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**GRIPPA EVALUATION TRIAL STRATEGY
ITERATION ONE REPORT**

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Preface to Iteration 1 Evaluation of “Grippa” anti bag theft furniture accessories

This evaluation was commissioned by the University of the Arts (UoA) “ Design Against Crime Research Initiative” located at Central Saint Martins College of Art and Design (CSM), London, connected to a practice led research project to develop and test anti-theft design prototypes. Whilst the Arts and Humanities Research Council provided some funding for “evaluation purposes” in order to secure the services of a formal crime science evaluation CSM found it necessary to secure further funds from Islington and Westminster councils in order to secure a first stage evaluation by Jill Dando Institute of Crime Science (JDI) to evaluate work being trialled in those boroughs. The support of Metropolitan Police officers (crime prevention design advisors Sgt. Paul Donlevey and PC Ike Gray) was indeed not just central to securing business cooperation and local council funding, but also in making sure this project actually happened.

This is the first time on record that a research-based practice-led design initiative has formally sought to have the efficacy of its design research measured, in order to feed the information back into the design research documentation process. The nature of the evaluation that follows has been necessarily “experimental” in as much as the JDI were asked to engage with design ideas about the “iterative process” i.e. to recognise that this independent evaluation is equivalent to a first stage “scoping study”.

1 Narrative

The relationships between disorder, crime and alcohol have been widely researched and represent a complex and multifaceted set of interactions (Richardson & Budd, 2003). Several themes have emerged demonstrating associations between alcohol and assault (Mattinson, 2001); alcohol and burglary (Bennett & Wright, 1984); and, alcohol and domestic violence (Leonard, 2004). The current research deviates from this and examines associated problems in venues that sell alcohol. In particular, it considers the problem of licensed premises as what Clarke and Eck (2003) refer to as ‘risky facilities’ and what contributes to this status.

In the United Kingdom, perhaps more so than other European countries, ‘public house culture’ is an ever increasing phenomena in terms of both popularity and business (Jackson et al. 2000). In terms of criminogenic characteristics, licensed premises have the clear potential to both generate crime, as large numbers of people congregate within them, and attract crime as offenders will quickly learn about venues which offer good opportunities for crime with acceptable risks of detection. In contrast to other types of locations at which people congregate, alcohol can play a contributory role in enhancing victimisation risk, lowering victims awareness of security, and potentially reducing offender’s perceptions of risk or their consideration of it.

The aim of the current research was to examine the impact on crime of a crime prevention intervention implemented in a licensed environment. Before discussing the intervention, a brief review of the research literature concerned with those factors that contribute to the risk of victimisation will be presented with a particular focus on crime in bars.

2 Crime and Licensed Premises

2.1 Bars as 'risky facilities'

Intrinsic to the new discipline of Crime Science (e.g. Laycock, 2005) is the belief that criminal acts are not random, unpredictable events. A level of rationality applies just as in all other decision making. When committing a crime, where risk is perhaps the most important element to rationalise, there are three 'almost always' elements (Felson, 2002):

- A likely offender;
- A suitable target;
- The absence of a capable guardian against the offence.

The function, locations and clientele of many licensed venues draw together some or all of these factors and sets a framework for crime and disorder problems. Whilst violence has been the most widely researched offence in relation to licensed premises, theft offences amount to a considerable proportion of crime within pubs and bars.

Town centre bars and restaurants, typically located in busy, multi-purpose, urban areas, are at risk from being target locations for theft and robbery (Steventon, 1996). Unlike rural, village public houses, patrons of town centre bars are often a younger, less stable population. Office workers, shoppers and tourists are likely visitors, bringing anonymity and less immediate knowledge about the risk of becoming a victim of crime and how best to prevent it. Public houses and bars typically attract multiple 'sets' of people with little or no relationship between them. As such, there is little cohesion and little community territoriality amongst patrons. As consequence bars and restaurants, as well as coffee bars and cafes, are not typically self-policed by patrons.

In contrast, in other locations there may exist a defensible space where human territoriality has the potential to operate as a positive group response that may be harnessed for crime prevention (Newman, 1973). Research demonstrates that in the wider community where neighbourhoods pull together to respond to crime, this collective efficacy can act as a powerful inhibitor against crime (e.g. Hirschfield and Bowers 1997).

Within an urban bar or public house it is virtually impossible to create such a setting as the customer base is often transitory and made up of disenfranchised groups, gathered for business or pleasure. As such, in bars, just as in communities without cohesion, there is little way of telling legitimate visitors from illegitimate ones, or for the development of a collective response to crime. This creates an ideal setting for criminality, particularly theft.

The potential for criminality within bars and public houses increases risk caused by the absence of defensible environmental space. Offenders may also favour such venues because the promise of reward is high. Handbags on the floor, laptops left propped against the wall, and mobile telephones left on tables ensure that the potential yield from any one venue is sizeable. The items available have the features summarised by the acronym CRAVED being concealable, removable, available, valuable, enjoyable and disposable, (Clarke, 1999). Cash, credit cards, mobile phones and desirable electronic equipment which can quickly be converted into hard currency are good examples of CRAVED items. CRAVED items are popular with offenders because they commonly deliver the greatest rewards for minimal effort. Many of the items that patrons to licensed venues carry with them conform to this acronym further increasing what Felson (2002) refers to as the chemistry for crime at these locations.

However, as will become evident in the sections that follow, not all bars experience the same levels of victimisation. This is, of course, in line with the findings for other types of crime such as burglary for which repeat victimisation at the same property accounts for a large proportion of the total volume of crime (e.g. Johnson et al., 1997; Pease, 1998). As a general rule, around 20% of victims or things account for 80% of the problem, whatever that may be (robbery, burglary, assault, even earthquakes!). Thus, crime tends to be concentrated. Moreover, research demonstrates that the manipulation of situational factors at these locations, such as more secure “access control” and improved “natural surveillance” as well as simple target hardening of locks and bolts, can have a substantial impact on crime without displacement of the problem elsewhere (e.g. Forrester et al 1988).

In relation to crime at licensed premises, it is likely that some venues will experience more crimes than others and experience *chronic* repeat victimisation, whereby the venue is targeted for a sustained period of time. One reason for this is that in the absence of intervention, the factors that combine to make a venue particularly attractive to offenders

are likely to remain static over time. For instance, the locations of venues do not change, nor is it likely that the clientele that frequent them (or the typical characteristics of them- e.g. regulars, tourists, and so on) and hence the potential victim profile will fluctuate to any great degree. For these reasons, the manipulation of situational factors within licensed premises may well represent the most pragmatic and sustainable solution to crime reduction in this context.

2.2 Licensed premises in tourist hotspots

Licensed premises located in popular tourist areas may suffer from offenders targeting the tourist population. Tourists are particularly attractive targets and research suggests that some popular tourism venues have crime patterns that correlate closely to tourism seasons (Glensor & Peak 2004) indicating that in those areas the crime problem is at least in part generated by the seasonal availability of potential victims of crime. There are several reasons why tourists may experience elevated levels of victimisation:

- Tourists are lucrative targets, typically carrying large quantities of cash and other CRAVED items such as cameras, phones and video cameras (Ryan, 1993, as cited by Crotts, 1996)). They may also be more likely to leave these items in view;
- Tourists are less likely to report crime thus decreasing the risk to potential offenders (Fujii & Mak, 1980);
- “Holiday” mind set makes tourists more prone to taking risks and less likely to observe safety precautions, (Glensor & Peak, 2004);
- Tourists are generally easily identifiable, often carrying cameras, backpacks or maps. This can help offenders with a preference for this type of victim target the right people, Glensor & Peak, 2004).

The aim of the current research was to examine the impact on crime (and bag theft in particular) of a situational crime prevention intervention in a licensed premise in London. Before discussing the results and the method of the evaluation in depth, we give more details of the process of implementation of the anti-theft measures and define the existing crime problem of theft in bars.

3 Anti-theft measures at the concept stage

In order to combat the bag theft problem, a variety of anti-theft measures were designed by the Central Saint Martins College (CSM). Some of the measures were intended to be fixed to existing chairs and tables in the bar. These were in the form of clips of different sizes and shapes (e.g. Fig.1 and Fig.2). The clips were attached to the existing structure of the table or chair customisation (sometimes by adding a recess to the furniture and sometimes by being attached directly to them). Other measures involved the manufacture of new types of chair which would enable people to store their bags within the structure of the chair (Fig.3 chair customisation and Fig.4 stool customisation). So, for example Fig.5, a Hessian shelf “net” would be placed between the legs of a chair which a bag could sit within.

Figures 1-5- Anti-theft measures



Figure 1



Figure 2



Figure 3



Figure 4



Figure 5

3.1 Programme theory

Before discussing implementation issues in more detail, consideration should be given to the theory underlying the intervention; that is, why should it work? Programme theory of this kind concerns the precise specification of, and understanding of the mechanisms through which an intervention could plausibly reduce crime. This is important to consider for two reasons. First, it makes implementers think explicitly about how an intervention could trigger the mechanism(s) that could lead to a reduction in victimisation. In so doing, the intervention is put to a simple intellectual test. Second, specifying the programme theory helps to identify what data should be collected during an evaluation that will allow any reductions in crime to be attributed to the intervention of interest rather than other factors. Moreover, where competing mechanisms are proposed in advance of implementation, this allows the evaluation to be tailored in such a way as to allow the role of different mechanisms to be tested and compared.

The programme theory for the current intervention was fairly straightforward in nature. Table 1 shows the mechanisms through which the measures would reduce the theft problem. All of the mechanisms rely on certain behaviours on the part of offenders and customers. Importantly, most of the mechanisms rely on the customers noticing the measures. The second element of the evaluation, and in particular the post-implementation observational study, was designed to elucidate any evidence relating to patron's awareness of the measures and the consequent impact on their behaviour.

Table 1 Possible mechanisms by which anti-theft measures would reduce bag theft

Initiative/Outcome	Mechanism 1	Mechanism 2	Mechanism 3	Undesired Outcome
Installation of anti-theft measure ↓	Installation of anti-theft measure ↓	Installation of anti-theft measure ↓	Installation of anti-theft measure ↓	Installation of anti-theft measure ↓
Mechanism ↓	Customer notices measure and uses it to secure their bag ↓	Customer notices measure and uses it to secure their bag ↓	Customer notices measure ↓	Offender notices measure ↓
Bag theft is reduced	Offender attempts to steal bag ↓	Offender sees measure ↓	Customer secures bag/ is more conscious of bag without using measure (e.g. wears bag across shoulder) ↓	Offender perceives increased risk of apprehension ↓
	Customer or staff are alerted to attempt ↓	Offender perceives increased risk of apprehension ↓	Offender perceives increased risk/effort involved in undertaking bag theft ↓	Offender decides not to take bag ↓
	Offender is apprehended ↓	Offender decides not to take bag ↓	Bag theft is reduced	Offender steals bag from unprotected licensed premises next door
	Bag theft is reduced	Bag theft is reduced		

3.2 Publicity

Attracting customers' attention to the anti-theft measures was seen as an integral part of the implementation of measures. The measures provided were designed to be fairly discrete and in keeping with the design scheme of the bar in general.

The first iteration of graphic design communication created by Sean O'Mara who was commissioned by DAC to take charge of the communication design included:

1. Serviettes – Fig 6
2. Till roll – Fig 7
3. Matches – Fig 8
4. Menus (backs) – Fig 9
5. Loo Posters – Fig 10

There were many problems persuading All Bar One management that any of these first communication strategies were relevant to them. However eventually a campaign was agreed and deemed necessary to raise customer awareness. Plans for publicising the measures also included general messaging to alert people in other spaces in the bar (such as toilets) to the risks of leaving bags unattended and also directing them to new measures in the bar aimed at designing out bag theft.

Figures 6-12 Publicity measures



Figure 6



Figure 7



Figure 8



Figure 9



Figure 10

Communication development also included experimental brass sign concepts for tables (Fig 11) and table stencils (Fig 12) that could be used to raise customer awareness, as well as posters aimed at walls and other spaces.



Figure 11



Figure 12



Importantly, the Head of security for Mitchells & Butlers championed the scheme, persuading staff at a number of All Bar One venues to participate. He was keen to get involved in the pilot and agreed to ensure support for the new bag theft reporting forms which allow victim to identify the spot in the bar their bags were taken from, created by DAC at CSM in liaison with JDI.

4 Management of Implementation

Preceding the implementation of the scheme, CSM staff, who centrally managed the scheme, had been in contact with a number of agencies and organisations concerning the scheme. These included:

Metropolitan Police- from Islington and Westminster

The Metropolitan Police (hereafter, the Met) were central to identifying All Bar One as relevant London chain of venues for anti bag theft design intervention. Indeed for the last five years All Bar One had appeared in the top ten worst hot spots for bag theft compiled individually by police in London boroughs. Westminster and Islington boroughs were particularly concerned about unacceptable levels of bag theft in these venues. Consequently Sgt. Paul Donlevey (Westminster) and PC Ike Gray (Islington) were very pro active in liaising with Dr. Gamman about the new perpetrator techniques they understood were emerging and inputted into the development of anti theft design work. They were invited to be part of the advisory panel DAC at CSM set up to feed expert knowledge into the design process of this project. See model of design process – Appendix 1. Indeed these representatives from the Met had been involved in previous schemes to reduce bag theft in the Westminster and Islington areas and were very keen to implement measures that might reduce the problem further. The Met at Westminster played a key part in facilitating and mediating contact with the Head of Security at Mitchells and Butlers (the umbrella company who actually own All Bar One bars used in pilot) and employed leverage tactics to get the bars involved. The Met also provided the recorded crime data necessary to monitor any changes in recorded bag thefts for the evaluation and were central in continually advising bars of escalating bag theft problems and hot spots.

Head of security at Mitchells and Butlers

Importantly, the Head of security for Mitchells & Butlers championed the scheme, persuading staff at a number of All Bar One venues to participate. He was keen to get involved in the pilot and agreed to ensure support for the new bag theft reporting forms which allow victim to identify the spot in the bar their bags were taken from, created by DAC at CSM in liaison with JDI.

Figure 13 Bag theft reporting form – see Appendix A for further info

Managers of ABO (Mitchells and Butlers)- from Islington and Westminster

The individual venue managers were contacted to confirm that they were willing to take on the project and undertake recording of bar thefts that would be required by the evaluation. The original plan was to implement the measures in two bars and use a further two for comparison purposes but CSM/ JDI were continually referred back to an ABO executive director who cancelled and delayed appointments and who was not keen on the project. She appeared to see little “profit” for All Bar One in either the designs or more significantly in anti-theft messaging and communication.

Philip Harrison design

All the brand image and interior design of All Bar One (furniture and graphics) had been designed and fitted by Philip Harrison Design. Philip Harrison himself mediated relationship with ABO and DAC and gave much of his own personal time to critiquing designs before they were implemented (see Fig. 14). Harrison Design had also originally provided DAC at CSM with a letter of support, dated January 2004, which said his company would underwrite to the tune of 20k implementation of chair customisations to existing All Bar One furniture. Unfortunately this support was withdrawn at a crucial moment in the project. NB Customisation is very time consuming and pressures of other work meant Harrison felt he did not have labour resources to do the work at the time we needed it.



Figure 14 All Bar One chairs

Anti-theft measure manufacturer

A private company was commissioned to manufacture the measures that had been designed. At this prototype stage, the company were to produce enough measures to install in the pilot bars. They did this free of charge as a possible lost-leader.

ISC Wales

DAC agreed a fee of £1000 + VAT with Safety Castings Limited to produce 50 clip designs as a one off production run. They were very keen to participate as they saw potential in the design.

DAC are currently negotiating agreement for future work with them to produce a new design where by they will supply the design work at no fee and DAC must supply the cost of the manufacture. DAC are currently waiting funds from JD Wetherspoons pubs, as they have agreed DAC can test the clips in a bar in Camden at £36 per clip.

Barrett & Jarvis - Designers and Makers in Metal

DAC commissioned them to make prototypes, at a cost of £4k, some of which were tested in this project.

Jill Dando Institute of Crime Science

Staff from the Institute were commissioned to undertake an independent evaluation of the effectiveness of the scheme. Their role was to co-ordinate the collection of data concerning the impact of the measures both in terms of their use by patrons and any consequent crime reduction, and feed it back into the project.

5 Implementation Plan

The original timescale for implementation of the measures and subsequent evaluation are shown in Figure 15. Meetings were to be held prior to implementation to:

- Gauge the problem with bag thefts in Westminster and Islington using police recorded crime data
- Design forms to monitor the bag theft problem and evaluate the effectiveness of the measures
- Agree the pilot and control bars and start dates and enlist the staff at those bars
- Train the staff to use the bag theft recording forms
- Agree the form of the anti-theft measure prototypes and commission their manufacturer
- Agree and design the publicity associated with the anti-theft measures

	June	July	Aug	Sept	Oct	Nov	Dec	Jan	Feb	Mar
Two-month 'before' period										
Two-month 'action' period										
Two-month 'before' period										
Two-month 'action' period										

Figure 15 Original evaluation time scales

Figure 16 illustrates that the original plan was to use two 'action' bars where measures would be implemented and to compare changes in levels of crime in these with two control bars in which there was no intervention. The purpose of the latter was to estimate what the post-implementation crime rates would otherwise have been in the action bars had implementation not occurred (the counterfactual). To enable analysis, levels of bag theft in the bars would be recorded for a period before implementation and subsequently for a period after the measures were installed. However, due to tensions with All Bar One it was decided to adopt a variant of this model whereby a phased implementation model was used, so that the second bar could be used as a control bar before it received intervention. Thus, data were to be collected in two bars prior to any implementation (the before phase). Next, implementation would begin in one bar and data collected for a two-month period, whilst the other served as a control (the after phase). Simultaneously, data

would be collected in a third bar. Next, the intervention would be implemented in the second of the three bars, and any changes compared with those in the third bar. In this way, three bars could be used to examine the impact of the intervention in two, whilst keeping the number of bars included to a minimum (All Bar Ones preference). This quasi-experimental design may be summarised graphically as follows:

	Before period 1	After period 1	After period 2
Bar 1	action (no intervention)	Implementation	
Bar 2	control	control	Implementation
Bar 3		control	control

Figure 16 Experimental design

6 Changes to the Implementation Plan in practice

Inevitably, there were some blocks to implementation and delays associated with the scheme. These challenges are described in this section, along with the solutions derived. It should be noted that even with the problems that arose, anti-theft measures were successfully implemented in one bar in Westminster. This was achieved due to the adaptive way in which the staff at CSM managed the implementation phase of the scheme.

6.1 Problems selecting action bar

Selecting the bars for this project was not a simple process. Attempts to secure a suitable chain were met with frustrating difficulties. The priorities of national bar and restaurant groups are not necessarily aligned with crime prevention priorities and participation was often dismissed. Eventually, All Bar One agreed to participate following a significant degree of leverage by the Metropolitan Police. As a chain that attracts a large number of thefts across London, the Police had a vested interest that they take part in a crime prevention programme and negotiated with them to become involved with the project.

Even when All Bar One's participation was secured, there remained the time consuming task of identifying bars that had a moderate to high level of bag theft which had staff that were willing and able to allow the intervention to operate within the establishment. Whilst

the requirements for the research played a part in dictating implementation sites, All Bar One remained fairly didactic about which bars they would be happy to ‘tolerate’ the evaluation. For example, early on in the planning stage, on the basis of an analysis of recorded crime data, it appeared that one branch of the All Bar One chain in Islington would be the best place for implementation. However, after a number of meetings it became evident that staff in this bar (particularly the management) did not feel that this was the case. Initially, the resistance seemed to stem from the belief of the staff that the bar did not suffer from particularly high levels of bag theft. Subsequently, it appeared that the bar was about to change management and, in fact, was eventually closed down within the evaluation period.

After further discussion, a branch of All Bar One located in Regent’s Street in Westminster was selected as the first ‘action’ bar. This bar had a moderate volume of bag theft in comparison with other branches in London. It was also agreed that the All Bar One venue in Henrietta Street would act as the associated control bar. It is important to note that selection of the control bar was also dictated by All Bar One and hence there was no opportunity to match the two venues on characteristics such as crime rate and location. Having said this, there were similarities between the action and the control bars in terms of their working practices and location. Furthermore, a second bar, to be located in Islington, would be selected to receive intervention at a later time.

These problems with identification of suitable bars had a considerable effect on the time scales of the implementation of the scheme. Implementation in the first action bar was originally planned for September, but was initially postponed until January although as will be seen even this was subject to change. Eventually, implementation only came to fruition in one of the bars.

6.2 Levels of crime in bars

One challenge in relation to the evaluation of the scheme related to the actual levels of crime recorded in the individual bars. Although bag snatches represent a substantial problem across all venues within Westminster, at the level of the individual bar the number of recorded crimes of this type was fairly low on a month by month basis (All Bar One (all) MEAN= 3.4) Even the All Bar One bar that had the highest levels of crime had

a low frequency of events on a monthly basis (MEAN=7.3). However, as results from the British crime survey (e.g. Dodd et al 2004) clearly illustrate not all crime is reported to and recorded by the police. Thus, as noted above, additional data on crime within the bars was collected via a victim survey provided to patrons who reported crimes within the venue to bar staff. Assuming patrons are more likely to report crimes to the staff than the police, this approach allows for any under-reporting of crime to the police to be estimated.

However, data collected in this way revealed a similar level of victimisation, suggesting that the recorded crime figures were not unrepresentative. This presents a challenge for statistical analysis as in the absence of a sufficient number of crimes, it is not possible to conduct statistical analyses using a before and after design that are reliable enough to detect a change in the crime rate. For this reason, it was agreed that the best way to deal with this problem, and hence limit this form of threat to what is known as the internal validity of the evaluation design, was to extend the 'before' and 'after' periods where possible. In this way, more reliable before and after crime rates could be derived and compared. Due to the problems in selecting the action bars (see above), the time scales had already been pushed back. For this reason, it was now envisaged that the before period would cover the months October to December (inclusive) and the intervention would be in place in the 'action' bar at the start of January

6.3 A surge in the bag theft problem

A communication between one of the Met Police Officers and CSM in late November identified that there had been a 'surge' in the bag theft problem in the Regent Street action bar (in 2004 figures for the action bar had risen from 8 incidents between 1st August to 30th September to 34 incidents between the 1st October and the 30th November). As a result, he passed on the bar staffs wishes, and strongly recommended himself, that the dates for implementation of the intervention were brought forward from January 2005 to as soon as possible. Westminster police provided funds via Westminster council towards evaluation costs and so this request was seen by CSM as part of an obligation linked to sponsorship and the maintenance of a good working relationship. This left CSM with a difficult decision, as bringing forward the implementation would reduce the recommended evaluation 'before' period and mean that the measures would have to be

implemented with some haste. It was decided that implementation should be brought forward following the surge in the problem, and hence the final date of implementation of the measures in the bars was 9th December 2004.

6.4 Problems with manufacturing of measures

As mentioned above, CSM produced designs for two types of measure, (a) Grippa furniture accessories (brass and metal) that could be fitted to existing furniture, and (b) Stop Thief chair customisations delivered as units that are part of the integral structure of the chairs.

In trying to work with Harrison Design, who are continually employed to “refresh” and “upgrade” All Bar One identity and furniture in bars and for this reason, CSM experienced some logistical difficulties even before we learned Harrison Design could not keep their commitment to providing labour to customise chairs. In fact early furniture prototypes delivered in July 2004 at Phillip Harrison’s request were inadvertently put out for rubbish as bar staff thought that they were “broken” and Harrison was no longer on site to tell them otherwise. ABO senior representatives had also forgotten to go look at them as agreed with Harrison Design and CSM. Indeed, these valuable prototypes were subsequently discarded by the bar staff before they could be retrieved which represented a considerable set back for CSM who had to make up the work again!

Following the surge in bag theft (see above) there was a new urgency to get the measures manufactured and fitted in the action bar and it was at this point (November 2004) that Harrison Design revealed they had no time to accommodate agreed customisation on chairs. This meant only stools in Regent Street site could be customised, and even then CSM (not Harrison Design) were given both financial and labour responsibility for fitting them, deviating from original understandings. As a result there were some compromises in the way in which the measures were fitted and the type of measure that were chosen for intervention. In particular, the measures were not always fitted to the furniture in the most satisfactory way. For example, some of the measures were fitted in places that were hidden from view, or not very practical or convenient for the customers (see section 10 on the analysis of customer feedback for more details). Furthermore, the chairs with integral

anti-theft measures were never produced or implemented. This latter type of measure would have been particularly useful to customers with larger bags or bags with wider straps, who could not use the other type of measure. It should be noted that it was not just the speed of implementation that prevented the use of chairs with integral measures, it was also felt that these measures would not be in keeping with the current design scheme and existing furniture within the bar. CSM were also unable to produce a bag holding brass or aluminium Grippa in time to offset these problems (NB these bigger briefcase holding Grippas are currently to be the subject of user testing with Wetherspoons, Holborn).

6.5 Problems with implementation of publicity measures

One of the original elements to the planned implementation was a publicity campaign to increase general awareness of the bag theft problem and, in particular, to highlight the new anti-theft measures that were fitted in the bar. Following discussions with staff from the bar and others from Mitchells and Butlers, these plans were substantially altered. This was due to the fact that there was some resistance to displaying the publicity and fear on the part of All Bar One that any extra crime prevention venue communication would compete with their existing branding strategy. It was felt that posters warning customers about bag theft would give the wrong signal, and make people wearier of others in the bar and less relaxed. In the worst case scenario it was felt that the publicity would possibly put people off from drinking in the bar altogether. For similar reasons, it was felt that the inclusion of publicity pointing out the measures would also lead to some unease on the part of customers. For instance, they might feel that the venue was a particularly 'high risk' bar.

The police at Westminster were not in agreement with All Bar One's analysis of the anti bag theft communication design and supported proposed publicity measures. In a separate project CSM were commissioned to produce and distribute 5,000 posters, 5,000 tobleronas with anti-theft messaging and 70,000 handbag shaped postcards. These were distributed to pubs, cafes and restaurants all over Westminster and later Islington. Feedback from a diverse range of venues gathered by the police suggest the communication designs were well received and appreciated by the venues. In fact they

were eventually used throughout the All Bar One chain, despite All Bar One executive management's original objections.

Particularly popular were the information 'toblerones' (Fig. 17) which sat on tables or bars. These were very reassurance-orientated in their message. They also gave practical advice on keeping your bag safe and what to do if your bag goes missing. The handbag-shaped flyers (Fig. 18) which pointed out the under-table measures that had been fitted by Westminster Police on previous occasions (i.e. the Chelsea clip) were also popular.



Figure 17 Handbag publicity



Figure 18 Toblerone publicity

Eventually, CSM persuaded the bar management that it would be useful to have some form of poster publicity in the All Bar One bars. The staff did not want posters in the bar area because they felt it would be at odds with the branded menus and information in the bar and the more general décor of the bar. Therefore, the poster publicity was placed on the back of toilet cubicle doors. The down-graded publicity in the bar was potentially quite harmful to the overall effectiveness of the intervention. Table 1 emphasises the importance of customers noticing the measures as a first step in the effective operation of the scheme. One of the most powerful ways of ensuring this would have been the use of publicity. Whilst bar staff were encouraged to ask the customers to use the measures, at certain times they were too busy to do this. Results from the analysis of customer feedback (see section 10) confirmed that there was a significant problem with the first step of the chain of events leading to the reduction of bag theft. This was that 44% of the customers in the bar had not noticed the measures in the first place.

6.6 Downsizing to one action bar

As outlined above, the original plan was to use two ‘action’ bars in the evaluation. This would help to establish whether any effects of the intervention were context-specific. In other words, whether there were certain conditions in the bar that were necessary for the scheme to work. On the other hand, the effect of the measures could be fairly general, and be likely to work more or less anywhere. Using a second bar, within a different context could begin to generate evidence concerning these possibilities. As indicated above, the intention was to find a further ‘action’ bar in the Islington area, following the closure of the originally chosen All Bar One venue. Some similar bars were suggested, and the process of initialising contact with the bars discussed. However, due to staff changes and the general delays that the scheme had experienced, this was not done in a timescale that would have made evaluation possible. There are currently further plans to apply for funding to implement and evaluate similar measures in a number of other bars and settings.

6.7 Problems with staff turnover and encouraging involvement

In general, the bar staff at All Bar One Regent Street were far more supportive of the scheme than their executive managers. The staff were very helpful in the process of documenting bag thefts using the reporting forms and bringing customers attention to the anti-theft measures. The management staff in both the action and control bars were also very supportive and outside the initial blocking and delays linked to executive managers, initial reservations became a thing of the past. However, despite instruction and reiteration of the importance of doing so, there did appear to be some incidents of bag theft that were not captured by the reporting forms. This could have been because the customers did not bring the incident to the attention of the bar staff (although people nearly always do inform staff about this) or, alternatively, some of the staff might have forgotten or not been aware that the new forms needed filling in.

Finally, the scheme benefited greatly from the persistence and enthusiasm of the staff at CSM. In particular, Dr Lorraine Gamman acted as a ‘champion’ for the scheme and was determined that the measures were tested and that useful anti-crime evidence and design prototyping lessons were learned from the implementation process (see conclusion).

7 Data and Methods

A number of different types of data were collected for this report. Recorded crime data on bag thefts was provided by the Metropolitan Police. This data covered a period of slightly more than five years (1st January 2000 to 31st March 2005). The data covered all bars in the London Borough of Westminster. For each record, there were fields covering the time, date and location of the offence, details of the Modus Operandi and the nature of the property that was stolen.

In addition to this, primary data was collected from surveys as part of the evaluation. Information was elicited from customers and victims using a number of forms designed by the evaluation team. These are shown in Appendices A and B. The self-report theft forms were designed to record as many details as possible about the particular circumstances of theft when this happened. This includes the location of the victim at the time of the theft, the location from which the bag went missing, the timing of the theft, and a record of what was taken. The customer feedback forms were designed to elicit the views of the clientele regarding the use and practicality of the anti-theft measures.

Evaluation Design

The evaluation comprised two elements: 1) analysis of recorded crime data; and 2) Analysis of bespoke questionnaires to examine under-reporting, and the specifics of the crimes in more detail, including a micro-level analysis of the spatial pattern of crime within the action and control bars.

The evaluation uses a quasi-experimental design in assessing the impact of the anti-theft chair measures. This compares the extent of the bag theft problem in an action bar, which has received the measures and a control bar which has not, for the period of time before and after implementation of the scheme. If the scheme is successful at reducing the problem, we would see a decrease in the problem in the action bar over and above any decrease that was observed in the control bar. In this way, the control bar accounts for any changes that may have occurred anyway in absence of the intervention.

It is important to consider the most appropriate control for the evaluation of measures. Controls can cover general trends in all similar locations (such as those experienced across all the other bars in Westminster) or particular bars that are similar to the action bar

can be selected to act as a specific control. For the first stage of the evaluation, which is the recorded crime analysis, we use average figures for Westminster All Bar One Venues as a comparison for our action bar and compare this to the results found when using one control bar alone. For the second stage, where we use bespoke questionnaires and conduct micro analysis, we introduce a single control bar to account for factors associated with the likely clientele demographic and general trends in the bag theft rate.

The results of the evaluation are firstly presented descriptively, and then using statistical tests. Chi-square tests and odds ratio calculations are interpreted to examine whether any changes in the bag theft rate in the action bar are significant over and above the general trends observed in the controls.

8 Recorded Crime Analysis

This section uses recorded crime data to help characterise and quantify the problem of bag theft in Westminster in general, and, more specifically, within the action bar on Regent's Street. The second section describes the results of the evaluation based on recorded crime data.

8.1 The extent of the bag-theft problem

With over three thousand licensed venues and prime place as one of London's most famous tourist and shopping hot spots, Westminster is associated with considerable and varied crime and disorder problems. For the purposes of comparison, Table 2 shows rates of crime for 'Violence', 'Robbery' and 'Vehicle/Other theft' for the whole of Westminster, Greater London and, England and Wales. It is clear that for all crimes considered the rate for premises within Westminster is substantially higher than elsewhere¹.

¹ Note that the rates here use residential population and not visitor or day-time population which would be more appropriate for city centres and tourist areas. Unfortunately, the latter are notoriously difficult to estimate, hence the use of residential population.

Table 2 Notifiable offences recorded by the police. April 2002 - March 2003 Source: Home Office

	Violence against the person	Robbery	Vehicle and other theft
Total number of offences recorded	9,898	1,752	53,855
Westminster			
Rate per 1,000 population	54.5	9.7	296.4
WESTMINSTER			
Rate per 1,000 population	25.0	5.9	64.7
LONDON			
Rate per 1,000 population	16.0	2.0	45.2
ENGLAND AND WALES			

Unfortunately, it is not possible to establish whether theft within licensed premises is also higher within Westminster than elsewhere because data is not routinely extracted at this level. However, given the high rates for associated types of crime, Westminster seemed like a reasonable place to implement the intervention. Moreover, along with Westminster's workforce, shoppers and tourists form the custom base of licensed premises, generating many opportunities for crime.

Although data concerned with theft at licensed premises were unavailable for other areas, the Met police were able to provide figures for those in Westminster for the last four years. Analysts for Westminster were able to programme a specific search request to extract all theft offences within licensed premises. Figure 19 illustrates the magnitude of the problem, with around 4,500 incidents recorded every three months in Westminster alone. It also shows that the number of offences was relatively stable between January 2000 and December 2003. However, during 2004 there was a sustained fall in thefts recorded by the police. Nevertheless, there were still around 15,000 incidents during this year.

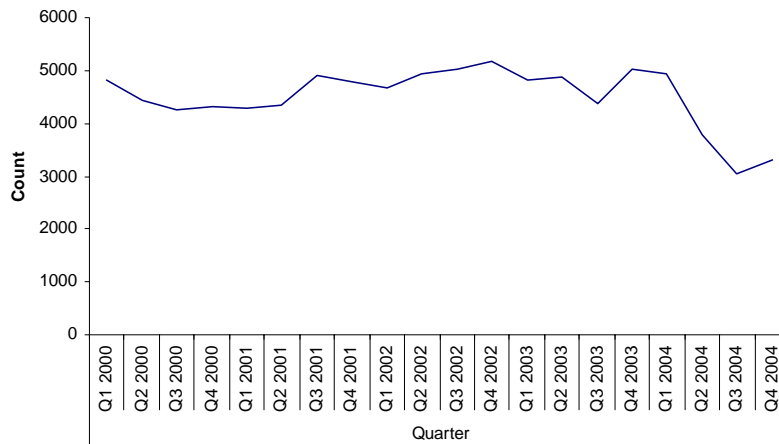


Figure 19 Quarterly time series of theft in licensed venues in Westminster

Crime rates can be expressed in three ways: by incidence, prevalence and concentration. ‘Incidence’ refers to number of crimes per head of population at risk. ‘Prevalence’ refers to number of victims per head of population at risk. ‘Concentration’ refers to number of crimes per victim. The concentration of offences allows us to explore the phenomena of repeat victimisation (see, for example, Pease 1998; and Farrell & Pease, 2001). In this case, we use it to quantify the number of bag theft incidents within a particular period of time within a single bar.

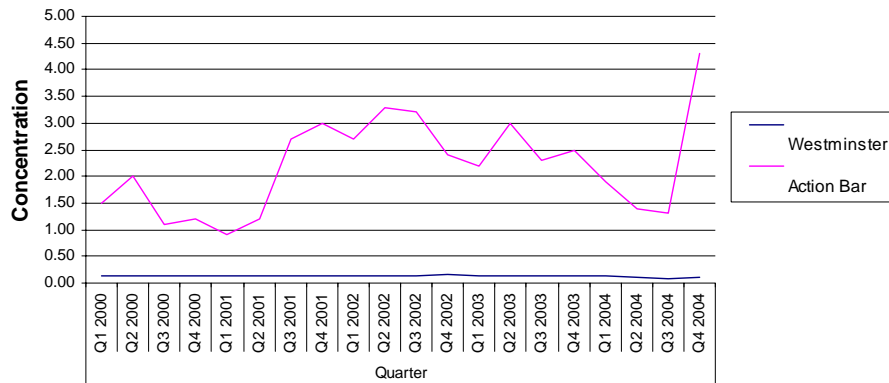
There are roughly three and a half thousand venues with licenses in Westminster, meaning that the average incidence rate for theft per annum was around 5.6 incidents per venue. On the face of it, this may not seem too problematic. However, as discussed above crime tends not to be evenly distributed, but instead is typically concentrated at a small number of chronically victimised locations. Considering theft in licensed venues in Westminster, if crime were uniformly distributed then each venue would experience approximately 1.4 offences per quarter.

In late 2001 a Metropolitan police unit was created to work towards improving the policing and safety of Westminster licensed venues. An initiative introduced was to produce a weekly top ten of worst offending bars for theft and robbery offences and to visit those bars as standard to perform risk assessment audits and issue crime prevention advice. Having this tracking system allows the Police not only to monitor badly performing premises, but also to invoke a degree of leverage. Licensed premises must

take heed of crime prevention advice or risk having their licence revoked.² All Bar One venues have been a constant fixture in the Police top ten worst offending bars for theft.

8.2 Bag theft in the action bar

Figure 20 shows the concentration rate for the bar selected for intervention. This indicates that for many quarters over the last four years the bar had a concentration rate of over 3 per quarter. Interestingly, there was a slight increase in recent months which was actually coincident with an overall decrease in the incidence rate across Westminster as a whole.



*Westminster rate based on 3500 licensed premise

Figure 20 Concentration rate for action bar and Westminster average

Table 3 examines the bag theft problem in the action bar and the controls in more depth and reveals three things. Firstly, in each case the prevalence is 1, which means that all bars have suffered from at least one incident of bag theft over the 51 month period analysed. This is why the incidence and concentration rates are the same. Secondly, All Bar One venues across Westminster experience a greater concentration of offences than we would expect if every licensed premises in the area experienced an identical risk of victimisation. Thirdly, the table shows that the concentration of offences within the Regents Street branch of All Bar One is over twice the average figure for Westminster branches of the chain, 456 compared to 218.

² This is to be made easier with the 2005/2006 Licensing Act, which stipulates that crime prevention is intrinsic to all license renewals. Failure to do so will give police the power to contest the license.

Table 3 Incidence and concentration rates for Westminster licensed premises (expressed as an average rate per venue- across 51 months)

	Incidence Jan 2000- March 2005	Prevalence	Concentration
Westminster licensed venues	26.52 (92,844 incidents)	1 (3500 venues)	26.52
All Bar One*	218 (2615 incidents)	1 (12 venues)	218
All Bar One Regents Street	456	1 (1 venue)	456

*average across Westminster venues

8.3 Modus Operandi - offence differentiation between bars

Just as All Bar One venues experience differential levels of theft, the question also arises regarding variation in the method of theft. See the glossary at the end of this report for definitions of each of these methods. Table 4 shows us that ‘Dipping’ for instance accounts for only three percent of ABO Liverpool Road whereas in ABO Henrietta Street one fifth of all recorded thefts are carried out in this way. Understanding the contrasting problems is essential for crime prevention strategies. GRIPPA products are not hypothesised, or indeed devised, to prevent ‘dipping’ or ‘distraction’ thefts and would therefore not be a suitable measure to implement where these theft types are the most problematic. However, where theft is dominated by ‘Lift’ offences and offences where property has been left unattended by the owner (or occasionally ‘snatch’ offences) if the bag is secured to the table it is considerably more difficult for the theft to occur. GRIPPA products are designed to have a crime prevention function and hence reduce such thefts.

Table 4 Modus Operandi for offences in All Bar One venues across Westminster

	METHOD				
	Dipping %	Distraction %	Snatched %	Unattended %	Unknown %
Dean Street	14	5	3	55	23
Liverpool Road	3	9	1	54	33
Finsbury Pavement	18	1	0	59	22
Hanover Street	12	6	0	53	29
Henrietta Street	19	7	1	56	17
Leicester Square	14	5	2	61	17
Paddington Street	8	8	0	54	30
Picton place	7	6	2	56	30
Regent Street	6	10	1	61	22
Average %	11	6	1	57	25

*Row totals may not equal 100 due to rounding.

Table 5 looks more closely at the ‘Unattended’ thefts across All Bar One venues. If we look at what is being taken it becomes clear that it is not the contents of bags and briefcases that dominate the table, but instead the handbags themselves. Whilst we would also anticipate GRIPPA products to have an effect where credit cards/cash or mobiles are taken from unattended bags (and the bag left), the finding that on average over half of all unattended thefts involve the entire handbag, laptop or briefcase being taken offers most support for the potential effectiveness of GRIPPA products to reduce thefts within bars.

Table 5 Breakdown of “Unattended” items that are stolen from within All Bar One venues.

PROPERTY							
	Credit cards/cash %	Briefcase %	Handbag%	Laptop%	Mobile Phone%	Sports Bag%	Misc. %
Dean Street	17	2	47	5	6	4	20
Liverpool Road	33	0	46	2	15	2	3
Finsbury Pavement	20	6	40	19	4	5	6
Hanover Street	13	2	60	11	8	5	2
Henrietta Street	16	1	46	3	10	5	20
Leicester Square	22	1	35	2	15	4	21
Paddington Street	35	0	33	2	11	2	18
Picton place	25	0	40	15	6	1	14
Regent Street	18	3	41	5	10	2	21
Average %	21	2	43	7	9	3	14

*Row totals may not equal 100 due to rounding

8.4 Evaluation Results: Recorded Crime Data

Figure 22 shows the rate of crime per month for the action and the control bar, as well as the average rate across twelve bars within the same chain. This figure has been produced as it is important to show the data in this ‘raw’ state to show how great month-by-month fluctuations are. When conducting an evaluation, especially when there is a limited amount of pre- and post-intervention data, it is important to consider a number of threats to internal validity. The most relevant here is known as regression to the mean. This occurs where the rate of crime for the period considered is high but unrepresentative of the typical crime rate for the location. The problem is that shortly after the crime rate would be expected to drop even in the absence of intervention- as the crime rate regresses to the level typical for that location. For instance, it is evident that in November 2004, just before implementation, the action bar experienced a greater number of crimes than in any other month since January 2000. Although this perhaps indicates that the intervention

was well timed, the sharp drop post-intervention cannot simply be attributed to the intervention. Only as a result of a detailed examination of the time-series can such problems be identified. Consider for instance, that if success were established on the basis of comparing the crime rate one month before and after implementation, we would hail the scheme successful, whereas statistical analysis of the time series shown as Figure 21 indicated that this would be difficult to justify.

Figure 21 Recorded crime rate per month for action bar, control bar and All Bar One average

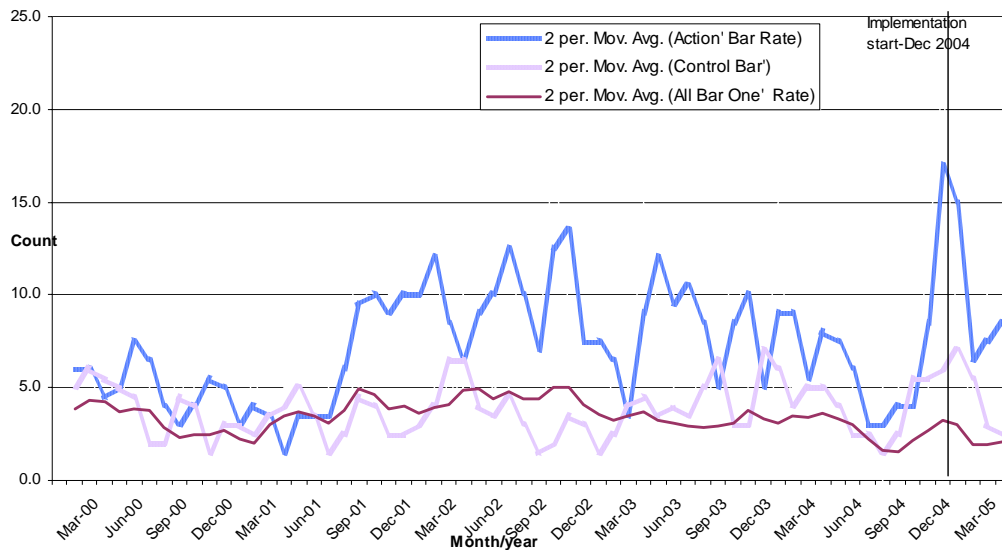


Table 6 shows the count of bag theft in the action bar for the period before (1st January 2000 to 8th December 2004) and after (9th December to 31st March 2005) implementation. This is compared to the count in the remainder of the All Bar Ones in Westminster for the same time periods. It can be seen that 5.7% of the thefts in the action bar happened in the ‘after’ period. This can be contrasted with a figure of 3.1% for the rest of the bars. A chi-square test was undertaken to test the level of significance of these differences. When we then compare the action bar to other All Bar One venues across Westminster (between January 2000 and March 2005) (Table 6) we find a significant interaction operating in the opposite way to that which we hypothesised ($\chi^2=7.41$ (1) $p<0.01$), that is, crime within the control bars seems to have fallen to a greater extent than crime within the action bar.

Due to the lack of independence in the data, further tests were used in line with recommendations in the evaluation literature (e.g. Welsh and Farrington, 2002). Here, we

produce odds ratios, which summarise differences in crime levels for the before and after periods. As a guide, odds ratios of over one indicate that the decrease in the action bar is greater than that in the control. An odds ratio of less than 1 indicates the opposite. The odds ratio shows significant differences between the action and the control if the confidence intervals exclude the value of 1. Here, we have an odds ratio of 0.53 and a confidence interval of between 0.33 and 0.84. Hence, the control has experienced decreases significantly greater than those in the action bar³.

Table 6 Count and chi- square analysis of recorded theft figures before and after intervention period for the action bar and All Bar One rate

		ACTION	CONTROL (All Bar One rate)	TOTAL
BEFORE	Count	430	2092	4522
	%	94.3%	96.9%	96.4%
AFTER	Count	26	67	93
	%	5.7%	3.1%	3.6%
TOTAL	Count	456	2159	2615

$\chi^2=7.41$ (1) $p<0.01$

Similar calculations were done which compared the action bar to the single control venue over the same time period. In some ways, this is a more accurate test of effectiveness as Henrietta Street is a more appropriate control than all the other bars in Westminster. The results of this analysis reveal a more positive picture, we see now that more crime occurred in the after period of the control bar than in the same period for the action bar (7.2% compared to 5.7% of incidents). However, a chi-square test showed no significant differences between the two groups, so we can not conclude that these results indicate a positive effect of the scheme ($\chi^2=.642$ (1) $p<0.42$). The odds ratio shows a trend in the anticipated direction (odds ratio value = 1.29), but the confidence intervals show that this is non-significant (0.69 to 2.40).

³ Note that a time series analysis was also undertaken on this data for completeness. It was possible to conduct this analysis due to the large number of monthly observations available. For brevity, we do not report this analysis in depth at this stage. However, this analysis also found no significant effect of the scheme on the level of recorded bag theft.

Table 7 Count and chi- square analysis of recorded theft figures before and after intervention period for action and control bar

		ACTION	CONTROL (Henrietta Street)	TOTAL
BEFORE	Count	430	231	661
	%	94.3%	92.8%	
AFTER	Count	26	18	44
	%	5.7%	7.2%	
TOTAL	Count	456	249	705

$\chi^2=.642$ (1) $p<0.42$

9 Self-report thefts forms

During the evaluation, bar staff within the action and control bars were asked to fill in a detailed incident report form whenever a customer reported a theft to them (Appendix A). The returns for this were low from both the action and the control bar, 19 and 17 respectively. This is likely to be due to both victims failing to report thefts to the bar and bar staff failing to fill out the forms when thefts are reported. This section summarises characteristics of the bag theft problem as indicated by the self-report forms. The results of the evaluation of the effectiveness of measures using these forms are also reported here. It should be noted that the reliability of this analysis is limited due to the small number of cases.

9.1 Characteristics of the bag theft problem

The self report theft forms allowed further analysis and explanation of the crime problem. The inclusion of restaurant floor plans meant customers could identify where in the restaurant the bag was stolen from. In particular, we were able to find out more about the victims of theft in the bars, the timing of incidents, the business of crowdedness of the bars when the theft took place and the particular circumstances of the theft.

Victim characteristics

Table 8 shows that the majority of bag theft victims were between 24 and 40 years of age. There was very little difference in the levels of men and women who were victims, showing that the offenders did not focus exclusively on women's handbags.

Table 8 Victim age

AGE	Percentage
18-23	17.1
24-30	40
31-40	25.7
41-50	8.6
50+	8.6

Table 9 Victim gender

GENDER	Percentage
Female	52.2
Male	47.8

Some of the bag theft problem could stem from risky behaviour on behalf of the victims, so questions were asked concerning their responses to the incidents. We found that 85% of victims were actually sitting at the time the theft took place and likely to be relaxed at or "switched off" to real issues like crime. However, the overwhelming majority (88.6%) did not witness the theft taking place, showing that it is an easy crime to undertake unnoticed. Furthermore, many thefts were not immediately noticed: 52.9% noticed some time later whilst sat at their table and 35.3% only noticed when leaving the bar.

One possibility is that certain people act in a way that makes them particularly vulnerable to bag theft. If this is the case, we might expect the same people to be repeat victims of the problem. When questioned, it was established that 90% of victims reported that they had not been a victim previously, demonstrating that there are only a small percentage of victims that fall prey to the same type of incident twice. However, it would be interesting to establish in future research whether there were any distinct characteristics possessed by those that had been repeatedly victimised. Lastly, it is important to acknowledge that victimisation does have a psychological effect on some people. A valuable point for the bars themselves to note is that 25% of victims declared that they would not return to the bar in the future, and hence planned to change their behaviour following an incident. We felt that this fact is of considerable importance. At the moment there are few incentives to

persuade the restaurant trade that crime prevention measures are linked not only to securing licenses to trade but also to important business criteria.

Crime characteristics

The survey also enabled us to establish more about the crime of bag theft itself. In terms of what was taken, in over 80% of thefts, either a handbag, a briefcase or a rucksack was taken. Thefts of mobile phones, wallets or purses as stand alone items were very rare. This confirms the patterns shown by the recorded crime analysis.

In terms of the location of bags at the time of theft, items were stolen from one of three places: 'On the Floor' (65.6%); 'Over Victims Chair' (18.8%) and; 'On the Table' (15.6), demonstrating that the floor is a particularly vulnerable place to leave a bag.

The day of the week showed no particular pattern except to note that roughly one quarter of all crimes happened on a Thursday. This is the 'late night shopping' evening for the areas surrounding the action and control sites, and hence might indicate a night on which the bars were particularly busy in the early evening.

Figure 22 shows the time theft incidents occurred. The results display a natural distribution and, interestingly, the mean hour for thefts to take place was 1800. This is not as late as might be expected. Figure 23, indicates that the majority of offences happen within the first 75 minutes of entering the bar. Together these two pieces of information tell us a lot. Thefts are not only taking place early on in the evening, they are also taking place soon after customers arrive. Further research would be needed to make any firm conclusions from this but the data seems to suggest that favoured victims are not late night revellers, made vulnerable by several hours drinking. The timing instead suggests after-work/ after-shopping customers.

Figure 22 Hour of theft incident



Figure 23 Minutes elapsed between arrival and theft incident

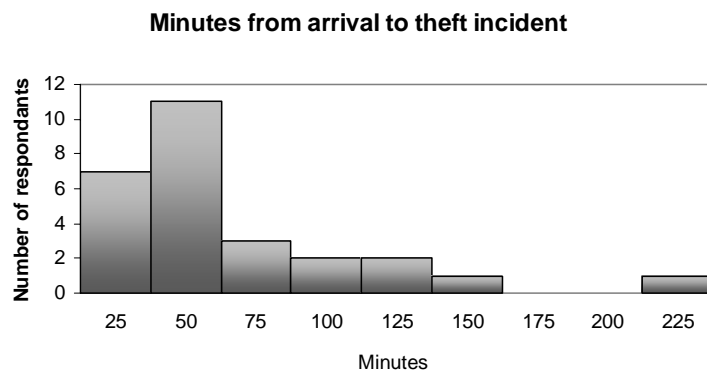
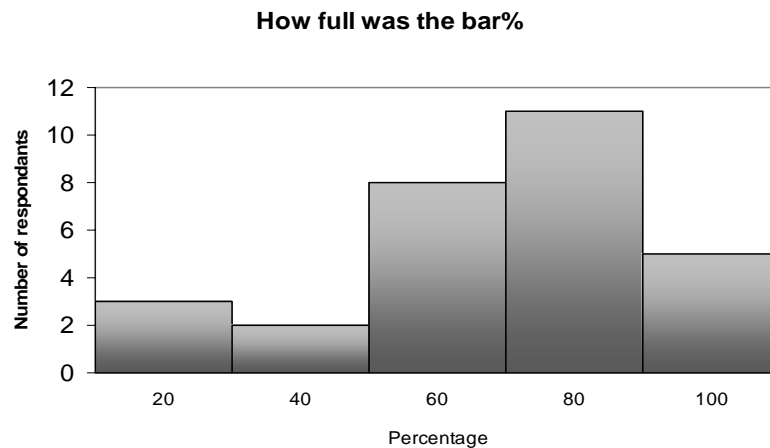


Figure 24 shows that over 80% of thefts take place when the bar is reasonably busy (60% capacity or above). This indicates that it is possibly easier for offenders to go unnoticed in busy bars. The volume of customers might also impede any attempt to pursue the offender.

Figure 24 Customer estimate of bar capacity at time of incident



9.2 Evaluation results: Self report forms

Table 10 Count of self-report theft figures before and after intervention period for action and control bar

		ACTION	CONTROL (Henrietta Street)	TOTAL
BEFORE	Count	13	10	23
	%	68	59	
AFTER	Count	6	7	13
	%	32	41	
TOTAL	Count	19	17	36

As with the recorded crime data, the self-report theft figures allowed us to compare the action and control bars in terms of the level of bag theft they suffered in the before and after period. Table 10 shows that 32% of the bag theft in the action bar occurred after the intervention had been implemented compared to 41% in the control bar. The results of a chi-square test showed that there was not a significant effect of the scheme. In other words, there were no significant differences between the extent of crime in the action and control bars between the before and after periods. The odds ratio test confirmed these results (Odds ratio value = 1.52, confidence limits between 0.39 and 5.95). NB: Unfortunately there was not time within this evaluation to adjust the intervention, i.e. to remove designs to see if a noticeable effect in the Regent Street branch occurred or could be measured.

10 Customer surveys

As part of the evaluation, a sample of ninety-seven customers from the action bar were surveyed about the use and practicality of the GRIPPA products (Appendix B). The sample was generated by visiting the bar on three consecutive lunchtimes. Everyone in the bar at the time was asked to fill out a survey form, the response rate was 100%.

Noticing the products

When asked, 55.7% of respondents stated that they had noticed the GRIPPA products within the bar prior to being asked to take part in the survey. This percentage is affected by age and increases to 63% when we look at customers aged 31+ and falls to 48% when we look at customers aged 18-30. The finding that there are age related differences has

implications in terms of alerting the target audience. Younger clientele perhaps require more active methods of alerting them to the availability of crime prevention devices. Hence, it would be useful to make the publicity appeal to younger people.

Interesting, a greater percentage of male customers (68%) report to have noticed the products compared to female customers (52%). This seems counterintuitive as the clips are currently designed to have maximum functionality for female handbags and are primarily for that purpose. The larger clips are currently being user tested with Wetherspoons and will be formally evaluated at a later date.

An alarming finding was that customers who had had their bag stolen in the last twelve months were less likely to have noticed the clips (27%) than customers who *had not* had their bag stolen in the last twelve months (58%). This indicates that those who do not pay attention to security measures are more likely to be victims. It is vital that the message gets through to those that have been victimised so that they do not suffer a repeat incident. One suggestion is to provide those that have been first time victims with guidance tailored towards safety practices that could prevent a further incident.

Of those who had noticed the clips (55.7% of those surveyed) we had an additional question to find out what it was that had drawn their attention to the clips. Table 11 shows that most customers report that they either noticed them naturally (63.6%) or were alerted to them by the in-bar publicity (18.2%). Very few had been alerted by bar staff. As a more active and direct way of alerting customers to the crime prevention options within the bar, future research could look at how increasing active publicity effects usage levels by younger customers. With one in five people here being alerted to the measures through publicity, it seems that it is certainly worthwhile to use it.

Table 11 Explanations for what drew customers' attention to the clips

Alert method	Frequency	Percentage
Just saw them	35	63.6
Publicity within the bar	10	18.2
Bar staff pointed them out	2	3.6
Other	8	14.5
Total	97	100

Using the products

Whilst it is useful to know the degree to which the products are being noticed by customers, the vital factor for effective crime prevention is whether customers are using them. The survey revealed that of the people who had bags with them, only eighteen percent were using the clips (13 people). In other words, eighty-two percent (59 people) of customers with bags were not using the clips. The reasons for this lack of use are important to consider. Table 12 displays the answers given as to why customers who had bags with them were not using the clips.

Table 12 Reasons customers gave for not using the clips

Reason for not using the clips	Frequency
Didn't see the clip	20
No clip available	10
Strap too big for clip	10
Bag too big for clip	8
There is space for bag next to them	5
Habit	4
Prefer to have bag where they can see it	3
Not enough clips	2
Bag is too heavy	2
Bag is too small	1
Total	68

The reasons given are illuminating. Few customers criticise the design of the clips as a reason for not using them. Instead the majority of reasons given can be categorised as:

- Not seeing the clips
- The positioning/absence of clips
- The design of the clips not suiting bags
- Habit

These general comments should be considered hand in hand with the findings that nearly seventy-five percent of customers asked felt that the clips and fittings were suitable for most bags and laptop cases and ninety- nine percent answered 'Yes' to the question "Would you like to see similar anti-theft measures across other bars and pubs in London". Hence, the measures were generally well received by the general public.

Customer Comments

Customers were asked to give their views on the design, practicality and usefulness of the clips. A selection of the most popular comments are shown in Table 13.

Table 13 Customer comments on design of GRIPPA clips

Comment	Frequency
“Good idea”	6
“Need them all around the table”	6
Would be better under the table”	3
“Add lock”	3
“Should be in the middle of the table”	3
“Don’t think clips are secure”	2
“Unaware of what clips are meant for”	2
“Clips are in the wrong place”	2
“Clips are in the wrong place”	2
“Not sure how the clips help”	1
“Make the clips more visible”	1

These comments suggest a number of issues that could be addressed concerning the placement and design of measures in the future. Firstly, much care should be taken regarding where the clips are located, in particular time should be allowed to respond to the victim report forms, where floor plans are marked to show the location of thefts, to understand the significance of hot spots in design terms; if possible, it would be useful to provide a measure for each chair. Secondly, some people would have preferred more measures fitted to tables than chairs. Finally, it is important to use publicity to make measures more visible and educate people concerning their use and purpose.

11 Mapping Incidents of Bag Theft

In addition to examining the volume and type of crime in the bars, to gain a more detailed understanding of the problem, the locations of the crimes were also analysed. This was done using the data collected using the self-reported theft forms. Each form included an architectural plan of the bar, and victims were asked to indicate on these where each offence took place (see Appendix A). These data were then digitised and converted to geographical grid coordinates using a Geographical Information System (GIS). This allowed the data to be mapped and 'hot' locations to be identified.

As a complimentary exercise, patrons surveyed as part of the customer survey were asked to indicate where they believed the risky locations were within the bar (see Appendix B). The purpose of so doing was to see how closely customers' perceptions of risky areas within the bars aligned with the actual 'hot' locations. A total of ninety- seven patrons were surveyed and each was asked to identify the three locations within the bar that they believed the risk of victimisation as highest.

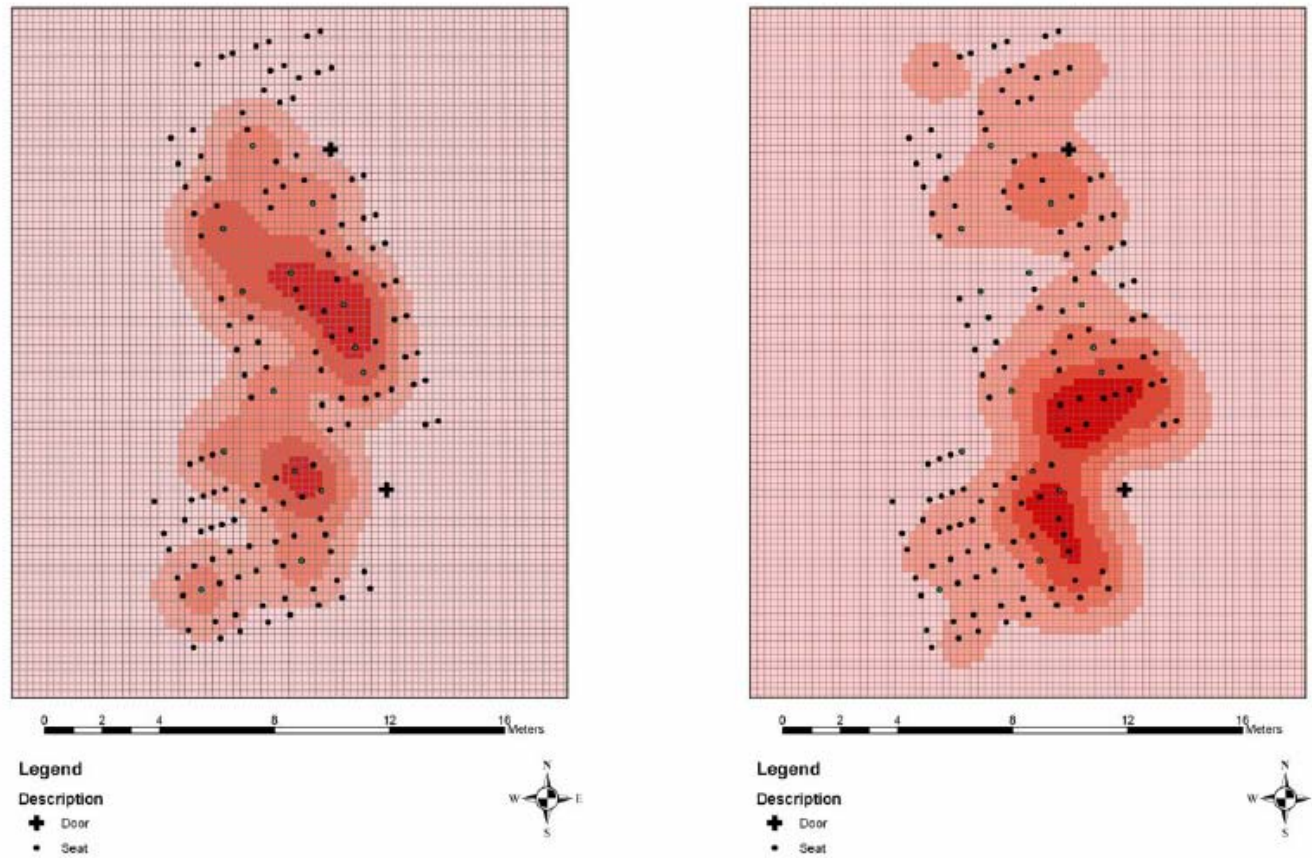
Instead of simply generating a map of the bar and then plotting the locations of the crimes, a hotspot map was generated. The reason for doing this is that pin maps can be confusing to interpret, particularly where multiple crimes occur at the same location (and hence some may be hidden). A hotspot map was also generated to visualise where patrons thought the most risky locations were, and this compared to the crime hotspot map.

To do this the data were analysed using spatial analytic software known as CrimeStatII. For each map, a grid which covered the bar area was generated with a series of 1m x 1m cells, and a kernel density estimation technique used to calculate the risk intensity value for each cell. The risk intensity values essentially indicate the extent to which crime (or perception of it) was concentrated at each location. A smoothing function is also applied to make the morphology of the maps more elegant and interpretable.

The two maps were then imported into ArcGIS and displayed over a simple architectural plan of the bar which indicated the positions of seats within the bars and where the doors were located. They show where crimes occurred and where patrons perceive the risk of crime to be highest respectively. These are shown as Figure 25. The areas shaded darkest are those where the risk was actually or perceived to be highest. The results are somewhat similar but there are clear differences. Patrons perceive the risk to be clearly highest around the south door. Whilst the concentration of crime in that area is quite high, the actual hot areas are located a little further away, with much of the crime equidistant between the two doors.

Although the crime hotspot map was based on a relatively small number of observations (N=19), it illustrates that people's perceptions of risk within the bar were not entirely consistent with the actual 'hot' locations. Nor are they necessarily consistent with what

crime reduction practitioners might think. We suggest that the latter (along with ourselves) would most likely suggest that the tables closest to the doors would be at the greatest risk. Whilst this is to some extent correct, it is by no means the complete picture. Clearly, if such an intervention were again implemented in this type of environment, if total coverage of the bar is not possible, it would be wise to conduct this type of exercise to identify the 'hot' locations so that the measures can be installed at those locations where the risks are highest.



Actual (N=19) and perceived (N=219) risk locations within the bars

Figure 25 Actual and perceived risk of crime

12 Conclusions

We believe that the evaluation should be seen as a scoping study that will create enough information and experience to lead to the creation of more sophisticated evaluation protocol and design process. Evaluation is always a complex and risky business and much useful knowledge about measuring DAC has gauged form this report. This evaluation work is unique and original in its development and will be of benefit to many stakeholders.

The initial evaluation in this document has revealed the primary strength of the Grippa design project to be connected to:

- a socially responsive design process that can address issues of the user sensitively whilst offering crime reduction possibilities
- a range of furniture and furniture accessory prototypes that if tested in a wide enough sample may lead to significant crime reduction effects
- clear principles/ mechanisms of intervention effectiveness and a practical methodology.

The report has described the implementation of such products through an anti-bag theft intervention in a bar in Westminster. It has also assessed the effectiveness of the measures at reducing the bag theft problem and analysed customer feedback concerning the use of measures. A number of conclusions can be drawn from the analysis presented here. First, the theory behind the measures was sound in terms of the mechanisms by which they would reduce crime. Second, the bar that was identified as the ‘action’ bar was well chosen; it had a fairly high level of bag theft and actually suffered a surge in the problem during the lifetime of the evaluation. Third, problems facing the implementation of measures included; finding companies in the entertainment industry that were willing to adopt the measures and making some compromises to allow them to function as effectively as possible. It is important to work with agencies who can use leverage to assist in this process (but it should be made clear that the leverage of the police to make the interventions, does not affect the results of the effectiveness or public perception), such as the Metropolitan Police in this example (e.g. Tilley and Laycock 1995). Fourth, there are some characteristics of bag theft incidents that should be noted; offenders tend to snatch unattended bags from the floor, at times when the bar is busy and often during the

early evening; both men and women tend to lose bags, but handbags are particularly vulnerable (and the contents are not taken alone as frequently), but victims tend to be in the younger age groups; people often lose bags fairly soon after they enter the bar, and that thefts can go unnoticed for fairly substantial amounts of time. Fifth, it appears that in the short time covered by the evaluation period, the measures did not attract significant reductions in crime. Having said this, when compared to trends in the control bar at Henrietta Street, reductions in bag theft in the action bar did look favourable. Sixth, there were some problems with hurried and incomplete implementation. The most serious of these, were the pressure to move the intervention forwards in time, and problems with publicising the measures. This latter point is of crucial importance; a substantial percentage of the customers had not noticed the measures and hence were very unlikely to use them! Seventh, certain groups of people were less likely to notice the measures, notably, the young and those that had suffered bag theft within the last year. Last, the feedback concerning the measures was generally very positive, although some people found the measures impractical for their particular bags or suggested different locations for the clips in order to make them more accessible.

Despite the hurdles faced, we feel the project has been a success and that the primary weaknesses of the project are connected to the following unanticipated issues which we are confident could be addressed in future:

- to allow more time for adjusting prototypes; compromises meant Grippas not always fitted to furniture in best way, these problems could be addressed in the future
- feedback revealed Grippas were not always located where objective risk was highest in the bar and this could also be addressed at user testing stage
- feedback revealed Grippas were not always the right size/ shape for function – more time to test the range of designs on users is needed
- chairs and/or tables with anti-theft features were not installed at every seating station. In future projects this should be rectified.
- delays in implementation – short post-intervention period reduced statistical power of tests
- too few trial/ control sites initially – vulnerable to site dropout; and hence too weak statistical power due to local ‘history’/ ‘random’ fluctuation

- events did prove unkind – target site did drop out, and timing became driven by blip in target bar – this confounded measurements and introduced possibility of regression to mean

All of the above could be remedied individually, in theory, by spending more time/ money/ effort patching the gaps and faults at the relevant stages. At a more strategic level it may be necessary and fruitful to devise a procedure for assessing/ managing the risk of evaluations like this one that focuses on the impact of the security product. The purpose of the procedure would be to enable all parties (e.g. host, implementer, evaluator, sponsor) to understand the risks involved and to agree to a fairly tight set of obligations covering a range of contingencies. In terms of maximizing value and minimizing wasted effort, one could envisage a series of break points at each of which the questions would be asked whether it was worth proceeding with the evaluation. If at any such point there was again partner failure to the extent the exercise was judged unlikely to give a reasonable chance of a clear answer or a fair test, it could be stopped rather than flogged onward, and effort could be spent elsewhere.

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Glossary

Dipping also known as pickpocketing. Involves discrete access gained through bag or pocket. Item is taken quickly, the victim unaware of the offence taking place.

Lifting, gripping, snatching – see www.designagainstcrime.com

Distraction offender uses a ploy to divert the victim's attention away from the offences taking place. [Can involve: holding up a leaflet of some sort (tube map/begging card) so that the victims property lies behind the leaflet and can be grabbed and taken and; making conversation with the victim to gain trust and some time later removing the victims property].

Snatched property is taken overtly by “snatching” the property and hastily exiting the premises. Often force is used to pull the property from the victim.

Unattended the removal of property from a static location whilst the owner is inattentive or the property is left some distance away from the owner.

Appendices

Appendix A: Self-Report Theft Form

<p>INCIDENT RECORDING SHEET</p>	<p>Mitchells & Butlers</p>	<p>METROPOLITAN POLICE <i>Working for a safer London</i></p>	<p>DESIGN AGAINST CRIME</p>
<p>Name: _____ Age: <input type="checkbox"/> 18-23 <input type="checkbox"/> 24-30 <input type="checkbox"/> 31-40 <input type="checkbox"/> 41-50 <input type="checkbox"/> 50+ <input type="checkbox"/> Sex: <input type="checkbox"/> M <input type="checkbox"/> F</p>		<p>When did you notice the article missing?</p> <p>a) Going to bar <input type="checkbox"/></p> <p>b) coming back from bar <input type="checkbox"/></p> <p>c) Going to toilet <input type="checkbox"/></p> <p>d) Coming back from toilet <input type="checkbox"/></p> <p>e) Going to dance <input type="checkbox"/></p> <p>f) coming back from dancing <input type="checkbox"/></p> <p>g) Going to cigarette machine <input type="checkbox"/></p> <p>h) coming back from cigarette machine <input type="checkbox"/></p> <p>i) Getting up to leave the pub <input type="checkbox"/></p> <p>j) whilst sitting at a table <input type="checkbox"/></p> <p>k) Whilst standing elsewhere <input type="checkbox"/></p>	
<p>Contact number: (in case we find your possessions) _____</p>		<p>What time did you arrive at the bar? _____</p>	
<p>Date of incident: _____ Time of incident: _____</p>		<p>What day of the week is it? Mon <input type="checkbox"/> Tues <input type="checkbox"/> Wed <input type="checkbox"/> Thurs <input type="checkbox"/> Fri <input type="checkbox"/> Sat <input type="checkbox"/> Sun <input type="checkbox"/></p>	
<p>How long have you been at the bar at the time the incident was reported (approx %)? _____</p>		<p>Where was this at the time? <input type="checkbox"/> On the table <input type="checkbox"/> On the floor <input type="checkbox"/> Over your chair</p>	
<p>Please indicate below whom were you sitting/standing (X on floor plan)</p>		<p>At the time, were you: <input type="checkbox"/> Sitting at a table at the time <input type="checkbox"/> Standing</p>	
<p>What was taken? <input type="checkbox"/> Handbag <input type="checkbox"/> Briefcase <input type="checkbox"/> Backpack</p> <p><input type="checkbox"/> Mobile Phone <input type="checkbox"/> Purse <input type="checkbox"/> Wallet</p> <p><input type="checkbox"/> Cash <input type="checkbox"/> Keys <input type="checkbox"/> Credit cards</p>		<p>What time did you arrive at the bar? _____</p>	
<p>Other (please specify) _____</p>		<p>How many alcoholic drinks have you had tonight? _____</p>	
<p>Where was this at the time? <input type="checkbox"/> On the table <input type="checkbox"/> On the floor <input type="checkbox"/> Over your chair</p>		<p>Would you return to this bar in the future? _____</p>	
<p>At the time, were you: <input type="checkbox"/> Sitting at a table at the time <input type="checkbox"/> Standing</p>		<p>Please add any other information you may feel is relevant:</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p>	
<p>Did you see the incident occur? Y/N _____</p>		<p>Do you intend to report the incident to the police? Y/N _____</p>	
<p>If yes, what happened? _____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p>		<p>Of the people you were sat/talked with, how many were: Male _____ Female _____</p>	
<p>Have you been the victim of crime in a bar before? Y/N _____</p>		<p>If so, how many times this year? _____</p>	

All bar One Islington Venue Please mark **X** on this diagram whereabouts you were sitting or standing in the venue.

REGENT STREET



MARGARET STREET

Thank you for taking the time to fill this form in. This information is important for future crime reduction.

Appendix B: Customer Survey



METROPOLITAN
POLICE

Working together for a safer London



BAG THEFT PREVENTION MEASURES: CUSTOMER SURVEY

Dear Customer,

We hope that you have noticed the anti- theft features that have been installed at Regents Street All Bar One for your protection and peace of mind. The fittings on the tables and chairs you can see, and are hopefully using, have been created by Central St Martins Design Against Crime team. The anti-theft chairs and tables give you the customer the facility to dramatically reduce your risk of becoming a theft victim.

In order to maximise this facility and to protect yourself from theft in bars and pubs across London, we ask that you take 2 or 3 minutes to answer some questions.

Jill Dando Institute

1. Date: _____
2. Time: (please circle) *Lunch* *Afternoon* *Early Evening* *Night*
3. Gender: (please circle) *Male* / *Female*
4. Age: _____ Yrs

5. Had you noticed the brass anti-theft clips and fittings before reading this survey?
(please circle) *Yes* *No*

- 5b. If yes, what drew your attention to them? (please circle)
Just saw them *Bar staff pointed them out* *The publicity within the bar*
Other _____

6. Do you have a bag/laptop case with you today? (please circle) *Yes* *No*

7. Are you using the clips today? (please circle) *Yes* *No*

8. If you are not using the clips, why do you think that is?

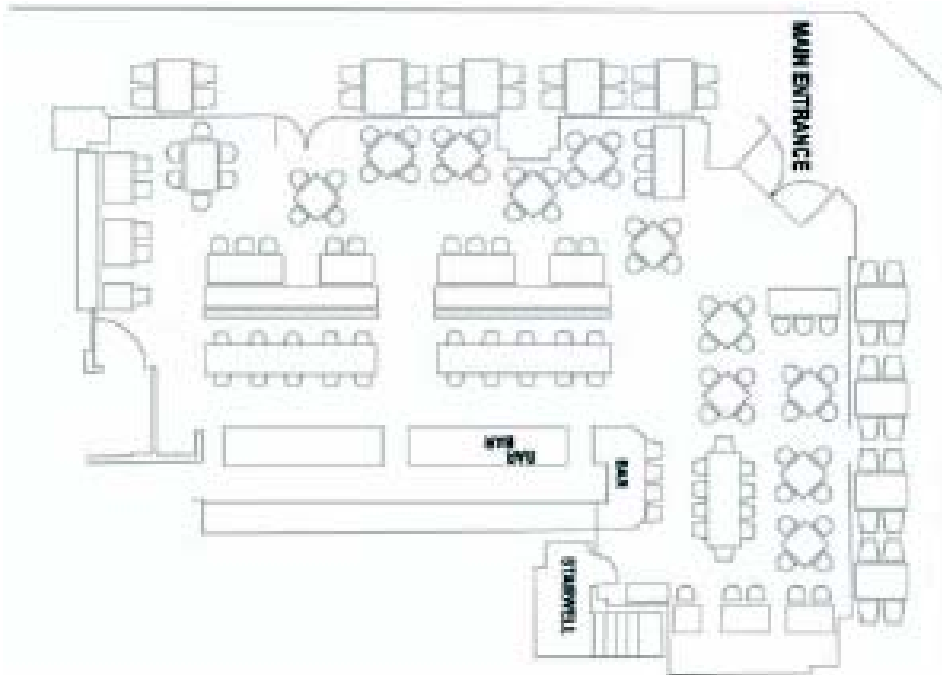
9. Do you think the clips and fittings are suitable for most bags/ laptop cases?
(please circle) *Yes* *No*

10. Would you like to see similar anti-theft measures across other bars and pubs in London? (please circle) Yes No

11. Do you have any further comments about the clips and fittings? For example; the design, comfort, practicality.

12. Have you had your bag stolen in the last 12 months? (please circle) Yes
No
PTO

13. Please mark on the map below where you are sitting today.



14. Lastly, please mark on the map below, the top three tables that you think individuals would be most likely to have their bag stolen from. Please use an x of this size (X)

