camera enabled mobile phone. Indeed, the Home Office have recognised the effectiveness of such systems and commissioned a national survey to investigate the deployment of mobile teams.

In Milton Keynes, static ANPR has been installed on nearly all forecourts, resulting in a substantial reduction in incidents of making off without payment.

BOSS have acknowledged the effectiveness of ANPR and purchased 6 laptops installed with the relevant software applications. These are available, free of charge, to any Police Service currently working in partnership with BOSS, for deployment on or near petrol forecourts.

ANPR has been deployed at Orchard Wharf and in the short time used 17 activations were recorded resulting in 3 arrests. Further deployments were envisaged, but due to manpower constraints, were not achievable.

The benefits of such a system are wide ranging, as shown by the Milton Keynes model.

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<sup>2</sup> VRM: Vehicle Registration Mark

<sup>3</sup> ANPR: Automatic Number Plate Recognition

Further research is to be conducted into the viability of deploying ANPR on a semi-permanent basis on petrol forecourts within the scheme.

### *Location*

*Point-of-sale stationary:* this currently consists of large posters displayed at the entrance and exit, notifying drivers of the requirement to pay for any fuel obtained. A smaller version is also displayed on the pump stanchion. Initially these were replenished when a forecourt requested replacements. It was apparent that the stationary became weatherworn earlier than anticipated thus portraying a poor image. After consultation with the forecourt it was decided that all stationary would be replenished monthly and would accompany the newsletter and hot-registration poster.

BOSS have recognised the problems and when current stocks have depleted, further consultation will take place to redesign the current stationary.

*Barriers:* the installation of a controlled barrier system was seen as a positive measure in preventing potential offenders, however concerns were raised by Esso and the retail manager in relation to the costs involved and the potential congestion on the forecourt, which may or may not place consumers and staff at risk. Exit strategies in the event of a tanker emergency also had to be considered if the system were defective. Bearing these in mind it was decided that this intervention would not be considered at this stage.

*Thumb scan:* this was another method that, in the future would prove to be an effective measure, however in the current climate, the enormous costs involved in implementing and monitoring such a system far outweighed the benefits.

*Change of layout:* as mentioned earlier the current layout of the forecourt has created its own problems. Esso have recognised this and although no immediate change is in mind, the company have not expressed an unwillingness to adopt such a change in the future.

*Leamouth Road entrance:* during the analysis stage it was found that due to the volume of traffic using the forecourt, congestion was caused with vehicles entering the forecourt in two directions. It was also apparent that a number of offenders were using this entrance as a means of exiting the forecourt in order to evade detection. Esso acknowledged these findings and in normal circumstances would have readily closed this entrance, however the main purpose of this entrance forms part of the company emergency tanker evacuation strategy. Therefore the closure of this entrance could have a significant impact on any tanker emergency.

### **Conclusion**

The overall success of the scheme has been greatly dependant upon the full co-operation of all the agencies involved. BOSS provided the initial framework of the scheme and over recent months this has been enhanced due to the activities that have taken place, and the implementation of new policies.

The benefits experienced by the partners have been positive. Orchard Wharf has experienced a substantial reduction in the number of incidents that in turn has reduced the financial loss experienced by both the retailer and parent company. The intelligence now gathered is used more effectively, allowing Police and the retailers to adopt a more pro-active stance in tackling repeat offenders. These benefits have reflected within other forecourts on the borough, where many of the interventions have been employed and has resulted in an overall reduction of 42% in December '03 and 44% in January '04 when compared with the previous year.

As focus has mainly been directed at Tower Hamlets, the working relationship that has been established has grown immensely. At the outset, retailers and Police were sceptical and confidence was low. During its development this confidence has grown to a degree whereby retailers are now actively participating and are keen to adopt new strategies.

There is still scepticism within the Police, and many still perceive that this type of crime is purely a civil matter, with Police acting as 'debt collectors'. This perception is changing rapidly as the scheme widens to other Boroughs and the link is recognised between prolific offenders and other criminal activity.

Maintaining this confidence is of paramount importance for any future development. As stated earlier, all interventions that have been employed were assessed on their ability to be achievable, and more importantly, sustainable. This is the keystone to the future success of the scheme within London as a whole and is a giant step towards incorporating an active partnership within London Boroughs.

## Appendices

**Appendix A:** Metropolitan Police Service Form 302- this is the current form used within the service for all problem-solving initiatives.

**Appendix B:** An example of the monthly analysis conducted in relation to Orchard Wharf Service Station



**METROPOLITAN  
POLICE**

*Working for a safer London*

Form 302

URN: PSP

03

03

HT

### PROBLEM SOLVING PROCESS

Administration			
Department / Unit	Tower Hamlets BOCU		
Person Leading	Name	Pay / Warrant Number	Telephone Number(s)
	Pc604HT Robertson	195749	54145
Deputy	Ps29HT Hart	189122	54521
Date Started	20/02/2003	Last Update	03/01/04

#### 1 The Demand

- 1.1 What is the demand?  
**Nature:** A reduction of 20% in incidences of Making off without Payment at Orchard Wharf Service Station.  
**Significance:** In 2002, Orchard Wharf reported 246 incidents of making off without payment. In the first quarter of 2003, 82 incidents have been reported, which is reflected as a 58% increase compared with the first quarter of 2002. On average Police spend approximately 30 minutes inputting 1 incident into the CRIS system. This equates to 123 man-hours for 2002. Furthermore Police would then need to attend the forecourt to obtain CCTV and statements. This places an extra burden on Police and forecourt staff, who must be released from other duties to provide any necessary information.
- 1.2 Where is the demand coming from?  
 Kevin Eastwood, Chief Executive, British Oil Security Syndicate  
 Dave Middlemiss, Territory Manager, ExxonMobil  
 Chief Inspector (Operations) Richard Woolford, Tower Hamlets BOCU  
 A/DI Lance St Clair, TPHQ Investigation Strand  
 Pc Ruari Robertson, Tower Hamlets BOCU
- 1.3 Who are our identified partners?  
 British Oil Security Syndicate  
 ExxonMobil

#### 2 The Problem

- 2.1 What is the problem?  
**Perceived Problem:** Making-Off without payment for petrol from Orchard Wharf Service Station. (20/02/03)  
**Actual Problem:** Competitive market forces require Service Station Retailers to allow motorists to fill their vehicles with fuel before payment, when no systems are in place to prevent drivers from making-off without payment. (21/08/03)

#### 3 The Aim

- 3.1 What is it you want to achieve?

By 31<sup>st</sup> December 2003, the total number of reported recordable offences at this Service Station will be reduced by 30% when comparing 1<sup>st</sup> April 2003 to 31<sup>st</sup> December 2003 against 1<sup>st</sup> April 2002 to 31<sup>st</sup> December 2002.

<b>4 Authorisation</b>		
<b>Unit Manager</b>		
Have checks been made to ensure that no one else is working on this problem? Yes		
Have appropriate background checks been completed (e.g. INFOS)? Yes		
I am the line manager <input checked="" type="checkbox"/> I do <input type="checkbox"/> do not support the need for action to resolve this problem.		
My reasons are: Over the last three months at least 28 hours of Police time has been devoted to the reporting of making off without payment from this service station. This service station participates in the BOSS/MPS five Borough campaign.		
I recommend an evaluation every:		
Name Guy Wade Insp.	Pay / Warrant No.	Date 20/02/2003
<b>Problem Solving Advisor's Comments</b>		
Name Dave Shipp	Pay / Warrant No. 04/177902	Date 17/07/03

<b>5 Researching the Problem</b>	
<b>5.1 Victim(s)</b>	<ol style="list-style-type: none"> <li>1. How much Police time is being used.</li> <li>2. Do the Local Authority experience a problem with offender vehicles re parking</li> <li>3. Do Customs &amp; Excise have any involvement or revenue loss?</li> </ol>
<b>5.2 Offender(s)</b>	<ol style="list-style-type: none"> <li>1. Can repeat offenders be singled out for this site</li> <li>2. When are these offences taking place</li> <li>3. When are these offences not taking place</li> <li>4. What are the types of vehicles being used</li> <li>5. Is there a trend re point of entry and exit to the forecourt</li> <li>6. Have any offenders been arrested</li> <li>7. Is there a trend in the offender's behaviour regarding making off without payment.</li> <li>8. Have any offending vehicles been abandoned on the Borough or involved in other crime.</li> </ol>
<b>5.3 Location(s)</b>	<ol style="list-style-type: none"> <li>1. What pumps are used</li> <li>2. What pumps are not used</li> <li>3. Where are the entrances and exits</li> <li>4. What is the CCTV coverage on the forecourt</li> <li>5. What vision do the staff have of the forecourt</li> <li>6. What is the rationale behind the layout of the forecourt</li> <li>7. Would the company be willing to change the layout</li> <li>8. What type of fuel is available at each pump</li> <li>9. How many staff are on duty during a 24-hour period.</li> <li>10. Have offenders been displaced to neighbouring forecourts.</li> <li>11. Are there any moveable obstructions on the forecourt</li> <li>12. Where are the nearest service stations to this site?</li> </ol>

## 6 Analysis

### 6.1 *Victim(s) profile*

The following documents can be accessed via the sub-folder titled 'REPORTS' within SE SECTOR:

Orchard Wharf report Nov '02-Feb '03  
 Orchard Wharf spreadsheet Nov '02-Feb '02  
 Orchard Wharf report Mar '03  
 Orchard Wharf spreadsheet Mar '03  
 Orchard Wharf report Apr '03  
 Orchard Wharf spreadsheet Apr '03  
 Orchard Wharf report May '03  
 Orchard Wharf spreadsheet May '03  
 Orchard Wharf report June '03  
 Orchard Wharf spreadsheet June '03  
 Orchard Wharf report July '03  
 Orchard Wharf report August '03  
 Orchard Wharf spreadsheet August '03  
 Orchard Wharf report September '03  
 Orchard Wharf spreadsheet September '03  
 Orchard wharf report October 2003  
 Orchard Wharf spreadsheet October 2003  
 Orchard Wharf report November 2003  
 Orchard Wharf spreadsheet November 2003  
 Orchard Wharf report December 2003  
 Orchard Wharf spreadsheet December 2003

Customs & Excise have no active involvement. The parent Oil Company pays all Duties when the product leaves the refinery.

### 6.2 *Offender(s) profile*

Identity of the offenders remains unknown, as no arrests for making-off without payment, from Orchard Wharf Service Station, have been effected.

Analysis has identified that the majority of vehicles concerned tend to be over 8 years old and are unregistered with DVLA.

Repeat offender's account for less than 10% of the total number of reported offences.

Information contained in the fax pro-forma indicates that the majority of offenders enter the site from either the Riverside entrance or Leamouth Road entrance. On obtaining fuel these offenders then follow the proscribed traffic route and use the designated exit from the forecourt.

A very small, but unknown percentage of offenders prepare their exit by reversing onto the pumps before leaving by their point of entry.

### 6.3 *Location(s) profile*

Orchard Wharf operated by ExxonMobil (Esso), is open on a 24-hour basis, 365 days a year, and comprises 8 pumps delivering 4Star LRP, unleaded, super unleaded and diesel fuel. The forecourt shop sells a variety of goods including fresh pastries, teas and coffee making facilities.

An inadequate CCTV system is fitted to the forecourt with no coverage of Pumps 1 and 2.

The current layout of the forecourt is that of a box formation running parallel to the forecourt shop. Vehicles enter the forecourt from two entrances and leave by a

designated exit.

The view of cashiers from the forecourt shop, of vehicles entering and using pumps, is heavily restricted due to the current layout, whereby the pumps act as an obstruction to their view. The view of these vehicles is from a sideways perspective, instead of head on, making it difficult for offending vehicles to be identified.

*April 2003:* A new digital CCTV system has been installed providing complete coverage of all pumps in both directions, and the exit point. The cameras have been painted yellow to provide an extra visible presence.

*May 2003:* Changes to the road infrastructure between the Canning Town flyover and the junction with Abbot Road, E14 have increased the traffic flow along Leamouth Road. From the A13 to the A1261.

*July 2003:* Traffic lights have been introduced to the Leamouth Road roundabout, as a traffic management measure during the completion of works to the East India Tunnel. Consequently, traffic passing the forecourt is now held at a series of lights, causing queuing outside the forecourt. Therefore those who previously made off without payment from the forecourt would now be held at the lights increasing their chances of detection.

*November 2003:* The East India Tunnel has re-opened to two-way traffic. Traffic cones remain in place to forewarn motorists of the changes. This has had no immediate effect on the volume of traffic using the forecourt.

Refer to [Orchard Wharf PowerPoint presentation](#) for digital photographs of location, situated in 'REPORTS' sub-folder.

## 7 Problem Solving Session(s)

Problem solving meeting held on 21/08/03 at Bethnal Green Police Station to identify existing information and agree a response to this initiative. Refer to [REPORTS](#) sub-folder for minutes of this meeting.

*27<sup>th</sup> November 2003:* Meeting held at Bethnal Green Police Station with Mr. Rob Avery (Retailer) with two main discussion points:

1. The sudden increase in incidents at Orchard Wharf. Emphasis focussed on the use of staff to patrol the forecourt during busy periods.
2. The potential problems associated with the Christmas/New Year period with possible contingencies to combat any increase.

## 8 Options

### 8.1 Victim(s)

The introduction of pre-payment methods.

Introduction of a forecourt patrol by staff.

Pump attendant service.

Letter to registered keeper of offending vehicles with requirement to pay outstanding debt.

Collection of car keys prior to fuel authorisation.

Circulation of repeat offenders to forecourt staff.

BOSS Form 3 pro-forma adoption.

**8.2 Offender(s)**

Active identification and prosecution of repeat offenders.  
ANPR driven operations.  
Circulation of repeat offenders to local forecourts, response team officers and TfL.

**8.3 Location(s)**

BOSS Point-of-Sale stationery display.  
Introduction of a barrier system at all entrance/exits.  
Thumb scan on stanchions prior to fuel authorisation.  
Change forecourt layout from box formation to starting grid formation.  
Closure of Leamouth Road entrance.  
ANPR installation.

**9 Response****9.1 Victim(s)*****Pre Problem Solving Session:***

At the inception of the 5 Borough Scheme within the Metropolitan Police Service, set guidelines were laid down and agreed in determining the level of response. These were as follows:

- The CCTV system installed must be capable of:
  - (1) Providing a clear (playback) image of the individual fuelling the vehicle and the vehicle's registration number.
  - (2) Providing evidence that the customer did not pay.
- Have a fully functioning fax machine installed.
- Display the required signage as described in BOSS guidance notes
- Employ the CRIME REPORT procedure for all 'non-urgent' crime.

Orchard Wharf does not fully comply with the above guidelines, with particular emphasis placed on CCTV coverage, whereby Pumps 1 and 2 have no CCTV cover.

***Post Problem Solving Session:***

Orchard Wharf now fully complies with the original guidelines and has fully adopted the use of BOSS Form 3 in reporting offences.

Orchard Wharf currently adopts a pre-payment method during late hours. This is a locally adopted policy and is operated under the control of the Retail Manager. It is not a policy set by the parent oil company. Both the parent oil company and BOSS reject the feasibility of adopting such a practice on a full time basis. Factors around this decision are as follows:

- Potentially high costs of replacing existing equipment in order to comply with Weights & Measures.
- Potential losses, incurred by retailers, in the sale of goods from the forecourt shop.

- The general consensus within the industry that consumers will no longer wish to purchase goods from forecourt shops.

Orchard Wharf have now instructed staff, especially within busy periods, to provide a visible presence on the forecourt, acting as a deterrent to those wishing to commit criminal acts within the curtilage of the forecourt.

## 9.2 Offender(s)

19/06/03. One day ANPR initiative at Service Station. Refer to **PATP147HT2003**

18/08/03: Formation of Forecourt Crime Unit specifically targeting repeat offenders, whereby details of vehicles are circulated to all local forecourts. This also includes vehicles that have been reported stolen and those having reported number plates stolen.

A weekly PowerPoint slide is created detailing particular vehicles of interest. This is attached to the Borough Daily Briefing PowerPoint, produced by the Borough Intelligence Unit.

Details of the five worst offenders are passed to TfL for the attention of the MPS Laser teams (ANPR) on a monthly basis.

04/12/03: Arrest of a suspect concerned in several incidents of making off without payment from Orchard Wharf using a hire vehicle. Currently on bail until 27/12/03 pending further investigation.

## 9.3 Location(s)

BOSS Point-of-Sale stationary is now despatched to forecourts on a monthly basis. It is envisaged that when current stocks have been exhausted, revisions will take place in order to improve the quality and presentation of the material displayed.

The implementation of a barrier entrance/exit has been rejected due to the cost and the possible risks faced by staff and consumers with traffic congestion, especially during busy periods.

The parent oil company is investigating the closure of the Leamouth Road entrance. Issues have been raised regarding emergency tanker evacuation procedures and the role of this entrance in such an event.

## 9.4 Risk assessment

### ***Displacement:***

**Temporal:** There have been several changes in regard to the times that these offences have been committed. The vast majority of offences have been committed between the hours of 0800 and 2200. A small number of offences have been committed outside of this time frame. As research has been conducted on a monthly basis the prevalent time periods have been highlighted for each month. The results have been varied with no particular pattern established.

**Geographical:** There has been no increase in the number of offences reported by neighbouring forecourts. Cotton Street Service Station has seen little change, experiencing a 9% downturn in the number of offences.

**Target:** No change.

**Crime Type:** There has been no change in the type of crime committed on this forecourt. It can also be noted that there has been no increase in other crimes committed.

**Method:** No change.

**Health & Safety:**

This has always been borne in mind throughout this process. No measures have been taken that would have placed any further risks on staff or consumers.

**HRA:**

All actions that have been taken have been fully compliant with the Human Rights Act. Furthermore the rights of staff and consumers have not been impinged by any measures taken within the forecourt.

## 10 Evaluation

### 10.1 Victim(s)

*Pre-payment:* As stated earlier, this is a locally adopted scheme, which is not officially sanctioned by the parent Oil Company. This method has usually been adopted during the early hours and has acted as a deterrent to would-be offenders during these hours.

*Forecourt Patrol:* This has been a successful intervention, providing an element of natural surveillance. The forecourt has attempted to ensure that, during busy periods, a member of staff is visible on the forecourt. Staffing levels at certain times have made it difficult to consistently maintain this presence, in particular, during the weekend period. Other forecourts operating in the Borough have adopted this intervention.

*Letter to Keeper:* This has been an ineffective means of reducing crime. A heavy burden is placed on the accuracy of information held on the Police National Computer. The majority of letters despatched were returned stating that the person was no longer the keeper or not known at the address. A small percentage did return to the forecourt and pay the outstanding amount.

*BOSS Form 3:* The use of this form has benefited forecourt staff and Police. Used in conjunction with the CCTV, the forecourt has provided good quality reports. Revisions made to the form have made it easier and quicker for staff to complete.

*Circulations:* This has proved to be a very effective tool in preventing repeat offenders from carrying out further crime on forecourts. Staff have been able to take positive action using the information received from Police. In total 42 vehicles have been circulated of which only 5 managed to re-offend further.

### 10.2 Offender(s)

*Identification & Prosecution:* This has yet to provide any benefit, however offenders have been processed in relation to other offences. Further emphasis is being placed in this area to heighten the current profile in order to increase the detection rate.

*ANPR:* This is a very effective tool in combating all types of crime. The process is restricted due to being very manpower intensive. The use of mobile/fixed ANPR on forecourts is the subject of further study.

*Circulations:* As above for VICTIM.

### 10.3 Location(s)

*Stationary:* This has also proved to be effective, giving consumers fair warning of

the implications. The production of a monthly poster listing the worst 5 vehicles has also been an effective tool in preventing repeat offenders from committing further crime.

*ANPR installation:* At this stage, this is not a viable option. In the current climate, costs for installation and manning outweigh the effectiveness of the system. Future research in this field is intended to ascertain the effectiveness of installation on a larger scale.

## 11 Review

11.1 Has it met the aim? Orchard Wharf has achieved a reduction of **33.5%**

11.2 If yes, how has it met the aim?

The main focus has been on raising the awareness of staff. Employing staff to carry out their daily routines of cleaning stanchions and pumps when the forecourt is busy has achieved this. This has provided an element of natural surveillance, allowing employees to actively participate in crime prevention aspects and thus deterring the would-be offender from committing crime.

The installation of a new digital CCTV system has assisted the forecourt staff in better identifying offenders. Images produced from the CCTV have enabled staff to identify previous offenders and take necessary action to prevent any repeat offence.

Direct contact with Police has also limited the number of repeat offenders, with details of vehicles of interest being forwarded to the forecourt providing them with a 'heads-up' to potential offenders.

The above methods are sustainable and have been employed on other forecourts within the Borough of Tower Hamlets, where a reduction of **42%** has been achieved for the month of December 2003 compared with December 2002.

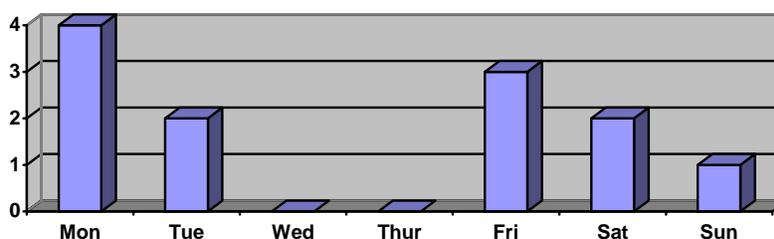
The availability and practical uses of digital CCTV has now encouraged Texaco to purchase systems for the main forecourts within the Borough, and, the retail manager of Old Ford is considering purchasing digital CCTV to replace his existing analogue system.

11.3 If no, why did it not meet the aim?

### Orchard Wharf, December 2003

During the month of December, Orchard Wharf reported 12 incidents of making off without payment. This accounted for a total loss of £287-38 at an average of £23-95 per incident.

As in previous months, analysis has been conducted using the information contained within the crime report pro-forma submitted by the forecourt.

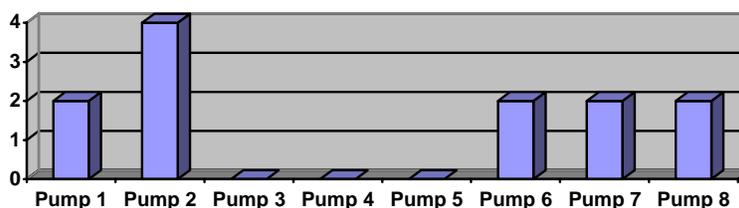


From the above graph we can determine that **Monday** suffered the most incidents. This is closely followed by **Saturday**.

Of further note is that **50%** of the incidents were committed **Monday-Tuesday** with the remaining **50%** being committed **Friday-Sunday**.

It has been noted that the East India Tunnel is now open in both directions, however this has had no apparent effect on the usage of the forecourt.

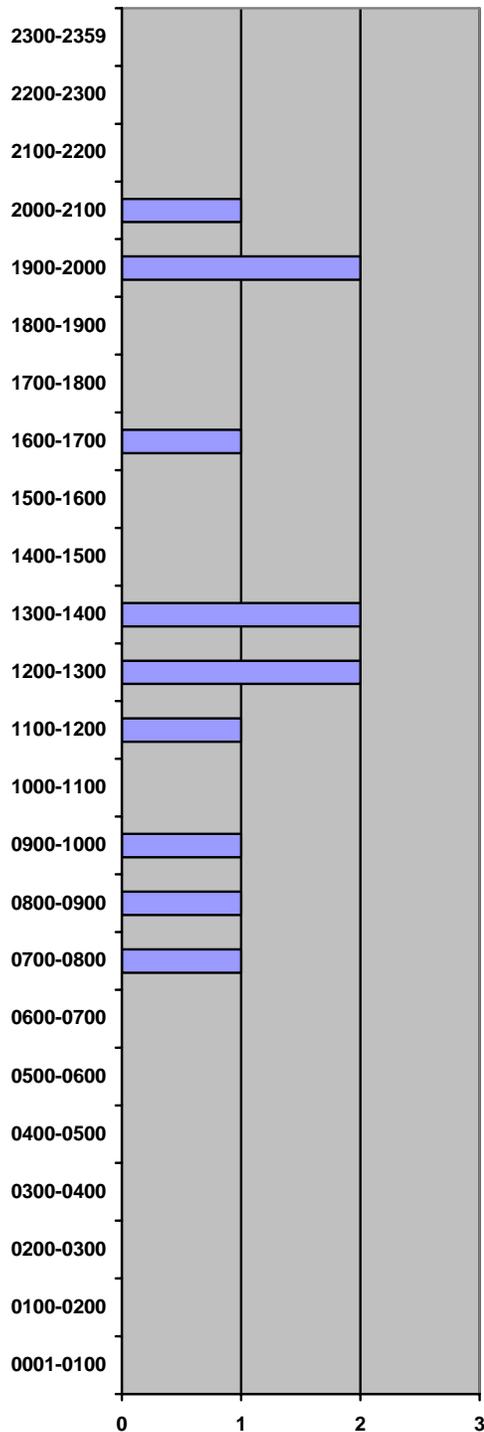
Further analysis has been conducted into the pump usage at this forecourt, producing the following result:



From the above we can see that **Pump 1** was used more than any other pump. An interesting point is the non-usage of **Pumps 3, 4 and 5**.

In relation to the quality of the reports received, the following points have been noted:

- 2 of the 12 reports contained no index (17%)
- 4 of the 10 indexes were not known to PNC (40%)
- 1 of the 12 reports was not captured on CCTV (8%)



From the adjacent graph we can determine that there are 3 distinct periods:

- 0700-1000
- 1100-1400
- 1900-2100

Of these 1100-1400 suffered higher than the remainder.

It is useful to note that for this month the forecourt had suffered no incidents during night-time hours.

### Conclusion

After the unexpected increase that occurred in November, this forecourt has achieved a remarkable success in turning the tables and again reducing the amount of crime on its premises. This is reflected in a 43% decrease compared with December 2002.