



HILLINGDON
LONDON

Hillingdon Improvement Programme

Options for a Resident Entitlement Card

Full Report Version

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Contents

<u>1.0 Section One - Summary</u>	Pages 3 – 4
1.1 Five Key Tests	Page 3
1.2 Summary of recommendations	Page 4
<u>2.0 Section Two – Research and Information</u>	Pages 5 - 30
2.1 Business Case for a Smartcard	Page 5
2.2 National and Regional Smartcard Organisations	Page 9
2.3 Local Authority Smartcard Schemes	Page 14
2.4 Private Sector Smartcard Schemes	Page 19
2.5 Sounding Out Hillingdon Residents and Business	Pages 21 – 28
2.6 What did residents think?	Page 21
2.7 What did business think?	Page 26
2.8 Existing Hillingdon Cards	Page 29
2.9 Which Type of Card	Page 30
<u>3.0 Section Three – Options for a Hillingdon Card</u>	Pages 31 – 38
3.1 The Five Key Tests for a Hillingdon Card	Page 31
3.2 Options for a Hillingdon Card	Page 36
3.3 Step One: Which council services should be included?	Page 36
3.4 Step Two: Which partner services and features should be included?	Page 37
3.5 Step Three: Which additional features and benefits should be included?	Page 37
3.6 Step Four: Which type of card?	Page 38
3.7 Step Five: Which back office systems should be included?	Page 38

1.0 Section One - Report Summary

The Hillingdon Improvement Programme (HIP) is currently implementing improvements to the council's customer relationship management systems. In June 2007 members asked officers to look at the options for introducing a Hillingdon resident's smartcard.

The option of introducing a Hillingdon smartcard is being explored as part of the HIP customer focus project. This report will provide members with relevant up to date smartcard information covering the options and benefits of implementing a resident's entitlement 'smart-card'.

This report has been constructed in three sections. The first section gives an overall summary, including objectives and recommendations. The second section will provide members with research and information. The third section will look at whether a resident's smartcard is available that can satisfy five key tests set down by members. It will then take members through a series of options and possibilities for introducing a Hillingdon resident's card: a 'build your own card' menu.

There is also a summary version of this report for the HIP steering group and a third document containing full details of the evidence gathered during the research.

The research for this report included a 'sounding out' programme to get views from residents and local business. The results of this are summarised in section two and referred to throughout the report where relevant. The full results of the consultation are in the separate evidence document.

1.1 Five Key Tests

When asking officers to look at the feasibility of a resident's card, members set down five key tests that should be met if a card is to be introduced. These are:

1. A card scheme that will enable us to build up the basics first, so that we can be sure it will work. Then it can become bolder in its ambition in the medium to longer term.
2. A card that is fit for the 21st century customer experience. Many residents now prefer to 'self serve' and access council services at a time that suits them.
3. A card that is helpful and delivers what residents need, without appearing paternalistic.
4. A card that will help us be one council internally and 'team Hillingdon' externally.
5. A card that assists us to build effective partnerships.

The research and information contained in this report demonstrates that a card can be introduced in Hillingdon that passes these five key tests. This report will return to explore this further once the reader has been briefed on background context and current card schemes in operation.

1.2 Summary of Recommendations

- A Hillingdon resident entitlement smartcard should be introduced as the five key tests can be passed.
- The card should be introduced in phases to minimise risk.
- A pilot first phase should be implemented with staff ID badges and access. This has lower public profile risk and will assist with overcoming any initial teething issues.
- The second (public launch) phase of the card should be with library services and multi-storey car parks, plus six larger car parks. Street parking and smaller car parks do not currently provide a viable business case for inclusion.
- The card should include an e-purse to enable the cardholder to purchase goods and services with the card. A commercial partnership should be entered into with either the council's current banking partner or one of the credit card organisations to provide this, depending on where best value can be achieved.
- The public launch phase should include discounts for cardholders in local shops and restaurants / cafes.
- Phase two should include web site back up for card services including card e-purse top up. This should be improved over time to include useful information and recommendations.
- Phase three should include leisure services, rent and sundry payments, civic amenity sites and a pilot at Ruislip High School.
- Phase four should include council tax payment and schools
- Each service / project added should be business case led and funded by the identified savings, unless otherwise instructed as a council priority.
- Further consideration to be given to including the Oyster functionality for travel on London transport from phase three onwards.
- Additional services, such as access to adult social care can be explored and included as opportunities arise.
- Further phases can include additional rewards and benefits linked to council and local area agreement priorities.

2.0 Section Two – Research and Information

2.1 Business Case for a Smartcard

The qualitative business benefits to local authorities introducing a resident's smartcard are well publicised and promoted by smartcard organisations. Some members may be aware of them from a previous report presented to the HIP steering group in February 2006. A summary is given below:

Qualitative Business Benefits
<ul style="list-style-type: none">• Citizens desire for smartcards that enable them to self serve at a time suitable to them• Contribution to the E-government agenda• Branding and Public Relations – the council may be perceived as more modern• Better management information and customer intelligence, to target services and resources more effectively• Social inclusion – reducing stigmas attached to claiming benefits and free school meals• Facilitate cross boundary services• New partnership opportunities – for example with TFL and local business

Business benefits for specific services are:

Library Services

As a single application the business case for a smart library card would never “stack up”, however there are many benefits and added values to libraries in being part of a multi-application card scheme

- Use of a purse for fines and purchases
- Allow self-service including payments for PC's, photocopying
- Increased number of service users / members
- Out of hours access to areas of the library
- Joint promotions / discounts with other services
- Enrolment process no longer required.
- Auto entitlement to concession from card

Leisure

Similarly, the leisure service can also achieve benefits and added value from being a part of a corporate scheme

- Fast track, unmanned access for pre paid bookings
- Auto entitlement to concessions
- Cashless environment.
- Promotions and discounts e.g. frequent user
- Joint schemes e.g. healthy life style reward schemes
- Increased number of service users / members
- Enrolment process no longer required

Schools / Cashless Catering

Cashless catering is already in place in a *number* of schools in the borough bringing with it the potential benefits of:

- free meals without stigma,
- reduced bullying,
- increased sales
- Less cash handling.
- Each school could also add value by extending the scheme to include other services such as
- registration,
- door access to improve security
- Reward schemes e.g. merit points for extra curricular activities or healthy eating.

Less well publicised are business cases that have constructed a cost for smartcards based on financial modelling.

West London Alliance Business Case

The West London Alliance commissioned RSE consulting to construct a business case with a report published in November 2005. Some members may have seen this previously as it was reported to the HIP steering group in February 2006. The business case model looked at three options for a smartcard:

- A single borough card
- West London boroughs introducing a card in partnership
- West London borough introducing a card in partnership with TFL

WLA Partnership vs. Single Borough Implementation:

This presents a comparison of the base-case payback per authority working in partnership with all other WLA authorities, versus the base-case payback per authority working individually (in both cases with authorities issuing cards with multiple functions).

The difference in payback stems from the economies of scale exploited from working in partnership; economies that are impossible for an individual authority to enjoy.

£000's	Setup	Year 1	Year 2	Year 3	Year 4	Year 5	Total
Single Borough (Base-case)	The payback from a single WLA borough issuing multiple-function Smartcards in isolation (using base-case assumptions)						
Cost	531	1,002	333	505	274	274	2,918
Benefit	0	7	60	118	128	134	448
Cashflow	-531	-994	-273	-388	-145	-139	-2,470
Payback	-531	-1,525	-1,798	-2,185	-2,331	-2,470	
Partnership (Base-case)	The payback from a single WLA borough issuing multiple function Smartcards in partnership with all WLA boroughs (using base-case assumptions)						
Cost	432	851	259	426	235	235	2,437
Benefit	0	7	60	118	128	134	448
Cashflow	-432	-844	-199	-308	-106	-100	-1,990
Payback	-432	-1,276	-1,475	-1,783	-1,889	-1,990	

WLA Best-case TfL partnership scenario:

Partnership (Best-case) The payback from a single WLA borough issuing multiple function Smartcards in partnership with all WLA boroughs (using best-case assumptions). This model assumes that existing Oystercard top-up technology is used and therefore no extra top-up machines are required

Cost	225	471	145	216	160	160	1,377
Benefit	0	24	121	260	303	334	1,042
Cashflow	-225	-447	-24	44	143	174	-336
Payback	-225	-672	-696	-653	-510	-336	

This business case shows a best-case scenario of a smartcard costing £336,000 after 5 years, if all the WLA boroughs work in partnership with TfL.

The option to develop a card alongside other west London boroughs may be more cost effective, but currently only Brent are actively involved in developing a smart card.

The WLA business case was based on an implementation strategy that would include services in a smartcard scheme in the following phases:

1. Level one authentication – this is for service transactions such as paying fines or identification to benefits staff
2. Parking Services
3. Leisure Services
4. Library Services

No other local authority has introduced parking services as the first phase service on a smartcard due to the start up and implementation costs. Smartcard use for multi-storey parking schemes is more cost effective than street parking machines, particularly in Hillingdon where customers are often only paying 40p for each transaction.

The most cost effective service for local authorities to include is leisure services and then payment of rent and council tax followed by library services.

Both Waltham Forest and Bolton have constructed business cases for introducing smartcards that follow alternative phased programmes. These are summarised later in this report.

Property of the London Borough of Hillingdon

2.2 National and Regional Smartcard Organisations

The government set out a policy framework for Smart Cards in July 2003 as part of their Modernising Government agenda. The policies developed in this framework are:

- To achieve a compatible infrastructure for smart cards throughout government and industry. Suitable smart card standards and specifications will be mandated through the e-Government Interoperability Framework (e-GIF).
- To promote an integrated and coordinated approach to smart card schemes within the public sector. Any business case for smart card schemes should consider wider government objectives, partnerships with the private sector and harmonisation with neighbouring public sector smart card schemes.
- To safeguard citizens rights and guarantee data transparency. As well as complying with the Data Protection Act, any data stored on the card should be readily accessible by the cardholder.
- To enable the delivery of secure government services and e-commerce.

The National Smart Card Project (SMART) was established in 2002 as part of a series of national projects forming part of the overall e-government programme identified in the National Strategy for Local e-Government.

The National Smart Card Project involved English local authorities, central government departments, and private sector organisations. The project was structured around the delivery of ten work packages:

	Work Package	Lead Organisation
1	Project Management	Bracknell Forest Borough Council
2	Business Case / Model	Southampton City Council
3	Standards	London Connects
4	Procurement Models	North East Regional Smart Card Consortium
5	Links to Central Government and other National Initiatives	Department of Education and Science
6	Commercial Applications	Southampton City Council
7	Cross Region Delivery Applications – e-purse, Transport & Authentication	Bolton MBC
8	Legal/Data Privacy	London Borough of Newham
9	The Smart Card Starter Pack	Cornwall County Council
10	Dissemination	Doncaster MBC

Bracknell Forest Borough Council took ownership and control of the project and its products, including the SmartConnect software, on 20 July 2005.

SmartConnect – Bracknell Forest Borough Council

SmartConnect, is a citizen registration database and card management system developed for local authorities.

SmartConnect enables organisations to upgrade and modernise their existing card schemes so they can meet current and anticipated Government requirements.

The software can register citizens and authenticate them, track data and record entitlements, issue cards - which can be smart, magnetic stripe or bar code - and store scanned documents. There is the option to modify the printer drivers to allow compatibility with existing card scheme systems (such as magnetic stripe or bar code).

Some of the local authorities involved in the project have introduced smartcard schemes in their boroughs. A summary of some of these is provided later in this report.

There are a number of national organisations that can assist local authorities to develop and implement smartcards:

Local Authority Smartcard Standards e-Organisation (LASSeO)

LASSeO was created to maintain and update the output information from the National Smartcard project. LASSeO is concerned with developing smartcard standards and specifications for the public sector and as such reduce the risks caused by a lack of agreed standards.

Smart Card Networking Forum (SCNF)

The SmartCard Networking Forum is a group of public sector representatives, currently from 347 organisations throughout the UK. Representatives are involved in using, planning to use or simply interested in exploring the use of smart cards to improve services to their customers. The Forum's objectives are to:

- exchange ideas and information about the use of smart cards in local government
- share implementation experiences and issues
- explore the potential uses of smart cards
- investigate ways of working within both public and private sector
- research external funding possibilities

Integrated Transport Smartcard Organisation

ITSO was set up in 1998 to build and maintain a common specification for tickets used for public transport. This enables customers to use different transport operators with one ticket. The income received from the customer can then be distributed to the relevant transport operators.

The Membership of ITSO is broadly based and includes PTE's, Local Authorities, Passenger Transport Operators and Suppliers of equipment, systems and services.

A national concessionary travel pass scheme is being proposed by the Department for Transport to be implemented from April 2008. This scheme requires smartcards used for concessionary travel purposes to be ITSO compliant.

There are also a number of London regional organisations that are promoting the use of smartcards and that can assist local authorities to develop and implement smartcards.

London Connects

London Connects is an organisation funded and created by London Councils and the London Development Agency to support and encourage the adoption of new technology throughout the public sector. London Connects brings together local and regional partners to support the delivery of the e-government agenda across the capital.

London Connects are promoting the creation of a single smartcard scheme for London called 'Your London Card'. In 2006 they facilitated two working groups to develop this concept further. More than 20 local authorities attended as well as representatives from regional bodies such as Transport for London and London Libraries Development Agency. This led to the creation of the Your London Card Executive Group with boroughs represented sub-regionally. The project has so far:

- Adopted a London-wide card specification, the 4K Mifare card
- Obtained international APACS numbers to enable payment functionality
- Applied to PASS for a proof of age scheme
- Procured 50,000 4K Mifare cards through LB Kingston. Other boroughs can access surplus cards and procure more cards through this framework without needing to procure separately.
- Obtained an initial proposal from Transys/Tfl to include the Oystercard functionality

London Connects proposes that the Your London Card should be multi-branded so that individual boroughs can promote their identity, as well as including other brands such as Oyster. One side of the card will be borough branded and the reverse side Oyster branded.

London Libraries Development Agency (LLDA)

The LLDA commissioned Price Waterhouse Cooper to explore the feasibility of a single membership card for London's public libraries. The recommendations of the report are only just being taken forward. They include establishing how many boroughs wish to proceed, funding sources, communication strategy, market research, developing a more detailed business case, establishing protocols, minimum standards for membership and researching the likely level of stock transfer and movement across boroughs.

Seven London boroughs that currently use the DS 'Open Galaxy' Library IT system are now collaborating to develop a cross borough scheme. Brent and Richmond are the only west London boroughs involved in this collaboration. Hillingdon does not currently use the DS Open Galaxy system.

Resident Sounding Out – Library Services

When asked which services residents would find it most useful to access with a smartcard, Library services was the most frequent response, with 318 out of 387 residents stating this would be useful or very useful.

Transport for London Oyster Card (TFL)

TFL, on behalf of the Greater London Authority, have introduced a London wide transport smartcard scheme called Oyster. Transys Ltd carries out operational delivery and administration of the Oyster scheme on a long term contract. The Oyster scheme has a rigorous approach to branding that encourages consumer confidence, as well as offering significant travel discounts that increases usage.

The inclusion of Oyster functionality is logical for London borough cards as the technology is already proven to work, there are many London resident service users who access borough services as well as travel on public transport.

Four London boroughs have run pilot smartcard schemes that included Oyster functionality. However, the addition of Oyster was not successful due to a variety of reasons including cost, card supply and printing issues.

Having Oyster on the card is good from a customer recognition value, but for the great majority of local authority services customers, it may not add practical value. There was a low take up of less than 4% of customers using the Oyster function of their borough card in the pilot schemes.

London Connects is negotiating a proposal for the inclusion of Oyster in the Your London Card. Oyster currently utilises a 1K Mifare card and is compatible with the 4K Mifare card. The costs given by Transys for the proposal are proving to be the main barrier to agreement. These are:

- £256,000 London wide costs, for development of a generic legal agreement, testing and project management, plus,
- £78,000 costs to each borough, for testing, communications, encoding and amendments to the legal agreement.

Officers contacted Transys to establish the costs for a partnership with Hillingdon. Costs for a single borough card based on 10,000 cards is still £78,000 as per the London Connects proposal. Transys estimate that each additional card thereafter will cost £1.

Resident Sounding Out – Travel on public transport

When asked which services residents would find it most useful to access with a smartcard, Travel on public transport was the second most frequent response, with 300 out of 387 residents stating this would be useful or very useful.
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2.3 Local Authority Smartcard Schemes

As part of the HIP project officers visited and surveyed other local authorities, both in London and nationally, who have introduced smartcard schemes. Some of these authorities were participating in the SMART project mentioned previously. Full details of the surveys of other local authorities can be found in appendix C.

Outside London

Bolton MBC

Bolton Smart was introduced in 2006, although it was initially piloted using staff ID cards in 2005. Bolton Smart enables residents to access Library and Leisure services as well as bus travel, including the concessionary bus pass. There are currently 11,000 cards in circulation with a target of 40,000 by April 2008.

Bolton Smart is also an e-purse enabling purchases on the card by pre-payment at many local commercial and council outlets. Bolton has formed a partnership with SQUID who operate the e-purse function. Local shops have SQUID readers integrated with debit/credit card chip and pin machines. SQUID provided the card readers and technology in exchange for a 1.5% commission on transactions. This is fairly consistent with the charges Visa levy. 6% of the total commission earned by SQUID is paid to Bolton council, estimated to be £27K per year.

Business Sounding Out – Pre pay card and commission charges
As part of the HIP project local business was asked whether they would support a pre pay card scheme that would enable residents to purchase goods in their premises. 75% of business responded yes. Businesses were also asked whether they would still support card transactions if there was a 1.5% commission. 12 out of 20 responded yes. 2 others responded that they would like to negotiate this down to around 1%.

Another feature of Bolton Smart is the inclusion of the Youth Opportunities Scheme; where to promote positive activities SQUID is programmed to only accept 'positive' purchases made with the card e.g. leisure and libraries

Bolton Smart is a high specification Java card, the JCOP31 with 72K of memory. Bolton estimates that the cards cost £7 each, including printing, postage, management and enrolment.

Bolton received £600K of funding from the government as part of the SMART project covered previously in this report. Their work package as part of the project was to pilot card use for e-purse, transport and resident authentication.

The Bolton Card project implementation strategy is in the following phases:

1. Libraries and leisure services
2. Transport

3. Staff ID and Access
4. Rent payments
5. Schools
6. Car Parking
7. Voting and digital certificates

Set up costs were estimated at

- Capital Costs £261,000 over 5 years - to be offset against existing e-government provision
- Revenue Costs £426,000 over 5 years – to be offset against £365,000 existing revenue budget for card services

There is no initial charge to residents for the card. Residents are charged for lost or broken cards.

Bracknell Forest BC

E+ was introduced by Bracknell Forest in 2001 and there are now 56,000 cards in circulation. The card enables residents to access library and leisure services as well as benefiting from discounts in local shops. E+ was also part of a Pathfinder scheme for the Department for Education and Science to introduce smartcards into schools. E+ enables children to register their attendance at schools and enables cash-less catering. In LB Hillingdon, Ruislip High School has already introduced a similar scheme, which this report will cover later on.

E+ received external funding from DfES for the schools element and funding from the ODPM for the leisure services element.

E+ is a Java card, the JCOP30 that has now been superseded by the JCOP31 used by Bolton MBC. E+ cards cost an average £6 each.

Bracknell Forest led the ODPM supported National Smartcard Project.

Residents are not charged for the first card but are charged for lost or broken cards on a discretionary basis.

Southampton City Council

Smart Cities was originally introduced by Southampton in 2002 but was re-launched with more functionality in 2005. Phase one in 2002 enabled cash-less school vending. In 2005 the Smart Cities also incorporated bus passes, library and leisure services, as well as a proof of age and donor card. There are now 30,000 cards in circulation.

Smart Cities opened up new partnership working opportunities with UK Transplant, the NHS Organ Donor Register, and PASS for proof of age. In the future Smart Cities will include shopping discounts, parking payment schemes and extended travel usage.

Smart Cities was originally based on the Java card costing an average £6. Smart Cities has now switched to using the 4K Mifare card reducing costs considerably to 85p per card per 10,000 cards ordered.

There is no charge to residents for the card.

Aberdeen City Council

Accord Card was introduced by Aberdeen at the end of 2003, with over 63,000 cards now in circulation. Accord is mainly aimed at younger people including cashless vending and catering in schools, concessionary bus and rail pass, access to leisure services, proof of age (PASS hologram accredited), rewards and information for young people.

Accord also has a points reward system to encourage healthy eating in schools.

Accord card is currently a Slumberger card but is being changed to the Java JCOP card so that it is ITSO compliant for the Scottish National Entitlement Card (concessionary travel). Cards cost Aberdeen an average £5 each.

There is no charge to residents for the card. Residents are charged for lost or broken cards.

London Region

No London boroughs have yet introduced a truly multi-functional smartcard scheme. Several boroughs have introduced cards that they aim to develop into multi-function smartcards.

LB Waltham Forest

OneCard was introduced by Waltham Forest in 2007, with 11,000 cards in circulation. OneCard enables residents to pay council tax, rents and sundry charges and is also a staff ID and access card. The next phase will enable library services followed by leisure services and schools. Waltham Forest is one of the boroughs using the DS Open Galaxy Library system.

OneCard is a 4K Mifare card costing an average of £1.30 per card. The card is procured through the London Connects contract with one side of the card already branded. Waltham Forest then uses a contractor called Unicard to print the other side with their brand.

They budgeted £125K for project start up costs and predict they will save £150K over 5 years. The OneCard project implementation strategy is in the following phases:

1. Payment of Council tax, Rent and Sundries and a pilot of staff ID and facilities access
2. Libraries

3. Staff Access
4. Leisure Centres
5. Schools
6. Migration to a potential London Olympic Card

Feedback so far from Waltham Forest is that they are on track to achieve their business case aims. They employed a consultant to assist with implementation and project management, for which they budgeted £70K.

Waltham Forest employed a consultancy called SmarTran to provide smartcard expertise and implementation.

There is no charge to residents for the card.

LB Newham

The Newham Connects card was introduced around four years ago. The original plan was for the card to come with Oyster functionality. Newham used the same card supplier as Oyster, but this caused problems. Oyster had a very high new take up rate at the time and their card supplier could not meet their demand. As Newham was only ordering a comparatively small amount of cards compared to Oyster, their supply of Newham branded cards was unpredictable.

Currently Newham Connects enables residents to access libraries and leisure centres.

Newham Connects is not a multi-functional smartcard where one microchip houses several functions that enable access to services. Newham Connects is one card using different technology systems, meaning that residents have to activate the card by making a new application when accessing different services. For example, if they currently use the library but want to use a leisure centre, they will still have to make an application and give their details to leisure services even though they can use the same card.

There is no charge to residents for the card.

LB Greenwich

The Greenwich Card was originally launched in 1994 but its momentum faded until the Millennium Dome exhibition opened in 2000. Greenwich Card holders benefited from a discounted admission to the Millennium Dome that resulted in a significant boost in subscriptions to the card. There are now 40,000 cards in circulation. The Greenwich Card enables residents to access leisure facilities and benefit from discounts in local shops.

Greenwich run promotional campaigns and competitions through the card and have set up email alerts to card holders informing them of borough events, special discounts and council information.

The Greenwich is a barcode swipe-card rather than a smartcard. The Greenwich Card uses the technology systems of Greenwich Leisure, the contractor they tendered to run their leisure services.

However, there was a pilot to integrate Oyster onto the Greenwich Card and a pilot scheme with 2000 cards was launched. This was not successful due to the associated costs and necessary change in technology.

The Greenwich Card costs an average £2 per card. Residents are charged an annual subscription fee to join the scheme. This is currently £2, with a £1 concessionary rate for those on benefits. There is also a corporate subscription to the scheme costing either £100 or £1000. This is mainly marketed through the ability of subscribers to use the borough's corporate box at the O2 venue (previously known as the Millennium Dome) and the Excel venue.

Key Points for Hillingdon

There are some advanced smartcard schemes nationally which Hillingdon can learn from.

Although no London borough currently has a multi-function smartcard, the various schemes introduced offer experience that Hillingdon can learn from.

Waltham Forest is the most advanced and feedback from their officers was positive. They have introduced a card that is basic in the first phase and will add services in later phases.

It should also be noted that, despite partnerships with TFL/Oyster not being successful so far, all these boroughs still aim to include Oyster functionality on their cards in the future.

Boroughs do not charge residents for their smartcards, although a discretionary fee is often charged if a card is broken or lost.

2.4 Private Sector Smartcard Schemes

Loyalty Reward Cards

The bulk of card use in the private sector is based on the reward and loyalty card concept. There are many well-known brands in the retail market. However, all but one of them uses swipe card technology, the exception being the Boots Advantage Card. The main purpose of these cards is to encourage brand loyalty and profile customer purchases to target advertising and promotions effectively.

As part of the research for this report, officers tried to contact a number of private sector organisations that run card schemes, including Boots, Nectar and Shell. However, as with the business sounding out surveys, it proved very difficult to engage with the private sector. Only Boots were willing to discuss their card.

Boots Advantage Card

Boots introduced their Advantage card in 1997. It was created as a way of encouraging brand loyalty and is used for most of their services, including healthcare and parenting products.

They have not entered into any partnership arrangements with their card. They point out that it is not used to profile customer purchases, as they prefer to carry out surveys for that purpose. Boots order the card from a contractor and then print their brand on.

Boots feel their card has helped their business grow and is very useful to customers, from whom they receive positive feedback.

Payment Cards

Most bank credit and debit cards now use chip and pin smartcard technology, the main driver being security. However, large card payment organisations, such as Visa and MasterCard are now launching contact-less smart card products that allow purchases of up to £10 without needing to enter a pin number. They believe this system will cut queues and the need to carry cash. Customers pay for their goods by touching the card on a reader and the money is then deducted from their bank account or added to their credit card bill.

The new contact-less bankcards have created a commercial partnership opportunity for public sector organisations using smart cards. Bolton MBC has entered into a partnership with SQUID, as covered in the previous section of this report. Oyster has recently launched a partnership with Barclaycard. Customers can use their Oyster/Barclaycard to travel on public transport, make purchases of goods without a pin up to a value of £10 and make purchases using a pin over a value of £10. Kent County Council have also linked up with RBS to provide a payment card for vulnerable adults through the Direct Payments for social care scheme.

Key Points for Hillingdon

Engaging with larger high street businesses will require the use of a consultant, who has access to the key people in head offices. Organisations involved in the national smartcard project that officers talked to as part of this research also found it difficult to engage with larger chain businesses. Most of these businesses will not want to share their loyalty card brand.

Business Sounding Out – Existing Loyalty Cards

75% of businesses surveyed stated they would not consider combining a Hillingdon card with a card they currently operate. However, it should be noted that nine businesses also gave this answer even though they have commented that they do not currently operate a card scheme.

The most obvious commercial partnership opportunity is to combine a Hillingdon resident card with a payment card. This will involve local businesses when placing card readers in their shops and allow people to pay for council services in local shops. As stated in the previously in this report, 75% of business stated they would be prepared to have card readers installed on their premises that would allow customers to purchase goods and services.

Other commercial opportunities for consideration are:

- Membership of clubs – cardholders could access the facilities at local Golf clubs, fishing permits or football clubs
- Access to premises – partnerships with local companies to reduce the cost of their staff access and ID schemes, combined with a borough employee version of the Hillingdon card.

2.5 Sounding Out Hillingdon Residents and Business

As part of the HIP project, officers devised a 'sounding out' plan to find out the views of Hillingdon residents and businesses to a residents smartcard. Officers felt that it was valuable to provide members with views and comments from residents and business while considering the options for introducing a card.

The resident sounding out plan involved:

- Hillingdon residents being surveyed by researchers across the borough
- The project manager attending the Older Peoples Assembly to survey delegates.
- The project manager attending the Connecting Communities event to survey delegates
- Resident surveys posted on the council website and intranet
- The project manager presenting the concept to the senior managers conference

The business sounding out plan involved

- A survey attached to the business e-newsletter bulletin
- The project manager and an assistant surveying shops in Uxbridge town centre
- Surveys emailed to head offices of larger organisations
- Surveys emailed to local business in the Hillingdon local business directory

2.6 What did residents think?

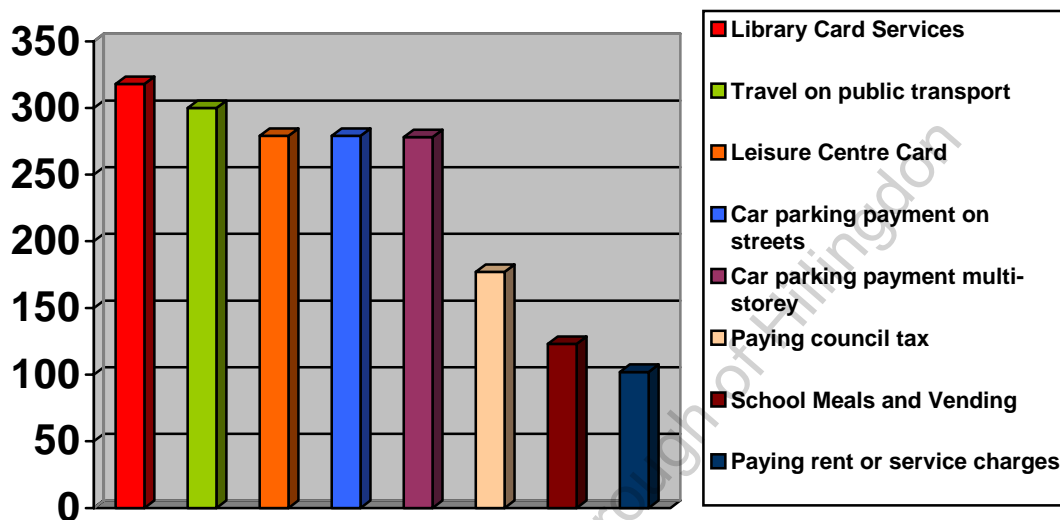
There were 387 respondents to the resident's survey. (Approximately half of respondents were not approached directly but chose to give their views via the Internet or Intranet). This reveals a high level of interest in the concept of a Hillingdon resident's card.

Residents were asked five questions about the introduction of a Hillingdon card. The responses to these questions are summarised below. Full details of the responses and additional comments made by residents are available in appendix B.

Question 1:

We would like the card to enable people to use lots of different services, please state which ones would be the most useful to you and your family?

This chart represents respondents who thought a card to access the services listed would be useful or very useful?



The chart shows that in respect of a card being useful to access services, there are four service areas that are high priority for residents. These are library, leisure, parking (both multi-story and street) services and travel on public transport.

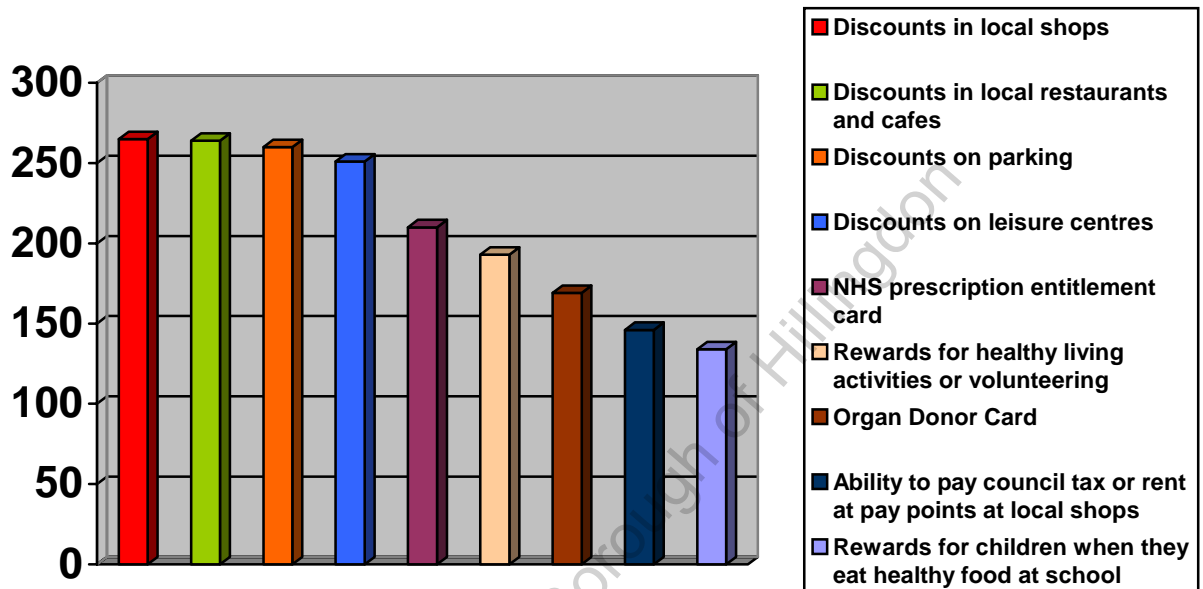
Around 46% of residents thought that it would be useful to be able to pay council tax with the card.

Although only 102 residents stated it would be useful to pay rent, it should be noted that many residents surveyed do not pay rent.

Question 2:

We would like this card to give rewards and benefits to residents, which ones would be most useful to you and your family?

This chart represents the rewards and benefits that the respondents felt were either useful or very useful?



The most popular rewards and benefits for residents were discounts in local shops and restaurants.

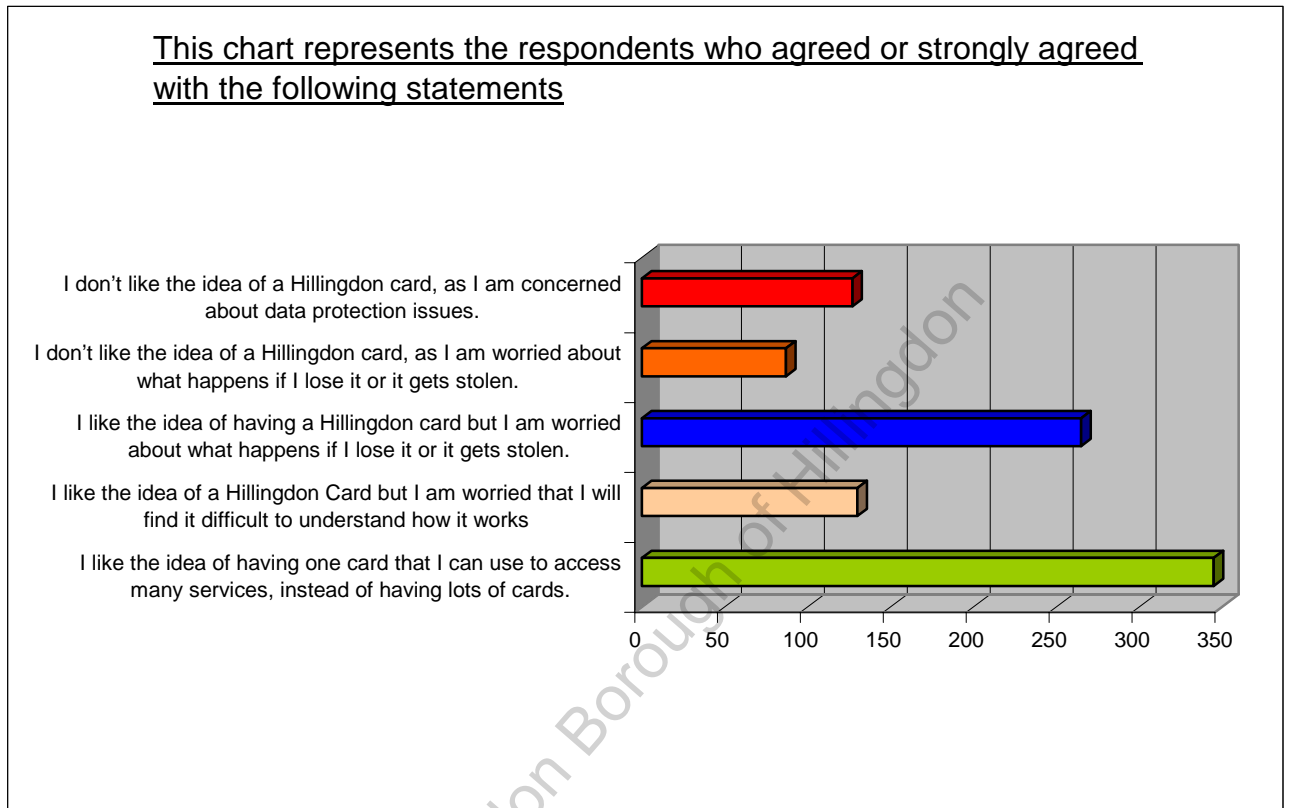
In respect of council services, the most popular rewards were parking discounts, closely followed by leisure centre discounts.

NHS services were also popular with more than half the residents surveyed, implying that a useful partnership could be forged with one of the council's statutory partners.

Although rewards for children eating healthy food was the least popular, it should be noted that not all resident's surveyed may have children.

Question 3:

A series of statements were presented to residents and they were asked which ones they agreed or disagreed with.

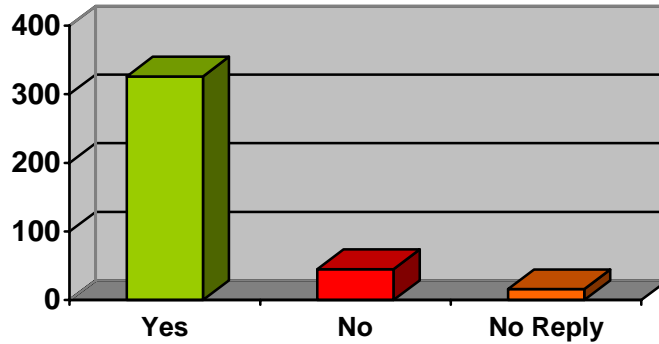


The chart shows that residents like the idea of having a card, especially one that can be used to access many services. However, the majority of residents do have concerns about their card being lost or stolen.

About a third of residents asked are concerned about data protection issues. It should be noted that even though these residents stated they don't like the idea of a card due to data protection issues, in a later survey question most of the same residents stated that a card was a good idea overall.

Question 4:

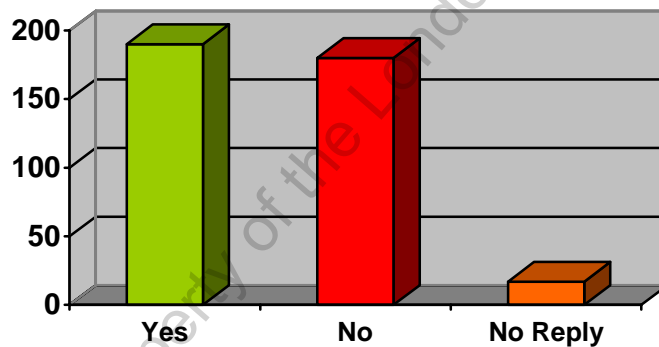
Overall do you think a Hillingdon Card is a good idea?



This chart demonstrates that the overwhelming majority of Hillingdon residents that took part in the survey think a Hillingdon Card is a good idea.

Question 5:

If there were a small charge for this card, would you still be interested?



This chart reveals that around half of all residents surveyed would consider paying a small charge for a Hillingdon card.

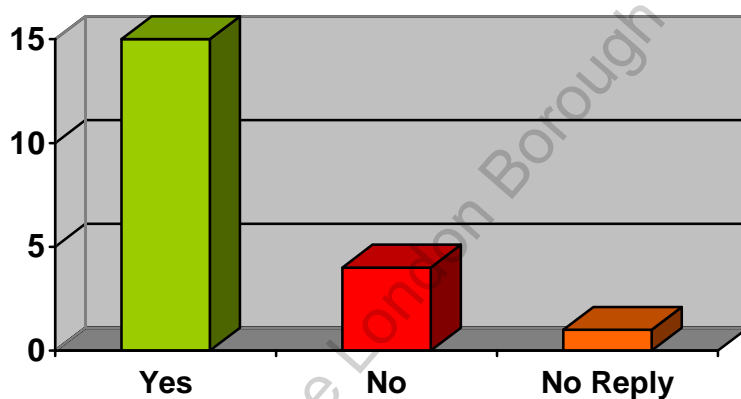
2.7 What did business think?

There were 20 respondents to the business survey. It proved difficult to get a response from the majority of shops in Uxbridge town centre, as they are part of larger chains, where surveys and enquiries have to be agreed by head office. Many larger companies also have their own store cards with reward schemes.

Businesses were asked five questions about the introduction of a Hillingdon card. The responses to these questions are summarised below. Full details of the responses and additional comments made by businesses are available in appendix B

Question 1:

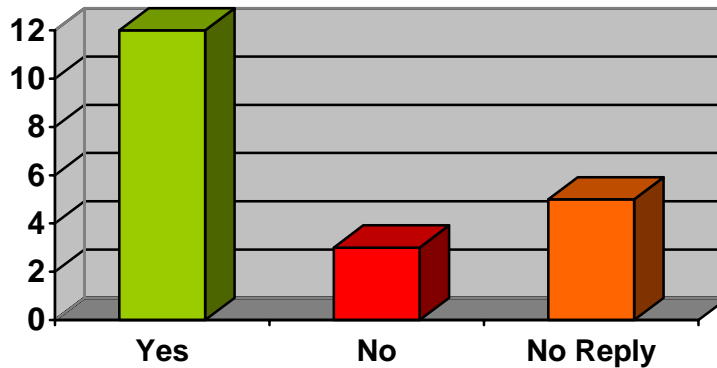
Would you consider supporting a pre-pay card that would enable residents to purchase goods or services using a pay point in your business premises?



The chart shows that 75% of businesses that responded would support a pre-pay card that enables residents to purchase goods and services from their businesses.

Question 2:

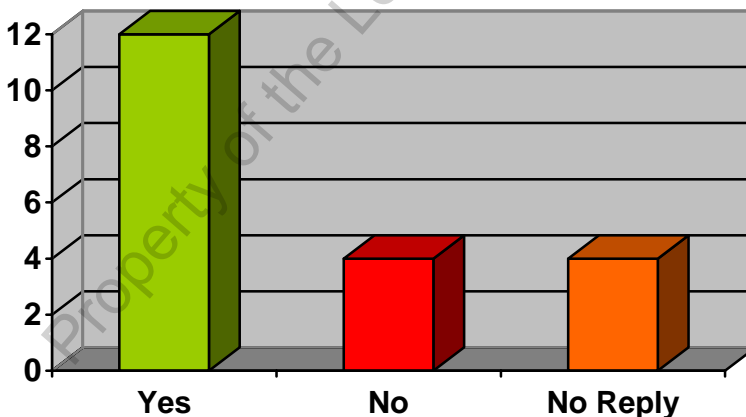
Would you support card transactions if there was a 1.5% commission on purchases taken by the card provider?



The chart shows that 60% of businesses would support card transactions if there were a 1.5% commission taken by the card provider. This is a fairly typical commission rate also charged by other companies such as Visa and Mastercard. Two of the businesses that said no, would re-consider if they could negotiate the charge down to 0.9%.

Question 3:

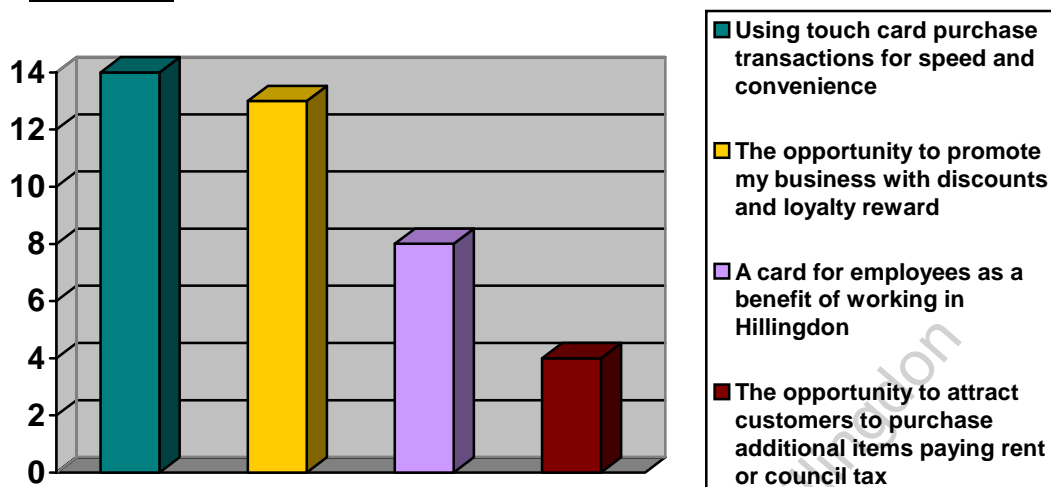
Would you like to offer discounts and/or loyalty rewards to cardholders?



The chart shows that 60% of businesses would like to offer discounts and loyalty rewards to card holders. Five businesses commented that their head office would have to agree any discounts and rewards.

Question 4:

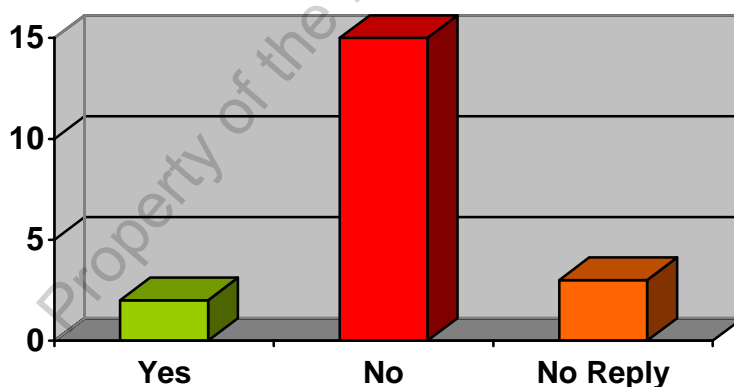
What would be the most useful aspects of a card for your business?



The chart shows that the two most useful aspects of a card for business are the speed and convenience of using a smartcard for transactions and to promote their businesses through a reward and discount scheme.

Question 5:

Would you consider combining any smartcard transactions your business currently operates with a Hillingdon card?



The chart shows that 75% of businesses would not consider combining a Hillingdon card with a card they currently operate. It should be noted that nine businesses also gave this answer even though they have commented that they do not currently operate a card scheme.

If members decided to canvas business to participate in a Hillingdon card scheme, consideration should be given to employing an external organisation to assist with this process.

2.8 Existing Hillingdon Cards

There are a number of non-smart cards being used across Hillingdon services:

Service	Card	Approximate Number
Libraries	Fob - bar code	65,000
Leisure	Swipe Card	6,100
Rent Payment	Swipe Card	15,000
Council Tax	Under Tender	35,000
Asylum	To be tendered	1,150
E Procurement	Visa card	275
Staff ID/Access	Fob card	4000
Parking (Multi-Storey)	Swipe Cards	N/a
Schools (Ruislip)	4K Mifare	330 (rising to 900)

Appendix A provides a more detailed map of existing Hillingdon service cards and services with potential for smartcard use.

Ruislip High School – Cashless Vending

The new Ruislip High School was opened for its first year intake in September 2006. The school was developed with smartcard technology.

The card being used is the 4K Mifare. It costs the school an average £1.50 per card. Pupils are charged £5 for a replacement if it is lost or broken negligently.

The card enables pupils and parents to:

- Top up the e-purse for school catering and vending. This can either be done on-line with a debit card or with cash in the top up machine.
- Have the card topped up to receive concessionary school meals where entitled.
- Access the building.
- Access the printing and photocopy machines.

A library card system is being introduced that will be compatible with the borough's library systems

The card could also be a register for pupils but this feature is not currently included. It could also be used to reward pupils for healthy eating, but this is not currently required as the school has 'excellent' status for healthy school meals.

There have been no issues with theft of cards. A photo is stored on the database and is displayed at the canteen till when activated by the card chip.

Which Type of Card?

The project manager was advised by contacts in other boroughs, where a smartcard has been introduced, that the back office IT systems are more important than the choice of card. Back office systems should be 'future proof' to enable all the proposed services to be phased in. Technology is constantly evolving and there may be desirable to upgrade and replace cards in the future.

4K Mifare vs Java Card

The choice of the 1K Mifare card for the Oyster scheme means that the choice of a London smartcard has essentially been made. The Your London Card Executive Group has already adopted the 4K Mifare card specification.

The most secure smartcard is the JCOP Java Card. However, this card is significantly more expensive than the Mifare card.

The Mifare card provides a good compromise between security and expense. It offers security sufficient for services required but not top level, mostly Tier 2 on the national security standards.

The newer 4K Mifare card has a chip that can be partitioned. It can have Oyster technology on one side of the chip and council services on the other.

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3.0 Section Three – Options for a Hillingdon card

3.1 The Five Key Tests for a Hillingdon Card

Is it possible for Hillingdon to introduce a smartcard that passes the five key tests?

1. A card scheme that will enable us to build up the basics first then become bolder in its ambition over time
2. A card that is fit for the 21st century customer experience.
3. A card that is helpful and delivers what residents need, without appearing paternalistic.
4. A card that will help us be one council internally and 'team Hillingdon' externally.
5. A card that assists us to build effective partnerships.

Based on the context and information provided in this report the answer is that Hillingdon can introduce a card that passes these tests.

Key Test One:
A card scheme that will enable us to build up the basics first, so that we can be sure it will work. Then it can become bolder in its ambition in the medium to longer term.

The introduction of smartcard schemes by other local authorities demonstrates this is possible. Hillingdon can learn from the experience of Waltham Forest's the OneCard scheme.

By phasing in services to a smartcard risks can be minimised.

Recommendations for introducing a Hillingdon card are as follows:

Phase One (Oct 2008) - Pilot a smartcard using Staff ID/Access.

- This is a lower risk to the council's reputation.
- 4K MiFare smartcards at £1.50 are considerably cheaper to produce than the existing staff ID card at £6 each. In the financial year 2006/07 993 cards were issued. This could represent cash savings of £4,468 per year.

Phase Two (April 2009) - Launch the card to include Library Services and include Car Parks (Multi-storey and large car parks). Backed up with web site area for card top up and payments. Include discounts in local shops and restaurants.

- Hillingdon residents that were surveyed as part of the sounding out plan stated that a smartcard for Library services would be most useful to them. Library Services already has a 'card culture' and there is scope for mass circulation of cards amongst residents. Consideration would have to be given to a non-resident version without other benefits, as non-residents are also entitled to use Hillingdon library services. Library service senior

managers have expressed a desire to be involved with a resident card at an early stage.

- 77% of residents surveyed stated that a smartcard giving discounts on parking would be useful to them.
- The council has two multi story car parks at the Cedars and the Granges. There are also a further six larger car parks around the borough which have a large number of residents and non-resident usage. These are at:
 - Fairfield Road, Yiewsley
 - Devonshire Lodge, Eastcote
 - Long Drive, South Ruislip
 - Civic Hall, Pump Lane, Hayes
 - Green Lane, Northwood
 - St Martin's Approach, Ruislip
- There is currently a scheme allowing 30 minutes of free parking to encourage people to use local shops. This could be replaced with 30-45 minutes of free parking for card holders, combined with price freezes to encourage card sign-up. Consideration can be given to raising prices for non-residents parking to offset costs.
- The inclusion of street parking and small car parks would currently be too expensive. The West London Alliance business case in 2005 stated that a single borough including parking services as a whole would face costs of £1,180,850 against potential savings of £251,313.

Phase Three (April 2010) – Include Leisure Services, Rent and Sundry Payments and Civic Amenity Sites. Also pilot schools with Ruislip High School.

- 72% of residents surveyed stated that a smartcard for Leisure services would be useful to them.
- Rent and sundry payment cards have recently been re-tendered on a 3-year contract. This will tie in with the time this needs to be re-tendered.
- A smartcard to prove residency could prevent non-residents using Hillingdon civic amenity sites without paying.
- Ruislip High School already uses a 4K Mifare card and could be a pilot for other schools.

Phase Four (April 2011) – Council Tax, Schools and Parking Fines

- Council Tax are currently tendering a new payment card with a contract to commence in April 2008. This contract will expire in 2011. 46% of residents surveyed stated that a resident card to pay council tax would be useful to them.

The inclusion of Oyster functionality for public transport could be included from phase two onwards. 77% of residents surveyed stated that a resident card that is also an Oyster card would be useful to them.

One third of residents surveyed expressed concern that they will not fully understand how a resident card works. This may be overcome by phasing in services so as not to over complicate from the outset.

Key Test One:	
PASS	✓

Key Test Two:
A card that is fit for the 21st century customer experience. Many residents now prefer to 'self serve', so that they can access council services at a time that suits them.

- Accessing multiple services supplied by different organisations with one card is pioneering new technology. A Hillingdon resident may be able to use just one card to make payments, purchase goods in shops at a discount, work out in the gym, borrow a DVD and library book and travel home on the bus.
- A smartcard with an e-purse maximises cashless purchases.
- Residents will not need to complete as many forms when accessing services and entitlements. A smartcard can store their information and auto complete back office application and claim forms. It can be a proof of entitlement.
- A resident's entitlement card can be backed up with a comprehensive web site. This can enable residents to access services at a time of their choosing.
- Promotional campaigns, discounts and event publicity can be targeted at residents based on their consumer preferences and profile.

Key Test Two:	
PASS	✓

Key Test Three:

A card that is helpful and delivers what residents need, without appearing paternalistic.

- Residents can be persuaded over time to enrol for the new card through the use of publicity campaigns, discounts and rewards. The Oyster card has been very successful using these promotional methods.
- A smartcard scheme with an e-purse can include an auto top-up function so that residents don't have to remember.
- Profiling of card use can ensure residents receive information and publicity that is more useful to them. This could be through email alerts they sign up for or text messaging.
- 4K Mifare cards offer sufficient security at a lower cost. Java cards are really only required for cards that may feature services requiring security access that may be perceived as more paternalistic.
- One third of residents surveyed stated that they did not want a residents card due to concerns about data protection. If a card were to be introduced residents would need to be reassured that their personal information is safe. Residents should be able to access the information stored on their card on-line, possibly by accessing a password protected personal web area.
- 22% of residents surveyed also expressed a concern about their card being lost or stolen. A robust mechanism for cancelling lost or stolen cards will need to be implemented. Residents should be able to call a 24 hour number to report and block a missing card.

Key Test Three:**PASS****Key Test Four:**

A card that will help us be one council internally and 'team Hillingdon' externally.

- One card with one Hillingdon brand for access to multiple council services. Residents can access multiple council services using their card without needing to be aware that different council directorates administer these services.
- The card branding could be linked to the council magazine and publicity, as well as the council website.
- A resident card can store personal information that can automatically populate applications for services. This will negate the need for customers to provide their details again when accessing different services.

- A resident card could become a focal point by which service areas in different council directorates collaborate, share information and standardise procedures.

Key Test Four:	
PASS	✓

Key Test Five:

A card that assists us to build effective partnerships.

- A resident's smartcard can be developed in partnership with both public and private sector partnerships. Examples include:
 - Developing a card through London Card Executive Group will develop partnerships with other boroughs.
 - Including Oyster for transport will develop a partnership with Transport for London.
 - Including discount and reward schemes in shops and restaurants will create business partnerships. Local attractions and sporting clubs could also be included.
 - Including cashless vending and library services in schools will improve partnerships with schools independent from the council
 - Including NHS services such as prescription entitlement

Key Test Five:	
PASS	✓

3.2 Options for a Hillingdon Card

Section one has established that it is possible for Hillingdon to introduce a resident's smartcard that can pass the five key tests. This section will now take members through a series of options and considerations.

Officers have included recommendations for building a card based on the example given in the key test one section above.

3.3 Step One: Which Council services should be included

Which council services should be included in the resident's card and what phase should they be introduced?

Service	Sounding Out Results	Estimated Customer Base	Phase	Yes / No
Library Services	The most useful service for residents	65,000	2	Yes
Leisure Services	72% of residents stated useful	6,100	3	Yes
Staff ID	N/a	4,000	1	Yes
Car Parking (Multi-storey and large)	71% of residents stated useful	All resident car owners	2	Yes
Car Parking (street)	72% of residents stated useful	All resident car owners	-	No
Council Tax	46% of residents stated useful	35,000	4	Yes
Rent and Sundry	26% of residents stated useful	15,000	3	Yes
Civic Amenity Sites	N/a	All residents	3	Yes
Asylum Payments	N/a	1,150	-	No
Benefit Entitlements	N/a	1,900	-	No
Direct Payments Scheme	N/a	400	-	No
Procurement Cards	N/a	275	-	No
Youth Opportunities Scheme	N/a	N/a	-	No

3.4 Step Two: Which partner services and features should be included

Which partner services should Hillingdon aim to include in the resident's card and what phase should they be introduced?

Service	Sounding Out Results	Phase	Yes / No
Public Transport (Oyster)	The second most useful service for residents	2+	Yes
Schools / Cashless Vending	32% of residents stated useful	4	Yes
Discounts in local shops and restaurants	60% of business surveyed will support this. This is the most popular feature for residents.	2	Yes
E-purse	75% of businesses will support this	2	Yes
NHS prescription entitlement	63% of residents stated useful	4+	Yes
Organ Donor Card	52% of residents stated useful	4+	Yes
Proof of Age (PASS)	N/a	4+	Yes

3.5 Step Three: Which additional features and benefits should be included

Feature	Sounding Out Results	Phase	Yes / No
Discounts on parking	77% of residents stated useful	4	Yes
Discounts on leisure centres	74% of residents stated useful	3	Yes
Rewards for healthy eating at school	37% of residents stated useful	3	Yes
Council Magazine linked to the brand of the residents card	N/a	2	Yes

3.6 Step Four: Which type of card

Consideration should be given to the choice of smartcard. These cards are the two choices specified by the national and regional smartcard organisations.

Card Choice	Cost (approx)	Security	Other Factors	Yes/No
4K Mifare card	£1.50	Tier 2	Already used by: <ul style="list-style-type: none"> • London Connects • Oyster • Ruislip High School 	Yes
JCOP Java card	£6	Tier 1	<ul style="list-style-type: none"> • Used successfully in Bolton and Bracknell Forest 	No

3.7 Step Five: Which back office systems should be included

The card should be linked to a dedicated web site. What features should the website include?

Features	Phase	Yes / No
Individual card holder log-in page to access information such as recent purchases and card use	2	Yes
Individual card holder log-in page to access recommendations based on consumer preferences	3	Yes
Email alerts about council information and forthcoming events	3	Yes
Top up of card e-purse	2	Yes
Auto top-up of card e-purse	3	Yes
Reserving library stock	2	Yes
Making payments for services on-line	3	Yes