

TO: Planning and Environment Committee
FROM: Transportation Planner
MEETING DATE: 18 October 2011
SUBJECT: **RIDESHARE SCHEME REVIEW**

SUMMARY

The Rideshare Scheme has been in place for 10 years and continues to present challenges for administration, enforcement and in terms of equitability. This report presents the findings of a review of the Rideshare Scheme, carried out to identify and assess possible options for the future of the scheme. It is clear that the existing scheme is, at best, only marginally successful in achieving its objectives. The primary challenge stems from the fact that the priority parking incentive on which the scheme is based uses on-street parking. This creates a major problem for enforcement and administration. There are options for resolving this issue but the costs associated with doing so effectively are substantial enough to suggest that on-street priority parking for ridesharing is not viable. If a Rideshare Scheme based on priority parking is to continue the parking should be provided in a designated off-street car park.

In terms of sustainability and parking pressure it appears there is little merit in continuing the existing scheme. Current data suggests many scheme users would continue to rideshare anyway, and many others would revert to more sustainable modes. The priority parking incentive is, to an extent, promoting driving to the detriment of active modes and public transport use. The Transportation Planning Department recommends abandoning the current scheme, and promoting a ride-matching website as means of encouraging more ridesharing.

IMPLICATIONS FOR:

- | | |
|----------------------------------------|---------------------------------------------------------------------------------------------------------------------------------|
| (i) Policy: | Yes. The Rideshare Scheme is mentioned in the Parking Strategy. Planning and Environment formally adopted the scheme this year. |
| (ii) Approved Annual Budget: | No |
| (iii) LTCCP/ Funding Policy: | No. A ride-matching website can be promoted using existing budgets. |
| (iv) Activity Management Plans: | No |
| (v) Community Boards: | No |
| (vi) Sustainability: | Yes. Sustainability is an objective of the Rideshare Scheme. Changes to the scheme may impact on sustainability. |

RECOMMENDATIONS

1. That the Committee note the Rideshare Scheme has been reviewed in consultation with users and Councillors, and problems still persist.
2. That the Committee agree the current Rideshare Scheme be abandoned from 1 March 2012, when existing user registrations expire.
3. That the Committee note that there are ride matching websites that could be promoted by the Council in cooperation with partner organisations, and that staff could encourage major employers in the city to provide Rideshare parking.
4. That the Committee agree to staff further exploring the options for a Student Bus Pass, in partnership with the Otago Regional Council and the tertiary institutions.
5. That prior to 1 March 2012 staff undertake a review of parking in the wider tertiary area, in consultation with affected parties, to decide what type(s) of parking should replace the Rideshare parking spaces, and to identify any other changes that could be made to make parking more convenient in the tertiary area.

INTRODUCTION

This report presents the results of the review of the Rideshare Scheme, consultation carried out, options considered, and recommendations regarding the future of the scheme. The full review (herein, the review) is available from Transportation Planning on request. This report summarises the findings of that review.

BACKGROUND

Existing Scheme

The existing Rideshare Scheme began in 2001 with the following objectives:

1. To provide improved commuting options for users;
2. To reduce the number of single-occupant cars on the roads and therefore traffic volumes, with knock-on effects of improving local air quality, reducing greenhouse gas emissions, reducing noise levels, improving amenity and safety;
3. To provide priority parking as an incentive to rideshare;
4. To reduce parking pressure in the Campus area.
5. To provide a journey matching service for participants wanting to share long distance journeys.

The scheme has been operating for 10 years and was officially adopted by the Council in April 2011. For extensive background on the Rideshare Scheme the 2009 Evaluation Report is available from Transportation Planning.

The form of the existing scheme is shown in Attachment 1.

Recent Changes

On 7 February 2011, the Finance, Strategy & Development Committee received a report about the Rideshare Scheme, detailing the problems experienced in administering the scheme – most notably: high levels of abuse, over-subscription, and the issue of equity as the scheme was limited to people studying or working at the University and Polytechnic. The Committee put and carried the following resolutions:

- "1 That the report be received.**

- 2 **That the Committee agree to the introduction of a one-off annual charge for Rideshare tokens of \$50, and \$20 for a replacement token issued in the same year, to cover administration costs and help reduce abuse of the scheme.**
- 3 **That the Committee agree to a new charge of \$50 per Rideshare token, and \$20 for a replacement token be added to the Fees and Charges Schedule under Citipark in the draft 2011/12 Annual Plan.**
- 4 **That a review of the Student Rideshare Scheme be undertaken by staff in conjunction with the Community Resilience Forum to establish the value of continuing the scheme beyond the 2011/12 year and reported back to the Planning and Environment Committee."**

The report also proposed the exclusion of staff from the scheme to reduce over-subscription and address equity issues, and the relocation of some of the spaces to make finding a space and parking enforcement easier. These recommendations were implemented.

As a result of these changes feedback was received from University and Polytechnic staff expressing dissatisfaction with the changes and requesting re-admission to the scheme. This dissatisfaction was compounded by the fact that after the February 2011 changes many Rideshare parks were standing empty (60 on average), a frustration for staff seeing empty parks every day which they were once eligible to use.

In response to these complaints, a report was submitted to the Planning and Environment Committee in April 2011 recommending 100 extra tokens be issued for University and Polytechnic staff on a first-come first-served basis. The Planning and Environment Committee agreed to this as an interim measure, until a comprehensive review of the scheme could take place later in 2011.

From 18 July 2011 (the beginning of Polytechnic Semester 2), Rideshare tokens were made available for \$30 for the remainder of 2011. This reduced rate was recognition that the tokens would only provide the recipient with one semester (plus summer school period) of priority parking rather than a full year.

PROCESS FOR REVIEW

The process for the Rideshare Scheme review has been as follows:

- 1 Internal review session with relevant Council staff.
- 2 Community Resilience Forum input sought to further refine this thinking, and identify any more issues and opportunities.
- 3 Occupancy and compliance surveys carried out.
- 4 Evaluation and Satisfaction survey of existing users.
- 5 Case studies of other Rideshare Schemes.
- 6 Meeting with key stakeholders – University, Polytechnic.
- 7 Consultation with Rideshare Scheme users.
- 8 Analysis of data and consultation feedback, and identification and assessment of options.

The full review, available from Transportation Planning, details the consultation, surveys and analysis that have led to the options identified in this report.

SUMMARY OF THE KEY FINDINGS OF THE REVIEW

The key findings of the review are highlighted below:

- There is still low occupancy of the Rideshare spaces, leading to complaints about wasted parking space (for occupancy levels see Attachment 2). This is particularly problematic in the vicinity of the Polytechnic and the CEO of the Polytechnic has requested that while the scheme should be retained, a reduction in the number of Rideshare parks in the area

should take place as soon as possible, stating that these should be replaced with free, time-restricted parking.

- The Rideshare Scheme appears to make only a small reduction in single-occupant car trips, and also means some people travel by car when they would otherwise walk, cycle or take the bus.
- Only 1.3% of staff and students in the tertiary sector are registered in the Rideshare Scheme, even fewer actually use it on a daily basis.
- The administration of the scheme, including the token system and the website, is not robust and does not function effectively.
- Enforcement of the current on-street priority parking is difficult and there are high levels of abuse of the scheme. The most recent surveys showed that 53% of cars parking under the scheme do so with only 1 person in the car, indicating they are not ridesharing. Some of these may be ridesharing but dropping passengers off in various locations before parking. This is against scheme rules as there is no way to distinguish such people from those not ridesharing. Consultation with scheme users presented a possible solution to this (discussed below), though this still has problems.
- The costs and resources required to achieve effective enforcement of on-street priority parking are significant and are not justified by the benefits of the scheme.
- An off-street parking scheme would be more enforceable but there are limited opportunities for this and the costs associated in providing this are not justified.
- Dunedin's on-street priority parking is unique. It is more common that organisations and work places provide schemes on their own premises for their staff.
- There are a variety of other parking options that could replace the existing Rideshare spaces.
- There is strong support from all those who had input into the review for adopting and promoting a ride-matching website as a city-wide system to promote and facilitate ridesharing.
- There is strong support from the existing users and the University and Polytechnic to retain the scheme and implement improvements. In particular, representatives of both institutions think it would be disappointing if the scheme were abandoned before a ride matching website had been implemented and its impacts assessed.
- The value placed on the scheme by users is centred on the convenience and economics of priority parking and a desire to make the scheme more convenient, rather than an interest in achieving the scheme's objectives of reduced parking pressure and increased sustainability.

CONSULTATION

A meeting was held at Otago Polytechnic on 13 September 2011 to which all Rideshare Scheme users and key stakeholders were invited (NB: some invitation emails bounced back due to incorrectly recorded or invalid email addresses so some users may not have received notification of the meeting, however most invitations were sent successfully and responses were received from nine users). Seven scheme users attended the meeting, plus the DCC Transportation Planner and Transportation Planning Manager, the University of Otago Resource Planner and the Otago Polytechnic Sustainable Operations Manager.

Transportation Planning Department staff gave a presentation outlining the review process and the key issues with the current Rideshare Scheme, and some possible options. This was followed by discussion with the meeting attendees who expressed their views on the scheme and gave feedback on how the scheme might be improved. The key points from the user consultation are discussed in the review, Part 1.3.

DISCUSSION

There are two key problems with the current Rideshare Scheme. One is that it is ineffective in achieving its two primary objectives, namely sustainability and reduced parking pressure. The other is that it is difficult to enforce which is resulting in high levels of non-compliance, undermining the value of the scheme. The review discusses these issues in detail. A summary of this is presented below.

Problem 1 – Failing to meet its objectives.

The purpose of the Rideshare Scheme is to increase sustainable travel behaviour by reducing the number of single-occupant car trips, and to reduce parking pressure in the tertiary area. To achieve these objectives it is necessary that the scheme does in fact result in fewer cars making trips and fewer of them coming into the tertiary area to park.

The evidence found through the review suggests that the scheme is not effectively achieving either of these objectives. A combination of factors leads to this. These factors are:

- Low uptake of the scheme and low occupancy of the parking spaces (108 cars per day, for 155 Rideshare car parks equates to 70% occupancy).
- Of this 108 cars, 53% are single-occupant, undermining the point of the scheme.
- 50% of scheme users say they would share anyway, with or without priority parking.
- Of those who would not share, some would use a combination of walking, cycling or public transport instead (they would also continue to drive sometimes).
- 50% of scheme users share with partners/family member and there is little multi-household sharing going on, which limits the reduction in the number car trips that the scheme achieves.
- Almost all cars observed using Rideshare contain only 1 or 2 people, very rarely more.

This means that if the scheme was removed the number of additional car trips that would result is so low that there would be little or no negative impact on parking pressure.

Furthermore, it appears that the convenience offered by the scheme is incentivising some users to travel in cars rather than using more sustainable modes. Many of the users who are not drivers or vehicle owners appear to use the scheme as an alternative to public transport, rather than an alternative to driving. In this respect ridesharing can even be seen as an environmentally negative option. This stems from the fact that the low cost of the Rideshare Scheme is attractive to some students in comparison to the cost of using public transport. Therefore provision of a student bus pass, or a student rate for using buses, may be more effective in achieving the objectives than a Rideshare Scheme.

Full discussion of these issues is contained in the review, but in summary, the scheme is not currently reducing parking pressure or achieving greater sustainability than would be occurring without the scheme. For it to do so there would need to be greater uptake of multi-household sharing (which can be encouraged by a number of methods, but not enforced), and this would need to be sharing among people who would otherwise be driving, not using public transport or active modes. Greater compliance with scheme rules would also be essential. The issue of compliance is the second major problem with the scheme.

Problem 2 – Ongoing non-compliance.

As far as the Transportation Planning Department has been able to identify the Dunedin Rideshare Scheme is unique in that it offers on-street priority parking. Other Rideshare Schemes (such as the case studies summarised in Part 7 of the review, with the exception of the Seattle Department of Transportation car pool), offer priority parking but usually in designated off-street parking areas.

The use of on-street priority parking creates many challenges with enforcement and abuse of the scheme. These problems persist with 53% of people parking with only one person in the car, despite increases in enforcement and the recent changes to the scheme. The review identified three basic options presented for dealing with the compliance problem:

1) *Increased surveillance and/or enforcement.*

Increased enforcement or the introduction of video surveillance is cost prohibitive. The costs of the CCTV surveillance that would be required to oversee the current Rideshare area would be in the vicinity of \$177,000 (see Costs in Part 4 of the review). This cost would increase if other areas around the city were converted to Rideshare parking.

Effective enforcement of the current scheme would require 6 enforcement staff for 3 hours per day at \$30/hr per staff resource. This would mean an annual cost of \$140,400 to effectively enforce the existing scheme. This cost would increase accordingly if other areas were converted to Rideshare. The Council's Parking Enforcement Team has indicated they do not have the resources to do this. Options for working with a lower level of enforcement, such as using an enforcement blitz approach, are unlikely to be successful, as discussed in detail in the review.

2) *Use of Campus Watch and/or Property Services to monitor compliance and present warnings.*

The use of Campus Watch and Property Services staff to monitor the parking areas and hand out warnings would need to be trialled to ascertain its effect on compliance. The University and Polytechnic have not yet been able to confirm whether Campus Watch and Polytechnic Property Services would be willing and sufficiently resourced to carry out this role, though both have indicated they plan to approach these agencies about taking on this role. Even if successful in increasing compliance this approach does not solve the problem of effective enforcement toward those who continue to breach the scheme rules. Furthermore, it is only a campus-area solution and does not offer any potential for an effective city-wide scheme. If the scheme was to be expanded to other parts of the city, other enforcement solutions would still need to be found. In addition, the Parking Enforcement Team confirms they have already trialled the use of warning cards in the past and it has had no effect on compliance levels.

3) *A registration option that allows some users to park by themselves if they have dropped off other ridesharing passengers at different points around campus.*

The proposal for a registration system that allows for some people to park with only one person in the car does not deal with non-compliance; it is a means of allowing some single-occupant parking, which is currently prohibited. This system would also potentially be administratively cumbersome, and increased surveillance/enforcement would still be necessary to enforce compliance among those who are not registered to park alone. The need for such a system is not justified. It is based on a desire from users to not have to walk from a car park to their work place, especially during bad weather. However, all the Rideshare spaces are within 5-8 minutes walk of each other and thus most scheme users should be able to find a parking space that offers the most central access for all those sharing the car. The scheme offers priority parking but this does not suppose that a short walk is unreasonable. The scheme does not need to be designed to eliminate the need for all walking for scheme users.

It is clear that these options are either a) cost prohibitive, b) they do not conclusively deal with the problems, or c) they are solutions that are only relevant for the existing tertiary scheme, that is, they do not provide a viable option that would enable the Rideshare Scheme to be expanded to other parts of the city.

Furthermore, even if the ongoing non-compliance problem can be resolved and the 53% abuse rate can be reduced through a combination of the above methods, the evidence still clearly suggests that the scheme is not reducing the number of car trips by anything more than a token amount. It could be argued that it is having a negative impact on parking pressure as the low occupancy and number of empty spaces means some cars are forced to park further away from campus, pushing tertiary traffic out of the tertiary area into the surrounding residential areas.

As well as not significantly reducing the number of cars being used, it is also clear that some users are being drawn away from active travel modes and public transport because of the

convenience offered by the Rideshare Scheme. To achieve the objective of greater sustainability the promotion and facilitation of active transport modes and public transport use would be more effective than ridesharing. The scheme is currently having a negative impact on the use of these modes. Some users have argued that they need to drive because they live too far away to walk or cycle, and there is no (or limited) bus service to where they live. It needs to be accepted that some places are inherently less convenient to live than others. The Rideshare Scheme cannot be seen as a means of making it more convenient for people to live in marginal parts of the city. Furthermore, people living in such areas are much more likely to rideshare anyway, as the fuel costs associated with bringing multiple single-occupant vehicles are the major incentive for such people to share.

A more effective method of incentivising ride sharing through priority parking would be for organisations to provide their own Rideshare Schemes on their own premises for their staff. Furthermore, promotion of a ride-matching website has widespread support and would facilitate city-wide, integrated ridesharing.

OPTIONS

There is little merit in retaining the Rideshare Scheme in its current form. At the very least changes need to be made to deal with the complaints from the tertiary institutions about under-occupancy. There are a large number of variations of all the possible scenarios, and the range of possible parking scenarios, fee structures, and enforcement criteria that could be implemented is extensive. It is neither practical nor useful to attempt a full overview of every possible scenario. The five options presented below represent the primary options available. For each of these options there would be considerable scope for variations of specific details within them. These options are not all mutually exclusive and some could be pursued in tandem.

Please note, promoting a ride-matching website is an option that can be pursued at no cost to the Council in conjunction with any of these options and, if done so, should be promoted in close communication with other major institutions and employers in Dunedin.

In addition, increasing public transport use would be a more effective way of achieving the scheme's objectives than ridesharing. Liaising with the Otago Regional Council and the tertiary institutions toward the provision of a student bus pass, or student rate for using buses, may be an effective way of achieving this and this process could also take place in conjunction with or in addition to any of the following options.

Option 1 - Keep Rideshare Scheme as is but make minor improvements

This could either involve reducing the number of spaces to match current occupancy or increase promotion and/or amend pricing to increase uptake. Reducing spaces is undesirable in the long run as it would leave only a token remnant scheme serving a few people with convenient cheap parking, and the current enforcement, administrative and equitability challenges will persist. Increasing promotion and reducing cost for students and/or for a single semester may increase uptake. A possible price structure for tokens could be \$100 for staff and \$30 for students for a full year, \$60 for staff and \$20 for students for a single semester. A reduced price could also be offered to exam supervisors who only use the scheme for a few weeks of the year. Implementing this will require some more expenditure in terms of promotion costs (improved signage, advertising, posters etc) and further changes to the cost of tokens.

Key changes that should be implemented if the scheme is retained in more or less its current form are:

- Amend pricing structure to be more representative of income differences between staff and students.
- Reduce Rideshare park times from the current 7:00am – 6:00pm, to 7:00am - 12:00pm (or other). If the Council adopts Option 2, to abandon the Rideshare scheme from 2012, this could be implemented in the interim to deal with low occupancy.

Should the Council decide to pursue Option 4 as a long term goal, Option 1 could also be pursued in the interim while the Transportation Planning Department investigates and

develops a plan for Option 4. This is not desirable as it entails a further period of dealing with continuing complaints and non-compliance. As the current system was implemented as an interim measure under the Finance, Strategy and Development Committee resolution in February 2011 it may be seen as undesirable to extend an interim measure for a longer period.

Ultimately this option is undesirable as current enforcement, compliance, administration and equitability issues persist, and there will still be little mode shift achieved.

Option 2 - Abandon the Rideshare Scheme from March 2012

Abandoning the current scheme will not have a major negative impact in terms of sustainable travel behaviour. 50% of users will continue to rideshare, and while some would continue to drive, others would walk, bus, or cycle instead. This may even have sustainability benefits if public transport patronage and active mode use increases. In addition, 53% of current Rideshare occupancy is single-occupant vehicles anyway.

This option is likely to cause some criticism from existing users, particularly staff who have been long-time scheme users. It is important to note there are 377 registered users out of a total student body of 25,000 and a combined staff of 4400, which suggests only 1.3% of all students and staff will be directly affected by removing the scheme. The Polytechnic Sustainable Operations Manager and the University Resource Planner have expressed concern that the abandonment of the Rideshare Scheme could also mean a loss of awareness, profile, buy-in and opportunity to develop a Rideshare Scheme in the future. However, promotion of a ride matching website and working toward a student bus pass would alleviate this loss of awareness and profile.

A variety of parking options are available to replace the scheme as discussed earlier. A reduction in the number of parking spaces or reducing the Rideshare parking times could be implemented as an interim measure to deal with current under-occupancy until the scheme is terminated when current tokens expire at the end of February 2012.

Option 3 – Retain and improve the on-street Rideshare Scheme through a major overhaul, and city-wide roll-out

If the scheme is to be retained the enforcement, administrative and equitability issues need to be conclusively resolved. The scheme should be opened to non-tertiary sector users to resolve the issue of unfairness.

Accommodating potential demand in other areas of this city where there is high parking pressure would require the introduction of more Rideshare parking areas in the city. Key areas would include the hospital, CBD/Octagon, and Exchange/Princes Street area. The expanded scheme would need to be promoted and enforced effectively to maximise sustainability outcomes and compliance. This would involve significant cost primarily due to CCTV cameras and/or enforcement increase necessary.

The Parking Enforcement Team does not have sufficient resources to effectively enforce the existing Rideshare Scheme, and an expanded scheme would require further additional enforcement resource. A more robust administrative system, including use of a ride matching website and an improved token system would be required.

This option is not recommended due to the substantial cost of enforcing the scheme or installing and monitoring a CCTV system, and its potentially negative impact on public transport and active mode use.

Option 4 – Replace the existing on-street Rideshare Scheme with a new off-street Rideshare Scheme in car parks and/or parking buildings

This would enable a more enforceable and equitable Rideshare Scheme. It could be opened to anyone in the city and enforced by a single camera or staff resource at the entry/exit point.

Alternatively, off-street parking could be offered at a reduced rate for ridesharing. It would still be necessary to have a robust administrative, monitoring and enforcement system. A

staff resource or CCTV camera at the entry/exit point would entail some cost, as would the staff time required to review footage.

This would require multiple car parks located in key destinations in the city if equitable access is to be provided for all potential users. If only one central car park was provided there would be limited uptake from those whose workplaces are a significant walking distance away. In this scenario the problem of people dropping off others before parking would be likely to persist.

There are significant costs associated with using existing car parking space, or acquiring new space for this purpose. These costs are not justified by the marginal benefits provided by the Rideshare Scheme. This would be better achieved by private workplaces.

Option 5 – The Council encourages tertiary and other large institutions to develop their own on-site Rideshare Schemes.

The Council could encourage the University, Polytechnic and other major employers in the city to provide their own on-site Rideshare Scheme for their organisations. They could then be responsible for administering, monitoring and enforcing their own scheme. This is the standard international approach to provision of priority parking for ridesharing. Massey University Albany campus has achieved a successful system using this approach and use wheel clamping for enforcement. The Dunedin tertiary institutions and other employers could introduce a similar scheme on their own premises. The Council could explore the potential for negotiating this through the tertiary Parking Protocols which are due for review.

PREFERRED OPTION

The option preferred by the Transportation Planning Department is a combination of Option 2 (abandon the scheme) and Option 5 (encourage the tertiary institutions to provide their own schemes). It would also be possible to explore the possibility of promoting a ride matching website through the Council website.

Options 1 and 3 are not recommended because the costs involved with achieving effective enforcement of the on-street priority parking scheme are prohibitive and are not justified by the benefits it may provide. Furthermore, regardless of the rates of non-compliance, it is clear the scheme has little positive effect on sustainability and parking pressure, and possibly even a negative effect on these objectives. Option 4 is not recommended due to the lack of suitable off-street car park space and the costs associated with using such space for ridesharing.

Advantages of preferred option

A combination of Options 2 and 5 is more equitable as each institution would take responsibility for providing a Rideshare Scheme for their employees and students. There would be no restrictions on who may access public on-street parking, and the financial burden for the scheme would be the responsibility of those who value the scheme and benefit from it. Under this option the Council would not be responsible for administering and staffing a scheme that does not serve all residents.

Enforcement would also become the responsibility of the organisations that run the schemes. Enforcement could be carried out much more effectively by the security or property services of each institution as the parking will no longer be on-street. This has been successfully achieved through wheel clamping at the Massey University Albany campus (see Part 7 of the review) and shows that a Rideshare Scheme can be enforced effectively if this model is followed (however, the impact this scheme has had on mode-share is not known).

Because these schemes would be work place-based, users who rideshare together would normally work relatively near one another and both being in the car when it is parked is likely to be less of a problem.

This option entails no cost to the Council and relieves the ratepayer of the financial burden of enforcing an on-street scheme that provides little benefit. It would also free up staff resources in Transportation Planning, CSA and, in particular, Parking Enforcement.

Disadvantages of preferred option

If Option 2 and 5 are pursued, some criticism from existing Rideshare Scheme users can be expected. Some staff have been using the scheme for several years and the removal of the scheme will have an impact on travel patterns to which they are accustomed.

The tertiary institutions and employers may be reluctant to provide and administer their own Rideshare Schemes. It is likely they would need to use some of their existing on-site parking if they were to offer their own Rideshare Scheme, which may mean a loss of potential revenue from leasing parks to staff. This may lead to criticism of this option or a lack of uptake from employers and institutions.

The inclusion of a Rideshare requirement in the Parking Protocols may be seen as too heavy handed and arduous. The City Development Department lead negotiations with the tertiary sector regarding these protocols and have stated that there would need to be a very strong resource management reason for them to require the tertiary institutions to provide ridesharing spaces under the Parking Protocols. On the basis of the evidence presented in the review such a resource management mandate is clearly not justified. Therefore it is unlikely the Council could require Rideshare parking through the Parking Protocols. It could still however be encouraged through the negotiations.

The removal of the existing scheme may be perceived as a backward step in terms of sustainability as it may currently have the appearance of being a sustainable service, despite the lack of supporting evidence for this, and some evidence to the contrary.

CONCLUSION

The costs required to amend the existing Rideshare Scheme to the point where it functions effectively appear to significantly outweigh the benefits provided by the scheme. There is insufficient evidence to justify retaining the on-street priority parking aspect of the scheme. Some negative reaction can be expected from long-time scheme users if this is abandoned as there is now 10 years of built up expectation of entitlement to this parking. However the problems stemming from the scheme, the minimal contribution it makes to reducing parking pressure and increasing sustainable travel behaviour, and some evidence that it has a negative impact on the use of active modes and public transport, suggests it can no longer be justified for the 1.3% of the tertiary sector who use it. It is therefore recommended that the Rideshare Scheme be abandoned from 1 March 2012.

Due to the costs involved, lack of appropriate off-street parking space, and equity issues, it is more appropriate that those organisations that generate significant demand for car parking, and which experience and create significant parking pressure, provide and administer their own Rideshare Schemes on their own premises. It is also clear such organisations may be able to achieve this more effectively than the Council. Staff could encourage this approach where possible.

The Transportation Planning Department could pursue the promotion of a ride-matching system through the Council website, in cooperation with other major employers and institutions in the city as a widely supported, low cost way of promoting more sustainable travel behaviour. This would be carried out in conjunction with exploring the options with the Otago Regional Council and tertiary institutions for introducing a student bus pass or student bus fare.

Prepared by:

Approved for submission by:

Emerson Yeoman
Transportation Planner

Sarah Connolly
Transportation Planning Manager

Approved by: Sue Bidrose
General Manager Strategy and Development

Date report prepared: 10 October 2011

Attachments

- 1 Details of existing scheme
- 2 Rideshare occupancy levels

Attachment 1 – Existing Rideshare Scheme, locations and exclusion zone

Feature	Details
Number of parking spaces	155
Locations	Harbour Terrace, Forth Street, Cumberland Street, Clyde Street (see map below).
Eligibility	Students and staff at the University or Polytechnic who do not live within the exclusion zone (see map below).
Objectives	<ul style="list-style-type: none"> • To provide improved commuting options for users • To reduce the number of single-occupant cars on the roads and therefore traffic volumes, with knock-on effects of improving local air quality, reducing greenhouse gas emissions, reducing noise levels, improving amenity and safety • To provide priority parking as an incentive to rideshare • To reduce parking pressure in the Campus area • To provide a journey matching service for participants wanting to share journeys.
Rules	<ol style="list-style-type: none"> 1 The Rideshare parks can only be used by Rideshare users who: <ol style="list-style-type: none"> a. Are students or staff at the University or Polytechnic b. Register as a carpool participant c. Display at least two valid tokens on the dashboard of the vehicle d. Have all token holders in the vehicle at the time of parking 2 As of 1 May 2008, the Rideshare scheme now runs all year round between 7am and 6pm, Monday to Friday. 3 You cannot obtain a Rideshare parking token if you live in the North Dunedin/City Centre exclusion area (see Attachment 2). 4 To be a Rideshare participant you must register on the Rideshare website every year. 5 New tokens are available each February. 6 Tokens are valid until the end of the following February.
Process for joining scheme	Register on the Rideshare website, then take the confirmation email to the Customer Services Agency, along with proof of ID, student or staff proof, proof of address, and \$50, and obtain a Rideshare token.

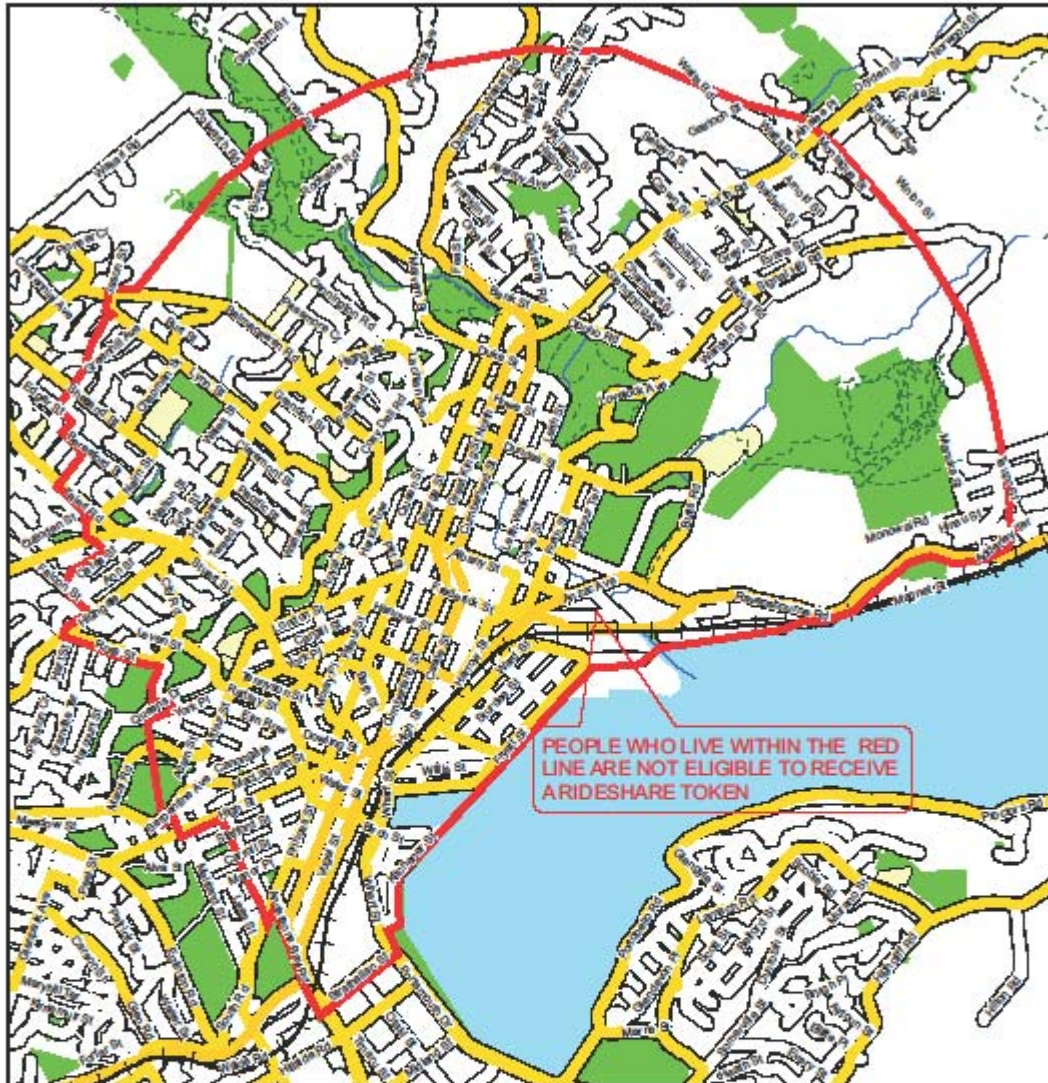


Rideshare Location 2011

Scale 1:5000 at A4

Legend

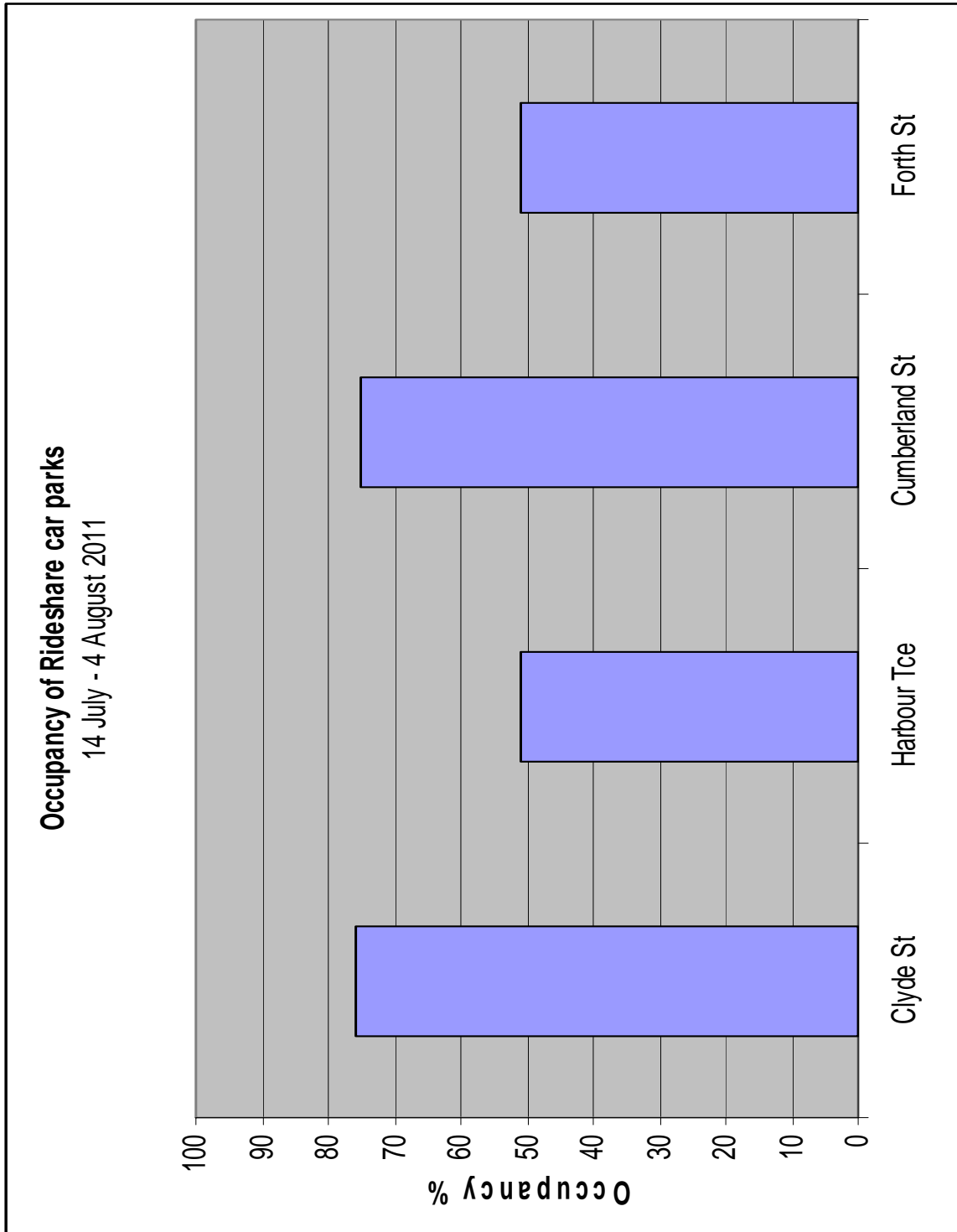
— Rideshare Location



RIDESHARE ZONE FOR 2011

BY DCC GIS

ATTACHMENT 2 - RIDESHARE OCCUPANCY LEVELS, JULY – AUGUST 2011



Dunedin Tertiary Rideshare Scheme

Full Review

Summary

This review is an evaluation of the effectiveness and efficiency of the Rideshare Scheme, which has been run since 2001 by Dunedin City Council.

The report evaluates the scheme and highlights areas of strength, weakness, and opportunities for improvement.

September 2011

Emerson Yeoman, Transportation Planning

INTRODUCTION

On 7 February 2011, the Finance, Strategy & Development Committee passed the following resolution:

- 4 That a review of the Student Rideshare Scheme be undertaken by staff in conjunction with the Community Resilience Forum to establish the value of continuing the scheme beyond the 2011/12 year and reported back to the Planning and Environment Committee."**

This review presents the consultation, surveys and analysis that have informed the findings presented in the report to the Planning and Environment Committee meeting on 8 September 2011.

PART 1 CONSULTATION

1.1 INTERNAL STAFF MEETING, MONDAY 20 JUNE 2011

A meeting was held with key internal staff members involved with the Rideshare Scheme. This meeting included Parking Enforcement, City Development, Customer Services Agency (CSA) Manager, Development Services Manager, Business Solutions (BIS) who maintain the Rideshare website, and Transportation Planning.

There was widespread support for discontinuing the Rideshare Scheme in its current form. Both CSA and BIS were of the view that Rideshare needs a very robust administrative system, that administration of the current system is untidy, and that a new website at the public interface was necessary. BIS strongly recommended that the existing Rideshare website be retired and noted that the hardware on which it runs will be retired at the end of 2012 anyway, requiring a new website from then on. CSA and Parking Enforcement find the token system unhelpful as it is too easily abused and CSA spend too much time waiving fines because of problems with people's tokens (e.g. complaints such as "one must have slid off my dashboard" and "we used a different car yesterday and forgot to swap our tokens"). The Development Services Manager suggested Rideshare be replaced with \$5/day parking due to its success elsewhere in the city. Parking Enforcement expressed a strong view that effective enforcement of an on-street priority parking scheme is untenable and for Rideshare to continue an off-street car park should be used.

It was widely agreed that paid parking and rising fuel costs can be seen as sufficient incentive to rideshare, as more people can share the cost of their transport and parking.

1.2 STAKEHOLDER MEETING, TUESDAY 2 AUGUST 2011

On Tuesday 2 August 2011 a meeting was held between Transportation Planning staff and the key rideshare stakeholders. Representatives of the University, Polytechnic, Otago University Students Association (OUSA) and Otago Polytechnic Students Association (OPSA) were invited. The University of Otago Resource Planner and the Otago Polytechnic Sustainable Operations Manager attended the meeting. The Otago Polytechnic Sustainable Operations Manager also presented input from the CEO of Otago Polytechnic. Neither OUSA nor OPSA responded to the invitation or attended.

Both the Polytechnic and University expressed a strong desire to see the scheme continue for sustainability reasons, and a concern that if it is discontinued it will be very difficult in future to ever start a similar system again. A letter to the Transportation Planning Manager from the University Property Services Director (dated 12 August 2011) strongly expressed a desire to keep the scheme, stating that the problems with the scheme are not insurmountable and indicating that University Property Services are keen to discuss with Campus Watch whether Campus Watch may be able to play a role in monitoring compliance of the scheme. Otago Polytechnic also expressed that there may be potential for Polytechnic Property Services to play a similar role. Furthermore the letter from University Property Services also states that the University would like to see the Rideshare Scheme expanded to other parts of the city, and non-tertiary users allowed into the scheme.

Both organisations expressed frustration at current under-occupancy, what they perceive as a waste of a valuable parking resource. They are both in favour of a two-fold solution: increasing promotion of the scheme to increase uptake in the meantime while removing some key under-occupied areas from the scheme (such as upper Fourth Street, on the hill), and looking to amend the number of Rideshare parking spaces to match demand in future. The University also pointed out that the current University Park & Ride is moving from the St Andrew Street Car Park (200 parking spaces) to the Stadium (150 parking space) by 8 October 2011 at the latest. This move will result in the loss of 50 car parks and may result in an increase in parking pressure around the campus.

Neither the Polytechnic nor the University support the widespread introduction of \$5/day paid-parking. They see little demand for all-day paid parking from the tertiary sector. They both support the introduction of a variety of free time-restricted parking for any car parks removed from the Rideshare Scheme. Polytechnic preferred Forth St and Harbour Terrace as the appropriate sites for introducing free time-restricted parking.

1.2.1 Discussion of Stakeholder meeting

This meeting provided helpful input as to the issues facing the scheme and some suggestions of how it might be improved, but it did not provide definitive solutions to the issue of non-compliance.

The use of Campus Watch and Property Services staff to monitor the parking areas and hand out warnings would need to be trialled to ascertain its effect on compliance. University and Polytechnic have not yet been able to confirm whether Campus Watch and Polytechnic Property Services would be willing and sufficiently resourced to carry out this role, though both have indicated they plan to approach these agencies about taking on this role. Even if successful in increasing compliance this approach does not solve the problem of effective enforcement toward those who continue to breach the scheme rules. Furthermore, it is only a campus-area solution and does not offer any potential for an effective city-wide scheme. If the scheme was to be expanded to other parts of the city, other enforcement solutions would still need to be found. In addition, the Parking Enforcement Team confirms they have already trialled the use of warning cards in the past and it has had no effect on compliance levels.

As identified by the stakeholders, particularly the Polytechnic, it is possible to resolve the under-occupancy issue by removing some of the most under-utilised spaces, such as upper Fourth Street. However, as the scheme is already making such a marginal impact on reducing the number of vehicles parking in the area that making the scheme even smaller by reducing the number of car parks raises the question of whether what remains is so small that it makes no practical positive impact. To reduce the number of car parks in the scheme without increasing the scheme's ability to meet its objectives could be seen as rendering the scheme even less capable of making a significant impact on sustainable travel behaviour and reducing parking pressure. It is clear however that under-occupancy needs to be resolved, especially in key areas such as Fourth Street. However if this is to be done in a way that increases the scheme's ability to achieve its objectives, then it will need to be done in a more positive and comprehensive way than by simply removing car parking spaces from the scheme. Doing so would resolve the under-occupancy problem but in doing so this could reduce the scheme to little more than mere symbolism or tokenism. That is, a scheme which provides convenient parking for a small number of people while making little positive gains toward meeting its key objectives.

If it is decided to retain the scheme in basically its current form, but not implement more comprehensive changes, then some of these parking spaces could be removed from the scheme and replaced with other types of parking in consultation with the tertiary institutions.

It is unlikely that the University's move from its 200-space St Andrew Street Car Park 'Park and Ride' site to its new car park at Forsyth Barr Stadium will result in a significant change in parking pressure. The current Park and Ride area is on average approximately 50% full, which equates to 100 cars. The new site provides the University with 150 spaces. While

University Property Services have said that it is not yet confirmed how many of those 150 spaces will be allocated to Park and Ride, on the basis of current occupancy and use of the existing Park and Ride, the new Forsyth Barr Stadium site has sufficient capacity to accommodate those vehicles. Ongoing monitoring would be necessary to determine the actual impact this change of site will have on the on-street parking in the tertiary area.

1.3 RIDESHARE USER CONSULTATION MEETING, TUESDAY 13 SEPTEMBER 2011

A meeting was held at Otago Polytechnic on Tuesday 13 September to which all Rideshare Scheme users and key stakeholders were invited (NB: some invitation emails bounced back due to incorrectly recorded or invalid email addresses so some users may not have received notification of the meeting, however most invitations were sent successfully and responses were received from nine users). Seven scheme users attended the meeting, plus the DCC Transportation Planner and Transportation Planning Manager, the University of Otago Resource Planner and the Otago Polytechnic Sustainable Operations Manager.

Transportation Planning Department staff gave a presentation outlining the review process and the key issues with the current Rideshare Scheme, and some possible options. This was followed by discussion with the meeting attendees who expressed their views on the scheme and gave feedback on how the scheme might be improved. The key points from the consultation were:

- General feedback:
 - Users highly value the convenience the scheme provides and strongly stated that they want the scheme to be retained.
 - The introduction of a ride-matching system, and making it a compulsory aspect of the scheme, is supported as a good way of increasing the levels of multi-household sharing.
 - The token system needs to be improved. Sometimes parking enforcement officers do not see that two tokens are being displayed and wrongly ticket people. Could state an exact place in the dashboard/windscreen where tokens have to be displayed.
- Scheme rules:
 - Many users feel that the requirement that two people must be in the car when it is parked is too onerous and that it should be acceptable for a driver to drop people off at different points around campus before parking by themselves. It was suggested that users could register in groups where one is registered as a driver and they register that they share with people who work at specific locations around campus – different coloured tokens recognising this would be issued allowing the driver to drop off their Rideshare partners before parking by themselves.
- Cost of tokens:
 - The cost for exam supervisors who only use the spaces for 6 weeks of the year should be reduced.
 - The cost of tokens for students should be reduced to incentivise uptake.
 - It would not be unreasonable to increase the cost of tokens for staff even as far as \$100.
 - \$50/token is too expensive for families who wish to share. A family rate could be offered to make it more affordable.
- Compliance and enforcement:
 - The issue of people abusing the scheme by not actually ridesharing was acknowledged and suggestions for dealing with this problem included: using Campus Watch, Property Services and students to monitor and observe abuse and put warning notes under windscreen wipers; and the driver registering process described above (under Scheme rules) to allow for this was proposed.
- Times:
 - Rideshare spaces should be returned to open parking during tertiary holiday periods.

- The Rideshare parking spaces need not be restricted to ridesharing for the entire day; they could be Rideshare from 7:00am to early afternoon and then open to anyone.

1.3.1 Discussion of user consultation meeting

It is clear the scheme is valued by those who use it. The priority parking provides a convenient parking option which makes people lives easier and which there is strong support for retaining. However, it is difficult to ascertain the level of support and the value placed on the scheme by users given the low response and attendance rate at the consultation meeting. Those who did attend made it clear they wish to see the scheme continue and suggested several changes that might improve its usability and convenience for users. No options came out of the meeting that would resolve the on-going non-compliance issue, nor that could provide a solution that could be expanded to other parts of the city.

Furthermore it is clear the value placed on the scheme by users is entirely centred on the convenience and economics of priority parking and a desire to make the scheme more convenient, rather than an interest in achieving the scheme's objectives of reduced parking pressure and increased sustainability.

The suggestions for an altered price structure would be viable within the parameters of the existing scheme. There was support from some attendees for increasing the cost of tokens for staff and decreasing the cost for students to be more reflective of the income differences between those groups. If the scheme is retained there is no reason why this could not take place. It seems likely that a reduced cost for students would have a positive impact on the numbers of students using the scheme. However, this is likely to also have a negative impact on the numbers of students walking, cycling or using the bus. It is also possible that an increase in cost for staff may have a negative impact on levels of staff scheme usage. It is not only the provision of priority parking that is the scheme's key incentive, but the fact that it is low cost. There must come a point where the cost of using the scheme is so high that it undermines the attractiveness of the priority parking and the numbers of registered scheme users drops. This seems to have happened already for students with the introduction of the \$50 fee at the start of 2011. It is possible an increase in token cost to staff would have the same effect. The optimum cost-occupancy balance can only be known with certainty through a process of trial and error. When compared to leased parking costs and normal on-street paid parking costs, \$100 per token for staff would still be significantly cheaper given the value of the priority parking available and so could still be seen as a strong incentive. Whether this operates in practice would require implementation and re-assessment. It is clear that a further reduction in uptake of the scheme, resulting in even lower than present occupancy, is undesirable.

The cost of tokens for exam supervisors was also raised. Due to the nature of this role it seems more appropriate that the tertiary institutions should provide parking solutions for their exam supervisors if this is an issue. However, there is also no practical reason why a reduced rate could not be offered for exam supervisors, with different colour tokens being issued indicating validity for a set period. This does raise further equitability issues however, as many scheme users will have different needs and different income levels, and it is not practical to provide a targeted solution to cater to all needs.

It was also suggested that a range of tokens might be offered providing for scheme users who wish to subscribe to the scheme for one month, three months, one semester and so on. This is unlikely to be supported by the Customer Services Agency who has clearly stated the need for administrative streamlining and simplicity, rather than developing a more complicated system. This may also have implications for Parking Enforcement who would need to be mindful of a range of different tokens representing a range of different parking entitlement periods, thus complicating the process of enforcement, reducing efficiency and potentially resulting in less robust enforcement. Despite these potential challenges, it would be possible for the Council to implement such a scheme.

The suggestion that a family rate be offered is not well founded this would further encourage sharing within households rather than the inter-household sharing that would better achieve

the scheme's objectives. As the maximum number of tokens required is two, then only two tokens need to be purchased to enable an entire family to use the priority parking. If the cost of two tokens is prohibitive then the family would be encouraged to find rideshare partners from outside their household, thus reducing the number of car trips taking place. Further incentivising sharing within households is contrary to the schemes objectives.

The role Campus Watch and Property Services staff might play in improving compliance with the scheme was also raised. The issues surrounding this are discussed above in Part 2.1.

The proposal for a registration system that allows for some people to park with only one person in the car does not deal with non-compliance; it was suggested as a means of allowing some single-occupant parking, which is currently prohibited. The need for such a system is not well justified. It is based on a desire from users to not have to walk from a car park to their work place, especially during bad weather. However, all the Rideshare spaces are within 5-8 minutes walk of each other and thus most scheme users should be able to find a parking space that offers the most central access for all those sharing the car. This also incentivises sharing between colleagues who work in the same area. The scheme offers priority parking but this does not suppose that a short walk is unreasonable. The scheme does not need to be designed to eliminate the need for all walking for scheme users. Furthermore, such a registration system would be more complex for CSA, rather than simpler. While it would be possible to develop and administer such a system it would not be immune from abuse as some people not registered for this parking exemption would still drive and park by themselves, and sufficient enforcement would still need to be in place to deal with this.

Feedback from the meeting also conveyed the view that the scheme does not need to operate during tertiary holidays, especially during the summer months, and should be returned to open parking during this periods.

It was also suggested that it is unnecessary for the Rideshare parks to operate from 7:00am to 6:00pm, as most of the parking demand occurs in the morning. There was support for reducing the daily Rideshare period to cover from 7:00am to late morning or early afternoon. The Seattle scheme (discussed below in Part 7.2) only operates between 7:00am and 10:00am. One suggestion from this meeting was that 7:00am - 3:00pm would be the ideal cut off, and feedback received from a Polytechnic staff member suggested 7:00am - 12:00pm. Any of these options or variations of them could be implemented. If the scheme is to be continued in more or less its current form this would be an effective way of dealing with the under-occupancy problem and relieving the need to enforce the scheme until 6:00pm. This could also be implemented as an interim measure for dealing with low occupancy if the scheme is discontinued from 2012.

1.4 EVALUATION AND SATISFACTION SURVEYS, JULY 2011

In July 2011, Rideshare Scheme Evaluation and Satisfaction surveys were emailed to all users of the scheme. The Evaluation and Satisfaction survey results document is available from Transportation Planning on request. There were 119 responses which gives a response rate of 37%.

In close correlation to the database analysis discussed in Part 5, 48% of respondents said they would continue ridesharing even if priority parking was not offered, while 52% said they would not. On average, there are 108 cars using the Rideshare car parks each day. Almost all of these only display 2 tokens suggesting only 2 Rideshare users are in each car, a total of approximately 216 individual people ride sharing daily under the scheme. If priority parking was removed 48% of these would continue to share, meaning Ridesharing would reduce to around 52 cars (104 individual people). If the other 52% all took a car each this would mean 112 single-occupant cars in addition to the 52 Rideshare cars, a total of 164 cars. On this basis alone, with the current priority parking there are 108 cars making trips each day, without priority parking there would be 164 cars making trips each day. This would not have a significant impact on current parking pressure as there are currently 153-155 Rideshare

spaces which, if they were no longer Rideshare spaces, could accommodate most of these cars, leaving a need for only 9 - 11 extra parking spaces.

However, the 164 cars mentioned above is a worst-case-scenario, and not all those who would no longer ride share if priority parking was removed would always drive instead. The survey suggests that Rideshare is not only reducing the number of single-occupant car trips, but is also encouraging some people to drive or be a passenger who would otherwise take the bus, walk, or cycle. While driving is clearly the most popular option, the following responses from the Evaluation and Satisfaction survey show that prior to joining the Rideshare Scheme, and if the scheme were to be removed, many of the scheme users would opt for more sustainable modes.

Question: Before you joined the Rideshare Scheme what was your main mode of travel to the tertiary campus area?

	Number	% of 119 respondents
Separate cars	58	49%
Rideshare	37	31%
Bus	27	23%
Cycle	9	8%
Walk	26	22%
Other	4	3%
TOTAL	*161	

*Please note that some people have selected more than one option.

Question: If you did not use the Rideshare Scheme, how would you travel?

	Number	% of 119 respondents
Car	102	86%
Bus	38	32%
Cycle	12	10%
Walk	23	19%
Other	2	2%
TOTAL	*177	

*Please note that some people selected more than one option.

As many respondents gave more than one answer it is difficult to assess exactly what this means in real terms. It does suggest however that Rideshare is incentivising driving instead of public transport or active modes for a reasonable number of people, and that the total number of cars that would be making trips if Rideshare was removed is actually likely to be lower than the 164 identified above, as some current ride sharers would opt for a combination of walking, cycling or taking the bus instead.

Even if only half of the people who indicated they would take the bus, cycle or walk, actually did, this would mean 30% of respondents would be using these modes. If this percentage is applied to the current numbers of cars actually using the Rideshare Scheme on a daily basis then of the 112 people who would no longer ride share, 34 people (30%) may bus, bike, or walk instead. So the actual number of people making single-occupant car trips may be closer to 78. This would mean without the Rideshare Scheme there might be 130 cars making trips into the tertiary area each day, 52 shared and 78 single-occupants. The parking pressure from this number of vehicles could be accommodated by the current Rideshare parks.

These figures are indicative only but suggest that while there may be a small loss from a sustainability point of view, as there may be around 130 cars making trips each day, as opposed to the current 108, there will be sustainability gains from increased active transport and public transport mode share. In the light of this the 22 car difference between the possible 130 cars and the current 108 seems negligible. The scheme, at these current levels, seems to be more symbolic than material in its sustainability and parking pressure gains.

This is complicated by the fact that surveys show 53% of cars parking in the Rideshare spaces are arriving with only one person in the car. This obviously defeats the whole purpose of the scheme as half of the cars parking each day are not ridesharing at all and are simply being provided with priority parking at a minimal cost of \$50/year. This also suggests that of the 108 cars per day using the Rideshare parking spaces, 57 of them are likely to not be ridesharing.

1.5 COUNCILLOR INFORMAL BRAINSTORMING SESSION, WEDNESDAY 21 SEPTEMBER 2011

An informal brainstorming session was held with Dunedin City Councillors to discuss current issues and identify possible solutions. It was recognised that the current Rideshare Scheme entails equitability issues which need to be resolved and any future scheme developments would need to incorporate solutions that would increase the equitability of the scheme.

It was widely agreed that promotion of a ride-matching website could be a good way of facilitating more ridesharing. However, there was also agreement that any measures intended to achieve the objective of sustainability and reduced parking pressure should not promote private car use to the detriment of public transport or active mode use, and so any promotion of a ride-matching website should entail promotion of public transport and active modes as preferable transport options where possible.

There was some discussion and support for the concept of using off-street parking to overcome some of the challenges associated with the current on-street Rideshare Scheme and it was also discussed whether there might be opportunities for leasing on-street car parks to institutions who wish to administer them as Rideshare car parks. The administrative, equitability, and financial factors surrounding these options were recognised to be significant barriers to their uptake. The session did not provide solutions to the key issues of low compliance and low-mode shift, which are discussed further in the following sections.

PART 2. OCCUPANCY AND COMPLIANCE

Surveys were carried out over 6 weeks in June, July and August 2011. All Rideshare parking locations were surveyed 6 times at 11:00am on a Thursday morning, to establish occupancy levels and numbers of people parking without two or more rideshare tokens. The key finding has been that despite the recent changes the Rideshare parks are still significantly under-occupied. This confirms ongoing complaints from staff and students at the University and Polytechnic about the number of empty parks.

2.1 Occupancy

Average occupancy is 66.5% – 70% at peak time (11am) (this drops to 62% if time between semesters is included). International best practice identifies 80% as target occupancy at peak times, as this is seen as the optimal balance between some parking always being available and minimal wastage of parking space. However, in a high pressure area such as the tertiary area and with a Rideshare Scheme where access to parking is restricted; occupancy exceeding 80% would be desirable. Currently, even at the busiest peak times the Rideshare Scheme is only achieving 70% occupancy. This is a significant drop from previous years which were over-subscribed, largely due to abuse of the scheme. This drop can be attributed to the \$50 cost of Rideshare tokens introduced at the start of 2011 having discouraged abuse and reduced uptake of the scheme.

There is significant variation in the popularity of Rideshare parking areas. Sections of all the Rideshare park locations farthest from University and Polytechnic are consistently empty, while all sections closest to University and Polytechnic are consistently full (see Rideshare Report to Planning and Environment Committee, 18 October 2011, Attachment 2). The consistently occupied parks are clearly the most popular and therefore most valuable. This could be seen as a strong indication that the under-occupied parks could be removed from the Rideshare Scheme, should the Council resolve to do so, to achieve 80% occupancy at current user levels. Alternatively, Parking Enforcement are of the view that the high-

occupancy, high value parks are the most appropriate for conversion to paid parking; with the currently vacant Rideshare parks remaining in the Rideshare Scheme or being converted to time-restricted parking. Removing the high-demand parks while leaving the under-utilised parks in the Rideshare Scheme may mean ride sharers begin to occupy these currently under-utilised spaces. However if these spaces are not considered desirable this will undermine the effectiveness of the incentive-based scheme which is currently focussed on *priority* parking. Parking that is viewed as B-grade, may be less likely to function as a real incentive.

Under-occupancy is a continuing cause of complaint from the tertiary institutions which needs to be resolved. This essentially requires either reducing the number of Rideshare spaces, or increasing the number of people using the scheme.

2.2 Compliance

13% of vehicles occupying Rideshare parking spaces do not display 2 or more Rideshare tokens. This is a mixture of Rideshare users breaching the scheme rules by only displaying one token, and non-scheme users parking in the Rideshare spaces (those displaying no tokens). Exact figures are not available as to the proportion of these, but the majority of non-compliance observed in surveys involves no tokens being displayed. Thus it is likely that this 13% infringement rate is mostly from non-scheme drivers exploiting the parking spaces rather than those registered in the scheme breaking the rules. This sort of non-compliance is not a major issue. It is easily enforced using conventional enforcement. Zero non-compliance is not a reasonable expectation and Rideshare is not unique in this respect as all parking suffers from some degree of abuse. Due to increases in enforcement and improvement to the distribution of the Rideshare parking spaces for 2011 this sort of non-compliance is being effectively enforced.

The major ongoing challenge for Rideshare compliance is people arriving in the morning with only one person in the car. Surveys in August and September 2011 show 53% of cars parking in the Rideshare spaces are doing so with only one person in the car. Several user comments suggest Rideshare users notice this and would like to see greater enforcement of the '2 or more people in the car' rule. Others complain that this aspect of the scheme is too draconian, as many users drop off their Rideshare partners at different points around campus before finally parking. Users expressed in the consultation meeting that many of the 53% single-occupant vehicles observed may in fact be ridesharing but have already dropped off their passengers and this should not be interpreted as 53% not ridesharing. However, this is still a breach of the scheme rules and is therefore 53% non-compliance with that rule. The rule is based on the reality that it is impossible for enforcement officers to distinguish between a ridesharing vehicle which has dropped off its passengers and one that is simply a single-occupant vehicle breaking the rules. Some users feel there should be more lenience to accommodate drop-offs like this. Such lenience may be practical for many ridesharers but such an approach depends entirely on trust and the honesty of scheme users. With surveys and user feedback already confirming that a significant number of scheme users arrive with only 1 person in their car there is little evidence to support such an honesty-based system. Such lenience would open the door to a thin-end-of-the-wedge scenario where increasing numbers of scheme users would begin to use Rideshare spaces for single-person car trips, knowing that compliance could not be enforced.

Furthermore, the need for this lenience is based on a desire from some users that the scheme should eliminate any need to walk between a park and a destination. This is not the intention of the scheme. All of the rideshare parking spaces are within 5 – 8 minutes of each other and thus most scheme users should be able to find a parking space that offers the most central access for all those sharing the car. The scheme offers priority parking but this does not suppose that a short walk is unreasonable.

There are two ways to resolve this issue. One is to remove on-street rideshare parking and centralise the Rideshare Scheme in a single off-street car park that can be more easily enforced. The other is to strengthen the current system through increased enforcement whereby single-occupant parking is simply not tolerated.

PART 3. ENFORCEMENT

3.1 Conventional enforcement

The requirement that 2 or more people must be in the car when it is parked is difficult to enforce. Parking Enforcement have reported that when people attempt to park with only one person in the car and they see a parking enforcement officer they simply drive on and park in a different Rideshare parking area. For on-street priority parking to work it depends on this 2-or-more-people rule and thus depends on increased enforcement. This could either be in the form of enforcement officers monitoring all Rideshare parking areas simultaneously at peak times and/or use of CCTV cameras. This would mean that if people arrive with only one person in the car they will be ticketed at all of the Rideshare parking spaces.

Parking Enforcement have expressed that they are not sufficiently resourced to dedicate the necessary staff time to this level of enforcement. An additional 4 staff (minimum) would be required to meet this level of enforcement, especially if the Rideshare Scheme is to be expanded to other parts of the city. Due to the need to have enforcement at each Rideshare parking area there is no economy of scale associated with enforcing the scheme. Each new area added requires additional enforcement resource. Doing so would also entail an opportunity cost from enforcement not taking place in other areas.

Feedback from some users suggested that this level of enforcement might not be necessary at all times to achieve compliance, but that a sporadic blitz approach could be utilised. Parking Enforcement have used a blitz approach in the past and have found it to be unsuccessful, generating a lot of complaints from users, large numbers of ticket waivers and having minimal impact on long term compliance with the scheme rules. Furthermore, with current resources, Parking Enforcement is not resourced to carry out this approach and this will become more of an issue if the scheme is to be expanded to other parts of the city.

3.2 Video surveillance

CCTV cameras are often cited as a potential way of resolving this enforcement problem. A CCTV system would be possible but is not a practical or cost-effective way of enforcing the scheme.

Pedersen Read, the firm who designed Dunedin's CCTV system in the Octagon, suggest that to be able to identify number plates consistently (c.70% of the time, not including in the dark) a 5 megapixel camera would be necessary every 15-25 metres. Over the full distance of the existing Rideshare locations (at 25m spacing) this equates to 38 cameras. This would provide footage of a quality that it could be reviewed, infringing vehicles positively identified, and fines mailed out. If the system had real-time monitoring (someone watching a screen with a live feed from the cameras) it would require fewer cameras, but would require a central monitoring station in real-time contact with parking enforcement officers who can administer fines immediately on the spot. As with increased enforcement, this cost would increase for every new Rideshare area added to the scheme if it was expanded to other parts of the city. Again there is very little 'economy of scale' as each new area would entail significant additional expense in CCTV infrastructure.

The costs of both CCTV and increased parking enforcement are substantial and not considered viable or worthwhile. These costs are outlined in the following section.

PART 4. COSTS

The estimated direct annual cost to the Council of running the Rideshare Scheme is shown in the table below.

Costs	
Department	
Transportation Operations	

• advertising, printing tokens, replacing signs/poles	\$7,000
• staff time administrating and monitoring	\$6,000
Parking Enforcement (staff time)	\$20,000
Customer Services Agency	
• issuing permits, processing explanations (staff time)	\$10,000
Business Information Services	
• updating website, maintaining database (staff time)	\$2,000
Transportation Planning	
• monitoring, review of scheme (staff time)	\$5,000
Total Cost	\$50,000
Income	
Income from infringement notices (for 2011, up to August)	\$30,000
Total income from \$50 token charge (377 tokens, 2 Aug 2011)	\$18,850
Total Income	\$48,850
TOTAL COST TO THE COUNCIL (for 2011 up to August 2011)	\$1,150

The table above shows that the cost of running the current scheme (primarily staff time) is largely offset by the income from infringement notices and the \$50 charge per token, with an overall cost to the Council of around \$1,150 pa. It appears that at current rates of infringement payments the scheme may even make a small profit by the end of 2011. The actual financial costs are therefore largely marginal, but the time-cost in terms of staff time is significant. It is important to note that this is dependent on a certain level of scheme abuse to ensure this income, which undermines the point of the scheme. If abuse is reduced to the point where the scheme effectively achieves its objectives, then infringement revenue will decline and the cost of the scheme to the Council will be higher.

If enforcement is increased to ensure greater compliance with the 'two-or more people in the car on-arrival' rule, then the cost of enforcement will be substantially higher than shown above. Likewise the costs and logistics of CCTV monitoring are significant, as shown in the table below.

Method	Requirements	Cost
Enforcement	<ul style="list-style-type: none"> 6 enforcement staff (Cumberland St: 2, Forth St: 2, Clyde St: 1, Harbour Tce: 1) for 3hrs per day. 	\$30/hr per staff resource (minimum) TOTAL: \$140,400 pa
CCTV	<ul style="list-style-type: none"> 1 camera per 15-25m (Cumberland: 15, Clyde: 7, Forth: 8, Harbour Tce: 8). Fibre-optic cable installation & trenching. 1 network switch box per location (4 locations) Monitoring/recording station, including server/hard drive. Staff or volunteers to review footage, or monitor in real-time, in direct contact with parking enforcement officer. Real-time monitoring would require a parking officer on-call in Rideshare area to administer ticket. 	38 cameras @ \$1800/camera = \$68,400 1000m trenching and cable @ \$75/m for trenching and \$10-\$15/metre for fibre optic cable = \$100,000 4 network boxes @ \$4000/box = \$16,000 Recording/monitoring station = \$20,000 TOTAL: \$177,400 (+ staff/volunteer time to monitor and/or review footage).

These costs are estimated for enforcement of the existing Rideshare spaces. If the scheme were to be expanded and additional Rideshare spaces added elsewhere in the city this cost would increase accordingly, and as mentioned above, additional enforcement staff required. The purpose of these measures is to ensure compliance. If successful this would mean there would be a decline in abuse and therefore revenue from infringement fines would also decline, further increasing the cost to the Council.

If on-street Rideshare priority parking was abandoned and an off-street car park was dedicated for Rideshare parking then access could be limited to one or two entry or exit points. This could enable the use of one CCTV camera or one person administering access to the car park. This would still require some installation cost and staff time, but these costs would be significantly lower than achieving effective enforcement of the on-street system. However, there are also significant costs associated with the use of off-street land or car parks for this purpose. This is discussed below in Part 8.1.

PART 5. USER PROFILE

The Rideshare database maintained by CSA holds the required registration information for each Rideshare permit holder. There was a major drop in number from 2010 to 2011. In 2010 a total of 993 permits were issued, as of 2 August 2011 377 permits had been issued, and registrations had slowed to the point where there had been no new registrations since July 2011. This drop in numbers is most likely due to the cost introduced for tokens.

Transportation Planning analysed the 2011 database (as it was at 2 August 2011) to ascertain the total number of registered scheme users and the proportion of these registered at the same address. The database analysis showed the following results:

	Number	% of total
Total number of registered rideshare users (at 2 Aug 2011)	377	
Number of individuals where 2 people registered at same address	210	55.7%
Number of individuals where 3 or more registered from same address	30	7.95%
Number of individuals where only 1 registered from an address	137	36.3%

While it does not automatically follow that two people registered at the same address would be sharing the same ride anyway, when coupled with the user feedback in the Evaluation and Satisfaction survey (discussed in Part 1), it is fair to suppose that many of the 55.7% of users registered in pairs at the same address would still most often rideshare regardless of the scheme and thus makes little difference to the number of single-occupant car trips. Where three or more people have registered at the same address it seems more likely that their ride sharing may be resulting in fewer single-occupancy car trips (e.g. multiple flatmates or family members agreeing to share one car as opposed to taking multiple cars).

It seems that due to the high proportion of pairs who are likely to rideshare with or without the scheme, the scheme is not achieving a significant reduction in the number of cars. This is consistent with the findings of the Evaluation and Satisfaction survey. Groups of three or more from the same address, and those where only one person is registered at an address, equate to 44.25% of the scheme users. So, it appears that roughly just over half of the scheme users (at least) are likely to share anyway, and just under half might represent a real reduction in single-occupancy car trips. However, of the half who may not rideshare in the absence of the scheme some of these would use more sustainable modes instead.

PART 6. RIDE MATCHING

For a ride sharing system to work most effectively it generally requires an incentive and a matching system. The current Rideshare Scheme offers priority parking as an incentive but its matching system is not a compulsory part of joining the scheme. Most users opt out of the ride matching service as they already have Rideshare partners organised. This is consistent

with survey data which shows that the majority of users are partners, family members or flatmates who are likely to ride share anyway. The ride matching component of the current system is based on old technology and is not integrated with other ride-shares in Dunedin. In addition the hardware on which the current Rideshare system is stored will be retired by the end of 2012, and BIS strongly endorse retiring it before 2012. It is not possible to move the existing website from its current hardware to new hardware; it would require rebuilding the system from scratch on new hardware. So a new website on new hardware is required whenever the old one is retired. A rideshare scheme with an incentive but no effective matching system tends to simply facilitate those who already rideshare, and does not achieve significant mode shift. However, BIS has confirmed that the existing Rideshare website does include a ride-matching function and the primary reason this has failed is due to users choosing not to use it, rather than a technical failure. However, for the reasons detailed above, BIS agrees that a more robust, modern and long-term ride-matching solution is desirable is preferable to the Council's existing system.

6.1 Ride matching website

There is a range of ride-matching websites available that could be promoted to encourage and facilitate ridesharing. This could either be done in conjunction with the current Rideshare Scheme, or in the absence of a scheme. The Polytechnic is particularly keen to promote a ride-matching website but wish to do so in collaboration with other major institutions in Dunedin, such as the Hospital, University and particularly the Council. The Transportation Planning Department supports the promotion of a ride-matching website in collaboration with major employers, institutions and workplaces. This was also supported by the Rideshare Scheme users present at the user consultation meeting.

PART 7. CASE STUDIES: OTHER RIDESHARE SCHEMES

7.1 New Zealand examples

Massey University – Albany Campus

Based on online research and discussion with Massey University Campus Security Parking Director, 12 September 2011:

Massey University at Albany, and the Albany Students Association, offer priority parking for ridesharing. The parking is provided on-site by the University, administered by the Albany Students Association, and enforced by Albany Campus Security.

Massey Albany has a clear and rigorous enforcement policy statement which involves the use of wheel clamping for breaching the rules of the scheme. The Campus Security Director responsible for enforcing this scheme confirms that enforcement is working effectively with need for only one staff resource each morning monitoring the car park and applying wheel clamps. The Albany Rideshare Scheme is the same size as Dunedin's with approximately 150 parking spaces designated to the scheme. However these spaces are all contained in one car park on University property, and are owned and operated by the University.

They have allocated the best parking on campus to the Rideshare Scheme to incentivise its use, rather than retaining it for leased parking. There is an information card with clear policy and procedural guidelines for appeals that accompanies every wheel clamping. Massey Campus Security report a 1 in 10 appeal ratio (for ever 10 cars clamped, approximately one person appeals, even fewer are successful in getting their clamp removal fee waived).

Of all case studies examined as part of this review, the Massey Albany scheme appears to be the most functional and most effectively enforced. This success seems to be dependent on the contained nature of their rideshare car park on University property, and having the staff resource from Campus Security to enforce it. The Dunedin tertiary institutions could potentially adopt a similar model.

Website: <http://www.asa.ac.nz/rideshare/?cat=rideshare>

Canterbury University

Based on discussion with the Canterbury University Sustainable Practices Co-ordinator, 11 August 2011:

Canterbury University used to offer priority parking on-site in University owned car parks. The scheme was administered and enforced by the University. The University has now abandoned the scheme due to high levels of abuse, with the majority of users being observed to be single-occupant drivers. The Canterbury University Sustainable Practices Coordinator stated that they never achieved successful enforcement, and it was very difficult to catch people breaching the rules. They did not want to use CCTV due to the time and money involved with monitoring it.

Due to the increased demand for parking and space for construction vehicles in the wake of the Christchurch earthquakes the Rideshare spaces were the first to be sacrificed. Because of the problems associated with it they have decided not to reinstate them. From 2012 they are moving to a new parking system which involves car parking with a barrier arm pay-on-exit system, where the incentive to share is based on reducing the cost to the user.

The Canterbury University Sustainable Practices Co-ordinator is instead focussing on increased promotion of car pooling to encourage ridesharing. They are looking at different online ride-matching options to promote and make it easier for people to find car pools and ride sharing partners. They will be promoting the cost saving as the main incentive to car pool.

Website: http://www.sustain.canterbury.ac.nz/transport/rideshare/priority_parking.shtml

Lincoln University

Based on discussion with the Lincoln University Cleaning and Security Coordinator (whose role encompasses University parking), 11 August 2011:

Dunedin's current 'Scarvie Rideshare Scheme' was originally based on a similar scheme first developed at Lincoln University in the 1990s.

Lincoln abandoned their Rideshare Scheme approximately 4 years ago and no longer offer priority parking. The scheme used to offer priority parking in a University-owned staff and student car park for people who registered with the scheme and arrived with two or more people in the car (on which the Dunedin scheme was modelled). The scheme was administered by the University but was never enforced. Due to the abundance of car parking space available (Lincoln does not charge for car parking and has an ample supply) there was little demand for the space and the scheme was not being used to its full potential. In essence there were too many parks for not enough people. Compliance with the scheme was entirely voluntary which led to many single-occupant vehicles and non-registered people using the rideshare spaces. This was not perceived as a problem as there were so many parking spaces available. In the end, the University allowed anyone to park in the spaces, and approximately 4 years ago (c.2007) abolished the scheme altogether. There was no negative response received as a result of the termination of the scheme.

Many Lincoln staff and students continue to car pool because it is the cost effective and practical thing to do given the rural location of the campus.

7.2 International examples

Northern Rivers Carpool, New South Wales:

Based on internet research and email dialogue with the Sustainability Program Leader (SPL), Tweed Shire Council, NSW:

This is a large sub-regional carpool scheme run and funded collaboratively by several agencies including NSW Transport and Infrastructure, 6 local councils (Lismore, Ballina, Byron, Clarence, Richmond and Tweed), Southern Cross University, North Coast TAFE and North Coast Area Health Service. Registered scheme users can order a priority parking

sticker. Priority parking is offered in a range of car parks, provided by the various parties involved in the scheme e.g. Universities, Hospitals, Councils etc.

The Tweed Shire Council SPL pointed out that this scheme is in its infancy and there is currently very low participation which means there is little conflict for priority parking. As a result enforcement is not currently an issue. The SPL also confirmed that all the Rideshare priority parking (which is based on convenient locations) is contained in off-street car parks. The Council is responsible for enforcing the scheme but because current uptake is so low and there is little conflict there is in fact no enforcement taking place. This lack of enforcement is not seen as a problem at this stage.

Website: <http://www.nrcarpool.org/index.php>

Seattle

Based on internet research. The Transportation Planning Department was unable to get information on how this is enforced or the effectiveness of this enforcement:

Seattle Council administers a downtown, on-street car pool priority parking scheme which allows ride sharers to park for a discounted rate (not free) in designated spaces. These spaces are only restricted to ride sharers from 7:00am – 10:00am. At other times these spaces are available to the general public. If you arrive or leave and return outside the times reserved for carpools and no spaces are available, finding alternative parking is your responsibility.

Seattle Council administers a very complex and rigorous system of registration. Users must register as a whole carpool (not just as an individual) – i.e. a group of adults living in the same area and working in similar area. There are strict rules around routes they must travel, how far they are allowed to deviate from the most direct route to pick up car pool partners, among other things. These factors are all assessed during the application and registration process.

This is the only other “on-street” rideshare scheme this review has identified. Transportation Planning was not able to make contact with the Seattle Council to discuss them and ascertain how successful it has been. It is clear however that the process for registering a carpool, combined with a reduced rate for parking (rather than free parking) suggests this system could not be replicated in Dunedin. Firstly, it is administratively intensive and would not be worthwhile given the size of Dunedin and the limited resources available to administer such a scheme. Secondly, given the low uptake of the existing Dunedin Rideshare scheme due to the \$50 cost of tokens and the need to comply with scheme rules, it is unlikely there would be much uptake at all of a much more rigorous and complicated scheme.

Website: <http://www.seattle.gov/transportation/parking/carpool.htm>

Other examples:

University of Arizona: Has parking lots set aside specifically for car pooling. Car parks owned and administered by the University Parking and Transportation Services.

Website: <http://parking.arizona.edu/alternative/carpool.php>

University of Colorado, Boulder: Designated on-site parking owned and administered by the University. 2-or-more people on-arrival rule only enforced between 7:30 and 10:00am.

Website: <http://www.colorado.edu/parking/parking/permits/carpool.html>

University of California, Los Angeles: Similar to Seattle scheme but not on-street. Students register for membership of a carpool, carpools are allocated permits for priority parking at discounted rates (not free). Administered by the University for University parking areas.

Website: <http://map.ais.ucla.edu/go/1001193>

Rutgers University, Newark: On-site scheme administered by the University.

Website: <http://nwkparking.rutgers.edu/carpool.html>

PART 8. OPTIONS

8.1 Off-street Rideshare Car park

The DCC Parking Enforcement team has expressed that if Rideshare is to continue they would prefer it to be in a centralised, dedicated off-street car park. There are several problems with this approach. The primary challenges for this approach are the lack of appropriate space available, and the cost of administering the car park. Offering priority parking as an incentive for ridesharing only works in areas where there is high parking pressure. Therefore offering parking in marginal areas, where appropriate car parking land is available, is unlikely to work because the distance to walk from the car park to a destination may be too far to be attractive, and parking is often readily available in such marginal areas anyway.

Within the central city the only feasible opportunity for this would be to either purchase or lease a piece of land specifically for a rideshare car park, or dedicate part of an existing car park for use as a Rideshare park. Options include:

- Part of the Great King Street parking building.
- St Andrew Street Car Park (currently leased from KiwiRail).
- The new Thomas Burns St car park.

Costs for using an existing car park as a Rideshare car park, include the lease costs, maintenance costs, cost of video surveillance infrastructure or a staff resource to monitor and enforce compliance. The opportunity cost of what would otherwise be recouped from those car parks, either as paid parking or leased parking should also be considered. If new sites were to be acquired, either through lease or purchase, to provide rideshare parking where there is no existing car park availability, this cost would also need to be considered. The viability would also depend on the availability of suitable land in appropriate locations.

These costs would be offset by revenue recouped through infringement fines. However, due to consistent surveillance it is likely infringements would decline from current levels and this revenue stream should therefore be expected to be lower than with the existing Rideshare Scheme. The economic viability of the current Rideshare Scheme depends on a sufficient level of abuse to ensure sufficient revenue is returned. However, the purpose of developing an off-street Rideshare Scheme would be to reduce abuse so the scheme better achieves its objectives. It would be counterproductive to undermine the purpose of the scheme so that it continues to be economically viable, as is currently the case. On the basis of the scheme's marginal benefits identified in this review, it seems the costs involved with enabling it to achieve its objectives, whether on-street or off-street, are significant enough that they are not justified.

8.2 Tertiary institutions providing Rideshare Car parks

One possibility would be for the tertiary institutions to provide their own Rideshare car parks on their own sites and administer their own schemes to cater for demand from their staff and students. This is a standard approach internationally where priority parking is provided for ridesharing.

The Council could encourage the tertiary institutions to provide for this. It may be possible to achieve this through the Parking Protocols that the tertiary institutions have with the Council. The Council could negotiate that a percentage of on-site parking provided under the Protocol be for ridesharing. Under the current Protocols, which are due for review, the Council does not specify the type of parking to be provided. City Development who lead the Parking Protocol review process have indicated that a strong resource management reason would have to be given for them to require the tertiary institutions to supply rideshare parking through the Parking Protocols. Based on the current evidence from this review such a resource management mandate is not supported. The Council could however still negotiate for Rideshare parking to be included through the Parking Protocols.

8.3 City-wide Rideshare Scheme

In light of the expense and challenges associated with monitoring and enforcing on-street priority parking for ridesharing, or developing off-street rideshare parking, it is unlikely that a city-wide priority parking Rideshare Scheme will be successful. There may be significant uptake of such a scheme but it will either be expensive to monitor and enforce, or very prone to abuse as has been demonstrated with the existing Rideshare Scheme. Furthermore, on the basis of sharing patterns witnessed with the current scheme it is also likely a city-wide scheme will make only a small impact in terms of sustainability and parking pressure reduction.

Currently the main criticism of the scheme in the tertiary area is due to the cost of tokens and the under-utilisation of the scheme resulting in an over-supply of empty rideshare car parks. If on-street rideshare was introduced in other parts of the city there is a risk this situation would occur more widely.

One possible method that has been suggested for dealing with this problem would be to have paid-parking areas (e.g. \$5/day) which are free, or at a reduced rate, for ridesharers. This would mean the parking spaces are not exclusively reserved for Rideshare Scheme users. They would be open to anyone but ridesharers could park for free or at a reduced rate, while single-occupant vehicles or non-scheme users would pay full parking fee. The advantage of charging a reduced rate for ridesharers, as opposed to offering free parking, is not only the increased revenue gathered but it also makes use of active modes, public transport, or ride sharing with more people, more competitive.

Such a scheme might make ridesharing significantly more appealing, both financially and practically, than single-occupant driving, but not significantly more appealing than using other more sustainable modes. Parking Enforcement has indicated a number of areas in the central city (such as York Place between Smith St and Tennyson St) that would be suitable for conversion to \$5/day parking. If this were to take place these areas could be considered for such a reduced-rate Rideshare Scheme. However this approach does not overcome the problem of enforcing compliance among cars arriving with only one person in them. Enforcing compliance on-arrival would still require either CCTV or high levels of enforcement, at the considerable expense detailed earlier in Part 4.

As discussed earlier, Parking Enforcement has expressed a preference that the scheme be discontinued altogether, but that if it is to continue their preference would be to have a designated off-street car park for ridesharing. As identified in Part 8.1, the lack of appropriate available space is an obstacle, and the costs associated with providing car parks for this are not justified.

In conjunction with (or in the absence of) a city-wide priority parking scheme, ridesharing could be facilitated through the promotion of a ride-matching website. The Polytechnic is eager to begin promoting use of a ride-matching website, while the University has expressed provisional interest in doing so if it is part of a wider, integrated whole-city approach supported by the Dunedin City Council.

8.4 Other parking options

At the internal review meeting Parking Enforcement and the Development Services Manager both expressed support for converting the Rideshare spaces into \$5/day parking and a range of time restricted parking. The support for \$5/day parking is based on its success in other parts of the city. There may be scope for some \$5/day parking in the existing Rideshare areas; however the Evaluation and Satisfaction survey showed that if the priority parking was no longer available 74% of Rideshare users would use free parking further out, and only 10% said they would use paid on-street parking. This is consistent with stakeholder feedback from the University and Polytechnic who both emphasised that there would be little demand for all-day paid parking from those sectors. It seems unlikely that the student population would pay for parking and thus widespread roll-out of paid parking could have the negative effect of pushing tertiary parking further out into residential areas.

Determining the type and distribution of parking that might replace the Rideshare Scheme if it is discontinued requires further investigation. It seems a range of free time-restricted parking, free all-day parking, and time-restricted paid parking would be most appropriate to replace the Rideshare spaces if the scheme is discontinued. There may also be some places where \$5/day parking is appropriate. Any decisions as to future parking would need to be taken in close consultation and cooperation with the tertiary institutions and the student body.

Rideshare Scheme – Evaluation and Satisfaction Report July 2011



1. Method and Response

In July 2011, Rideshare Scheme evaluation and satisfaction surveys were emailed to all users of the Dunedin City Council Rideshare Scheme. There were 119 responses which gives a response rate of 37%. Please note that figures have been rounded and that not everyone chose to answer all questions. Appendix 1 provides the comments in full for Section 4.

2. Overall Satisfaction

79% of respondents said that overall they were very satisfied or satisfied with the Dunedin City Council Rideshare Scheme.

3. Satisfaction with Aspects of Scheme:

	Very Satisfied 1	Satisfied 2	Neither satisfied nor dissatisfied 3	Dissatisfied 4	Very Dissatisfied 5
1 Eligibility criteria	37%	39%	11%	11%	2%
2 Token system	37%	43%	14%	2%	3%
3 Exclusion zone	29%	43%	18%	7%	3%
4 Enforcement	24%	36%	25%	7%	9%
5 Availability of parking	43%	36%	10%	7%	4%
6 Priority parking	36%	37%	20%	6%	2%
7 Cost	12%	30%	24%	24%	10%
8 Overall satisfaction with Rideshare Scheme	25%	54%	12%	7%	3%

Number = 119

4. Summary of Comments and Suggestions on how Rideshare Scheme might be Improved*

Topic	Number
Eligibility criteria	22
Cost	19
Enforcement	13
Parking availability	8
Exclusion zone	5
Positive comments	4
Tokens	3

* See Appendix 1 for comments in full.

5. Main Mode of Travel before Joining Rideshare Scheme

Question: Before you joined the Rideshare Scheme what was your main mode of travel to the tertiary campus area?

	Number	% of 119 respondents
Separate cars	58	49%
Rideshare	37	31%
Bus	27	23%
Cycle	9	8%
Walk	26	22%
Other	4	3%
TOTAL	*161	

*Please note that some people have selected more than one option.

'Other' methods were:

- Lived closer to the University;
- Own a car;
- First year of study.

6. Main Incentive for Using Rideshare Scheme

	Number	% of 119 respondents
Cost sharing	53	45%
Priority parking (i.e. convenience)	96	81%
Cheaper than bus	36	30%
Cheaper than other paid parking	48	40%
Other	11	9%
TOTAL	*244	

*Please note that most people selected more than one option.

'Other' incentives were:

- Environmentally better (x4);
- Faster than the bus (x2);
- Too far to walk;
- I can drop children off at school;
- Port Chalmers public transport is not always at suitable times;
- Company;

7. Priority Parking

Question: If priority parking was not part of the Rideshare Scheme would you still rideshare?

	Number	%
Yes	56	48%
No	60	52%
TOTAL	116	100%

8. Alternative Transport

Question: If you did not use the Rideshare Scheme, how would you travel?

	Number	% of 119 respondents
Car	102	86%
Bus	38	32%
Cycle	12	10%
Walk	23	19%
Other	2	2%
TOTAL	*177	

*Please note that some people selected more than one option.

Comments under 'Other' methods were:

- Would not use bus in winter as it takes three different companies to get there.
- No option but the car for me.

Question: If you answered by 'Car' to the previous question, where would you park?

	Number	% of 119 respondents
Parking building	8	7%
On street paid parking	12	10%
Other paid parking	9	8%
Free parking further out	88	74%
Other	10	8%
TOTAL	*127	

*Please note that some people selected more than one option.

Comments under the 'Other' areas of parking are:

- Wherever possible (x3);
- Further out but this would mean long cold walks in winter with toddlers;
- Get dropped off (x2);
- Extreme shortage of parking so none of above options is available;
- Need to know cars are parked legally with exam supervision.

9. Rideshare Arrangements

Question: How many people do you usually rideshare with (excluding yourself)?

	Number	% of 119 respondents
One	61	51%
Two	45	38%
Three	21	18%
Four	3	3%
More than four	1	1%
TOTAL	*131	

*Please note that some people selected more than one option.

Question: With whom do you rideshare?

	Number	% of 119 respondents
Partner	44	37%
Family member/s	31	26%
Friend/s	39	33%
Flatmate/s	28	24%
Work colleague/s	24	20%
Other	3	3%
TOTAL	*169	

*Please note that some people selected more than one option.

Comments under the 'Other' section were:

- Other University students;
- Hitchhikers;
- Community members.

Question: Are you?

	Number	% of 119 respondents
Staff member at University	37	31%
Student at University	66	55%
Staff member at Polytechnic	9	8%
Student at Polytechnic	16	13%
Other	4	3%
TOTAL	*132	

*Please note that some people selected more than one option.

'Other' options were:

- Exam supervisors (x4);

Report completed by:

Policy Analyst Team, Dunedin City Council

Contact Anne Gray, agray@dcc.govt.nz with any questions.

22 July 2011

Appendix 1 – Comments in full

Eligibility criteria:

- I believe that non-terms times should be excluded especially late November through to the end of February.
- I think from December 1st until February 28th these rideshare parks should be opened to everyone.
- The requirement that two people be in the car when it is parked is unduly onerous. If you work in different places it makes more sense to drop the others off and of course then only one person is in the car when it was parked even though the overall goal of the scheme was achieved.
- Open it to anyone working or studying in the area.
- Lots of spaces which are not being used during this time because of rideshare rules. Does it need to apply all year? November to beginning of February it could be exempt as the majority of students are away.
- Maintaining the university and polytechnic staff's eligibility to the scheme.
- None except that consistency would be useful since it ought to be available for all, students or staff.
- Some allowance would be helpful for people to be able to drop a person off around the campus block if carrying tool bags, boxes etc e.g. parking at Forth St and one having to walk to L Blk Anzac Avenue with a load (as two people are required to get out of car). Also in rain etc when one has to walk distance not able to be dropped off closer (when have to drive past where would be convenient to drop them off).
- We are Exam supervisors and use for the time when exams are on only. We found it very good, we were there by 8.15 in the morning and had no problems. On one occasion a girl parked behind us with 2 rideshare tickets in her car and only her in the car- quite against the rules.
- I purchased my voucher for \$50 registered I wanted a match and am still waiting - so what have I got for my \$50.....nothing.
- As we use our park only twice a year for around 10 days each time to supervise university exams a cheaper rate for an allocated time would be great.
- I come early to ensure a park and never travel alone and was annoyed that initially the rideshare had become student exclusive.
- I would suggest making the rideshare parking spots dual purpose, with \$1/2hrs parking meters on at least some of the less used ones. It is great to have them available and it would be sad to lose them, but equally, it is a nuisance if they are left empty and you arrive alone when there is no other choice for parking - one would be prepared to pay in an emergency (better than getting an unfair \$40 parking ticket). Also, it's extremely frustrating not to be allowed to arrive by oneself in a rideshare spot if one has just left for some reason - e.g. my son and I arrive together in the morning, but if he leaves for lunch and then comes back, the same spot is still sitting empty but he's not allowed to park in it because I am not in the car with him. We have paid for the tickets, we should be allowed to use them whether we both arrive in the car or not at any one time. I'm not sure if lecturers are allowed to buy tickets now - why not allow them to buy tickets for a higher price, since they are earning? Also suggest that those who might want to pay a higher price to be allowed to arrive on their own be allowed to buy a special ticket- \$300 would not be unreasonable.
- Staff arrive earlier and are here still long after students have departed for the day so I do hope this remains available for all.
- I am a student, however, I think staff should have been eligible for rideshare.
- As the occupants of our shared vehicle we are supervisors of University exams only at exam times. We feel that to pay \$50.00 each for each year (a maximum six (6) weeks only being the Exam period) is not in keeping with the annual cost as if we were parking for a whole year and a reduced fee for persons like ourselves would be welcomed. Verification of our exam status can be obtained from the University.
- Providing 6month and 12month RS options. These could be colour coded. 6month \$30 - Blue; 12month \$50 - Yellow.
- I feel the requirement for both to be disembarking from the car at the same time is impractical and doesn't make sense. I work at the hospital and my husband

works at the university. We drive past the hospital and it makes sense to be dropped off on the way rather than double back.

- Improve eligibility for cyclists or people who DONT use their cars every day of the week. I would like to have priority usage when I do use my car, I avoid using it four out of five days, only to carry in art work, or really bad weather.
- I am doing a Midwifery degree which means I'm not at campus full time. We are only there for about six weeks of the year. I would have liked to have received a discount for rideshare since it was not full time.
- It needs to be open to University staff (initially it was only students).
- It could be made available to staff who work part time (i.e. only part of the year, such as at exam times) at a cheaper rate. Examination supervisors do not use it for the whole year. But we are very grateful to be able to use ride share as all day parking space is very difficult to find otherwise.

Cost:

- It's a little expensive, but for the purpose of the scheme it's worth it.
- Costs should be eliminated to encourage people to rideshare. Rideshare should be expanded to include areas in the CBD.
- Less cost, more Rideshare "pockets" of parking (as it was before). Being able to find rideshare parks at many different locations was very convenient!
- Also, \$50 a token is very steep considering the previous year was free. Maybe cheaper tokens would have allowed more students to buy them thus making you more money.
- Seems now a good balance of cost and having enough ride-share parking spaces available.
- Cost is a quite high for exam supervisors such as us since we only need the park for 6 or 7 weeks per year.
- Make it cheaper for students!
- Stop making it cheaper for students, and excluding others, students aren't the ones who need preferential parking, they live near campus already.
- I believe rideshare is for students, but the cost doesn't seem to be appropriate for students at all. We get a student allowance that is hardly any income due to flat payment and still have to pay \$50. It is not easy to pay such an amount all at once.
- Remove the \$50 "administration" charge. If you are trying to encourage better driving behaviour (i.e. less cars on the road), then don't punish those who are ready to change their behaviour by charging them.
- Decrease the cost for the token and make more parking available.
- Students need to get a subsidy on cost but are still happy to pay \$100 per year if there is plenty of available parking.
- \$50 each person is quite expensive for one family.
- I am an exam supervisor and only use rideshare while exams are on so my view is very narrow. I realise there must be a cost but no reduction was given to us just using it for approximately 6 weeks.
- Going from free to \$50 per token was a big jump. I think that the tokens should be graded. For example, I live in Mosgiel and my car pooler lives on the Taieri close to the airport. I think you should charge say \$5-\$10 for people who live that far away and the closer you get to town, the more you could pay for example \$50 if you live just outside the exclusion zone as these people have other cheap options such as the bus or cycling. For us to catch the bus it is 11.60ish per day return each which is more than it costs to drive. The other problem I have with the scheme is that I went to sign up in the April holidays and the staff at the DCC told me that the rideshare was now only available to staff at the University. I couldn't believe this as they already get allocated parks and the rideshare scheme was designed for students. The next week I get a phone call to say the staff member was misinformed and that I could get tokens. As I live in Mosgiel, I was very angry about having to make a second trip in to finally buy tokens. I think the whole process of purchasing tokens is terrible.
- Drop the \$50 payment. Honestly there doesn't seem to be a reason for it, there aren't extra parking wardens etc.
- Too expensive – it should cost less. \$20-25 per person is reasonable. Because there aren't enough rideshare parks.
- Were going great however the fees were too dear!

- The overall cost is too high for casual part time examination supervisor staff.

Enforcement:

- Would it be more economical to have the regular parking attendants enforce the rideshare instead of council staff? We park in rideshare on Cumberland St every day and we often see people violating the system. Is there a system in place where we could text in their licence plate number? I think that if there was better enforcement there would be fewer violators.
- More enforcement around the St David area just before 8 and 9 0'clock lectures would catch a lot of abusers!
- More signs for Rideshare parking, a lot of parks being used that are not Rideshare.
- Enforcement - I have never seen anyone enforcing the two people per car thing and continue to see one person arrive around 8.30 am.
- Parking officers need to look in the windscreen before issuing tickets for no tokens, which are clearly displayed.
- We have only ever seen an enforcement officer on Cumberland Street once, and every day there are cars illegally parked in the rideshare zone. More enforcement needs to be used, as people are abusing the parks. Thank you.
- A warning for the first time one forgets to exhibit their tokens, not an instant \$40 fine. It is not as if we have not already paid for the parking.
- We saw many arriving with only one person in the car.
- Given the available car parks, enforcement has been significantly improved this year (rules have been abused in previous years).
- Do away with the \$50 fee and enforce the rules more stringently. Prior to this semester we often used to see only one person pull up in a car but they always seemed to have tokens.
- I was satisfied with rideshare in 2010. Then you broke it. The enforcement is almost nonexistent. The staff in/out was farcical. It is a good thing, rather than break it more, put it back like it was and expand it to other areas in the city - those with even worse parking, it only works as an incentive where there is a shortage.
- More strict enforcement needed. Often see people parking with two tokens but only one person.
- I have been given three tickets even though my token was clearly displayed. First time the DCC was kind enough to wipe the ticket. The second time I didn't even know I was given a ticket until the court notice was issued and the third time I couldn't be bothered dealing with it anymore.

Parking availability:

- Distribute more parking areas equally over campus. Some of them were removed (e.g. Riego Street) which were more accessible for me. Most of the parking areas are not best placed for everyone. Not that one has to pay for a token, service should be improved for everyone.
- More wide spread parks.
- Parking in front of D block should be returned to rideshare.
- Need to improve ride share parking for students as there is not enough available at the moment.
- I expect it's better to let the attitudes of one person and not two, because in some cases, there are no facilities for some people.
- The mucking about before arrangements were settled was ridiculous - either a general request for information or common sense would have made the DCC look a lot less foolish. The current restriction to students only is also ridiculous, as can be seen by the minimal use of RideShare places, even at the height of term. However, this all works in my pool's favour as we are in part-time study.
- More rideshare parks.
- More (or reallocated) parks around Logan Park.

Exclusion zone:

- It's not clear what the Council motivation is for the scheme. The current version is not working - as is evident from the number of empty parks. The exclusion zone excludes most students and cost is a disincentive for them. OK to charge for staff but overall it is not a money making scheme, surely? Not impressed with having staff initially excluded from scheme - a car is a car.
- Charging full price for people coming into the scheme part way through the year is unfair.
- For \$50 per rider investment you would not want any fewer parks available than there are now. It's important not to over allocate.
- I can't see this scheme working in the inner city very well.
- The DCC are driving cars out further and further away from campus area but there is nowhere else to go - no parking towards Ravensbourne, no parking around gardens... majority of people will NOT use the bus due to high fares and lack of convenience and regular/frequent times.

Positive comments:

- In the last three months the ride-share scheme has worked the best it ever has for us. In previous years we were only able to get a ride-share park during University student holidays. Now we get a ride-share park every day. We would like to keep the current arrangement as it seems to reward those who use it honestly.
- We really appreciate the rideshare scheme. Introducing a cost for tokens definitely resolved issues of abuse. The cost of tokens is very fair and also opening the scheme up again to university staff was a good move.
- I believe it was a good idea to charge for the tokens, as the students who didn't really need the parking were detracted from purchasing them, leaving guaranteed parking space for the rest of us who did.
- No suggestions for improvement, other than maybe increasing the number of Rideshare parks. PLEASE don't take Rideshare away, it makes a HUGE difference for students to be able to park conveniently at reasonable cost. With two students in our household it is cheaper than the bus and we so appreciate not having to walk for 10 minutes or more, especially when its raining/freezing cold.

Tokens:

- Be a bit more flexible with tokens being misplaced. I misplaced mine one day as obviously rideshare we swap cars weekly, we wrote a note to inform what had happened and were going to replace next day as we had a class to attend to and left a note in the window with the remaining token. This resulted in a \$40 fine and we subsequently found the other token in the other car, this fine was not waived which is vey unjust.
- The use of tokens is good because you can change the cars they are in. The method to get a ride share token is too over the top. Instead of having to go away and apply online and then take in it why is it not also possible just to fill the forms out at the DCC when you've found time to go there?
- Tokens are tricky - they easily slide off dashboard and get lost, could consider an alternative solution.

Rideshare Scheme

Draft Evaluation Report

Summary

This report is an evaluation of the effectiveness and efficiency of the Rideshare Scheme, which has been run since 2001 by Dunedin City Council, Otago University Students Association and Otago Polytechnic Students Association, working in partnership.

The report evaluates the scheme and highlights areas of strength, weakness, and opportunities for improvement.

November 2009

Aukje van Aalst, Transportation Operations
Sarah Weller, Transportation Planning

1 INTRODUCTION

The Rideshare Scheme, which is a car-pooling scheme, has been running for nine years. This is the first evaluation of the scheme since the introduction of the scheme in 2001. The aim of the evaluation is to identify whether the scheme is still relevant, and assess the efficiency and effectiveness of the scheme in meeting its objectives. As part of this process, strengths, weaknesses and possible improvements to the scheme have emerged, and these have been included in the relevant section, and in a discussion section at the end of the report.

The need for an evaluation has arisen due to several contributing factors: there are some flaws with the scheme that have become apparent over the years and which it would be beneficial to address; abuse of the system by non-ridesharing drivers has been widespread and needs to be addressed since these drivers are parking for free in a priority parking area; and there has been some discussion at the officer level about extending the scheme to cover the whole of the city. Regarding the latter, before making a decision to extend or limit the scheme, it is important to understand how well the existing scheme is working.

2 BACKGROUND TO THE RIDESHARE SCHEME

The introduction of the scheme was initiated by the Dunedin City Council in consultation with representatives from the University of Otago, Otago Polytechnic and the Dunedin College of Education.

Exact details regarding the emergence of the Rideshare Scheme are not available, however one of the Transportation Planning employees at the time had previously worked at Lincoln University where there was a successful rideshare scheme 'Lincoln Connection'. This scheme was sponsored by the Energy Efficiency and Conservation Authority (EECA). It is likely that the employee had seen the success of Lincoln Connection, and wanted to run a similar scheme in Dunedin, around the Campus area. An email from Don Hill (4/4/2001) stated that no formal resolution for the scheme to go ahead was necessary at the time, however it had been discussed with the Mayor and the Chief Executive at the time, who had given it "their blessing". Dunedin City Council customised the Lincoln Connection website to suit commuting around Dunedin City and the "Scarfie Rideshare" scheme was introduced in 2001.

The objectives of the Rideshare Scheme are:

1. To provide improved commuting options for users;
2. To reduce the number of single-occupant cars on the roads and therefore traffic volumes, with knock-on effects of improving local air quality, reducing greenhouse gas emissions, reducing noise levels, improving amenity and safety;
3. To provide priority parking as an incentive to rideshare;
4. To reduce parking pressure in the Campus area.
5. To provide a journey matching service for participants wanting to share long distance journeys.

Initially the scheme was open for the period March to November each year, to coincide with the academic year. During this time participants who had joined the scheme and rideshared were able to park in the priority parking zones that are spread throughout the campus area. Between the months of December to February the priority parking zones would become standard all day parks available for anyone to use.

In 2008 it was decided to extend the scheme to run all year round, 7am-6pm. This was due to a number of reasons, including: the increasing number of requests to rideshare all year; the increasing number of summer school students; and because a survey undertaken in 2007 identified that one third of participants surveyed were staff members who work year round.

Although the statement on the Rideshare website indicates that only staff or students of the University or Polytechnic can register for Rideshare, this has never been strictly enforced and each year a small number of people who work at other businesses in the campus area also

register. It appears that when the scheme was initially introduced the intention was to open the scheme up to a city wide scheme which included increasing the number of priority parking zones however, for various reasons this has not happened. There are currently 141 Rideshare Priority Parking spaces arranged in 8 separate locations.

In 2009 EECA contacted the DCC and requested that all references to EECA on the website be removed as they are no longer focusing in this area.

The rules of the scheme are outline below:

1. The Rideshare parks can only be used by Rideshare users who:
 - a. Register as a carpool participant
 - b. Display at least two valid tokens on the dashboard of the vehicle
 - c. Have all token holders in the vehicle at the time of parking
2. As of 1 May 2008, the Rideshare scheme now runs all year round between 7am and 6pm, Monday to Friday.
3. The Rideshare parks are located in various locations around the campus. See [map](#).
4. You cannot obtain a Rideshare parking token if you live in the North Dunedin/City Centre area. See [map](#) for area covered.
5. To be a Rideshare participant you must register on this website every year.
6. 2009 tokens will be available from 2 February, so please obtain and display these as soon as possible.
7. The parking tokens are valid until 28 February 2010

3 RELEVANCE

In order to evaluate the scheme, it is necessary to question whether the scheme is still relevant, nine years after inception. One way of doing this is to examine the objectives, and see if they are still relevant in 2009.

The objectives of the scheme are:

1. To provide improved commuting options for users;
2. To reduce the number of single-occupant cars on the roads and therefore traffic volumes, with knock-on effects of improving local air quality, reducing greenhouse gas emissions, reducing noise levels, improving amenity and safety;
3. To provide priority parking as an incentive to rideshare;
4. To reduce parking pressure in the Campus area.
5. To provide a journey matching service for participants wanting to share long distance journeys.

These objectives are consistent with the Council's existing transportation priorities, which are stated in the DCC Transportation Strategy (2006). The Rideshare Scheme contributes to the following objectives:

Outcome Area: Accessible City, Wealthy City

"Provide for the competitive movement of goods, services and people by investing in key routes that improve transportation flows." Further to this objective, the strategy states that Dunedin needs to have efficient local transport alternatives that meet community needs.

The Rideshare Scheme is an efficient, local transport alternative which contributes to reducing the number of single-occupant cars on the road.

Outcome Area: Sustainable City, Safe and Health People

"Support sustainable transportation that minimises energy consumption and engine emissions into the environment, is an efficient use of Dunedin's infrastructure and encourages physical activity."

The Rideshare Scheme reduces the number of single-occupant cars on the road which contributes to minimising energy consumption & engine emissions.

Outcome Area: Sustainable City, Safe and Health People

“Protect and enhance the vibrancy and vitality of Dunedin’s central city, campus, suburban and town centre.”

The Rideshare Scheme reduces the demand for commuter parking around the campus area. This means more parking is available for businesses and casual visitors, thereby enhancing the vibrancy and vitality of the area.

The objectives of the scheme also contribute to objectives in the transportation section of the Tertiary Precinct Development Plan (2008). In particular they link to the following objectives:

“Develop an environment that reduces car dependency and encourages alternative forms of transport.”

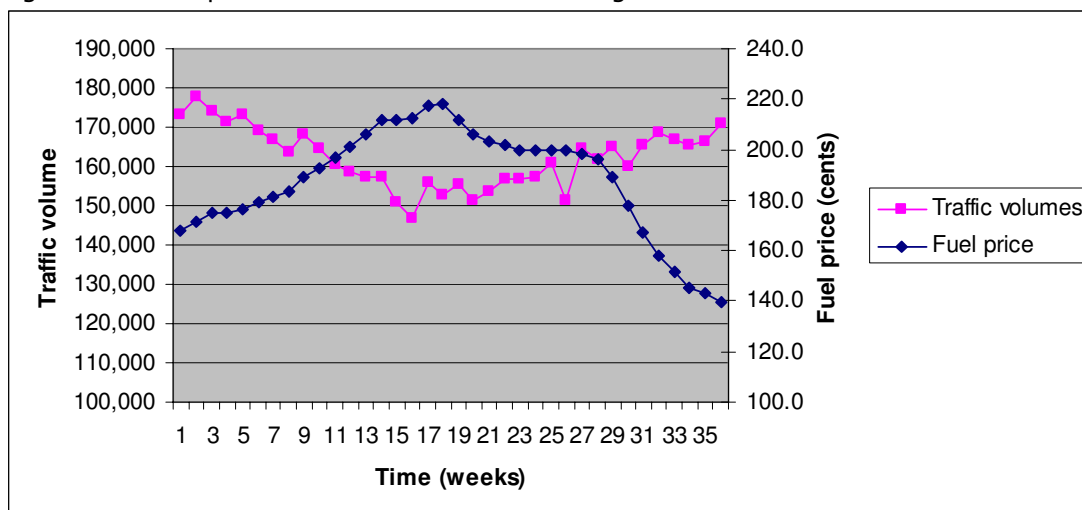
The Rideshare Scheme reduces car dependency as only one car is used to transport up to five people.

“Short-term solutions are developed to encourage pedestrian priority and ease car dominance in the campus area.”

By ridesharing there are less single-occupant cars on the road which contributes to easing car dominance in the campus area.

In addition to these local objectives, there is the wider agenda to consider. There is increasing evidence of the damage that is caused by greenhouse gases released from many sources including motor vehicles, and the resulting climate change and sea level rise. Initiatives such as ridesharing help to reduce the number of motor vehicles on the road at any one time, therefore reducing greenhouse gas emissions. A further global issue to take into account is ‘peak oil’ and the effect that this has had, and will continue to have, on petrol prices. In 2008, petrol prices peaked at around \$2.20, and the media at the time contained many anecdotal reports of the effect this had on people’s driving habits. The graph below shows how petrol prices changed during 2008, and the impact this had on recorded traffic levels.

Figure 1: Petrol prices and traffic volumes during 2008.



Initiatives such as rideshare will assist people in retaining their personal mobility in the longer term, in the face of rising petrol prices. The possibility of rideshare schemes as an alternative travel option should not be underestimated.

Conclusion

In conclusion, the above discussion serves to highlight that the Rideshare Scheme is more relevant than ever in today's environment. Not only does it meet the Tertiary Precinct Plan aims to reduce the level of vehicles in the Campus area, and contributes to the objectives of the Council's Transportation Strategy, it also addresses helps to tackle climate change and provides a transport option that will become more and more popular as petrol prices rise in response to peak oil. Peaks in petrol prices last year show that the current level of single-occupancy commuters is unlikely to be sustained in the long term and the demand for rideshare and carpool programmes is likely to increase.

4 EFFECTIVENESS

This section assesses the effectiveness of scheme operation, and also how effective the scheme is in meeting the objectives. At the end of each section, the effectiveness is discussed, and strengths and weaknesses highlighted.

4.1 Operation of scheme

4.1.1 Registering for scheme

Registration for Rideshare is done online by visiting the rideshare website www.dunedinrideshare.co.nz. Once the applicant has read through the rideshare rules, and how to register they are taken to the registration page where they are required to fill in their travel details and select whether to be sent potential rideshare matches or not. Once registration is completed, the applicant is sent two emails. One is a 'confirmation of registration' email and the other is 'priority parking' email.

The priority parking email is needed to gain the rideshare token. The applicant prints out this email and fills in the details (name, address, phone no, signature, selects whether they are staff or student). They then take this information to either the Otago University Students Association (OUSA) or Otago Polytech Students Association (OPSA) along with photo identification (so they can verify the applicants name) and proof of address (so they can check the applicant does not live in the exclusion zone). If these conditions are met, the email is then exchanged for a token, and the token number issued is registered against the applicant on the rideshare database.

Effectiveness

Strengths:

- Easy to register
- Token pick up location convenient for users

Weaknesses:

- OUSA/OPSA are pressured for time especially at the beginning of the year so they are unable to do thorough checks to see if people are registered twice – this can mean the same person can get two or more tokens, which they can then display in the car, and still use the rideshare spaces even though they are travelling alone. Problems also arise as they are often unable to enter information on to the database at the time of registering which leads to data entry errors, e.g. the same token number being issued to two different people.
- In the past, OUSA and OPSA have been lenient regarding qualification for the scheme at the registrations stage. For example, they have allowed people to pick up tokens that are not theirs.
- One issue that re-occurs each year is adults with young children who register themselves and their child as a carpool. The Council view is that this is not actually ridesharing because sharing a car with a child under the driving age is not reducing the number of single-occupant cars on the roads, as this child would not drive themselves in other circumstances. This is something Council staff have been encouraging the OUSA and OPSA to enforce more thoroughly, as in the past they have been very lenient in issuing tokens.

- The information required on the priority parking email is not always filled in entirely, often phone numbers, staff/student information is missing. This information is needed for analysis and is currently hand written on each form and then has to be transferred onto a spreadsheet.

Improvements: (see discussion document Section 1 & 2 for further information)

- An updated carpool software programme may make it much more difficult for people to register themselves twice, and also make it easier to search for a double up on names, email addresses, and home addresses.
- Updated software should be able to collect the information we require for analysis, these fields will be required to be filled in so no data can be missed and would make it easier when issuing tokens. Information would not be double handled as the software should be able to run reports to get the information out for analysis.
- DCC to take over registration and token issue.
- Introduce an age restriction or some other type of restriction to address the issue of parents registering their children.

4.1.2 Issuing of tokens

The issuing of tokens is administered by the Otago University and Otago Polytechnic Students Associations. Once an applicant has registered, they print off the 'priority parking' email, fill in the details and take it to either the OUSA or OPSA. The OUSA/OPSA should check the identification and proof of address then issue a token. They then enter the token number in the rideshare database against the applicants name and add the token number onto the confirmation email, which is then sent to the DCC to record the information for statistical purposes.

Effectiveness: Reasonable

Strengths:

- Convenient locations for picking up tokens.
- Less cost to DCC as do not have to administer the issuing of tokens.

Weaknesses:

- As the DCC rely on the OUSA and OPSA to issue the tokens, the Council has no control over checking that people have followed the rules e.g. to make sure that people have not registered twice, are not registering their child, etc. In the past both associations have been lenient when issuing tokens, however we are encouraging stricter enforcement of these rules.
- Information on the 'confirmation email' is not always filled in, often information like staff/student, phone number, is missing.
- Token number is not always entered into the database at the time of issuing so often there is doubling up of token numbers.

Improvements: (see discussion document Section 1 & 2 for further information)

- Stricter enforcement of the rules and always check for double ups
- Investigate the possibility of the issuing of tokens be taken over by DCC – CSA so that we have more control and confidence that rules are properly enforced.
- Newer software may make it harder for people to register twice.

4.1.3 Matching system

The Rideshare scheme can work in two ways. For those who don't already have their own carpool set up, a matching system is available on the website which will help applicants to find potential rideshare matches. The applicant needs to register online, fill in their details and select the following option "I wish to receive emails containing potential Rideshare matches". The website then forwards the applicant any matches that have similar criteria. It is up to the applicant to contact the potential matches and arrange the rideshare.

There is no requirement for applicants to be staff or students of the University or Polytechnic, although the website states that the scheme is only open to these people. This is not technically a rule, and every year there are a small number of people who work at other businesses in the area who also register. Enforcement of the statement has never been carried out and as the number is so small, it has not been considered an issue. Also, as the idea was to one day expand rideshare to be a city wide scheme the fact that others were using it was not a major concern.

Effectiveness:

Strengths:

- Minimal requirements to qualify for the scheme, so it is easy for anyone to participate in.

Weaknesses:

- A high number of participants live just outside the exclusion zone. The distance from a central campus point to the edge of the zone varies from less than 1km to no more than 1.8km which is less than the standard short trip distance of 2km.

Improvements: (see discussion document Section 3 for further information)

- Extend the exclusion zone to a 2km radius which fits in line with the standard rule of anything less than 2km is a short trip and can be done by walking or cycling.

4.1.5 Advertising the scheme

The scheme is advertised in the University and Polytech handbooks each year and advertisements are published twice a year in each of the student magazines the Critic (OUSA) and the Gyro (OPSA).

As the scheme is already very popular more advertising is not thought to be required at this stage.

Effectiveness:

- Good, the number of people who register each year demonstrates the advertising is very effective. See the graphs in the following section.

4.1.6 Number of people registered each year

Figure 1 shows the number of people who have registered each year from 2001 through to 2009. Each year has then been split into association to get an indication of the ratio between OUSA and OPSA. As expected, given the respective sizes of the institutions concerned, the majority (75-80%) of registrants are University staff or students.

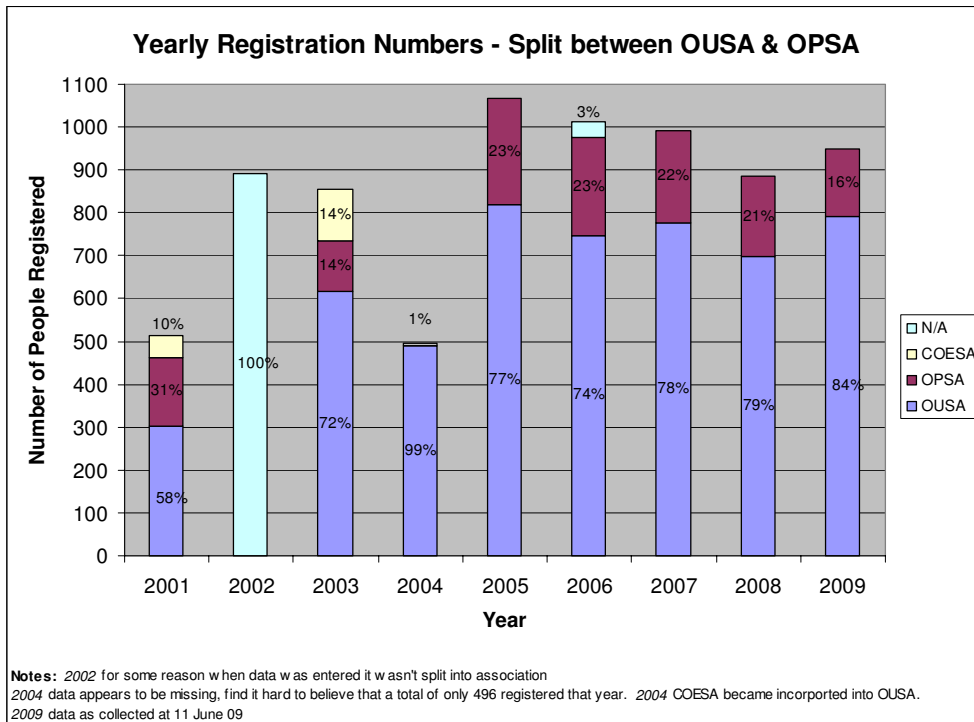


Figure 1

Figure 2 shows over the years the split between staff and students for each association. Approximately 25% of OUSA participants are staff, while 10-20% of OPSA participants are staff.

Note: The recording of staff/student ratio was only begun in 2006.

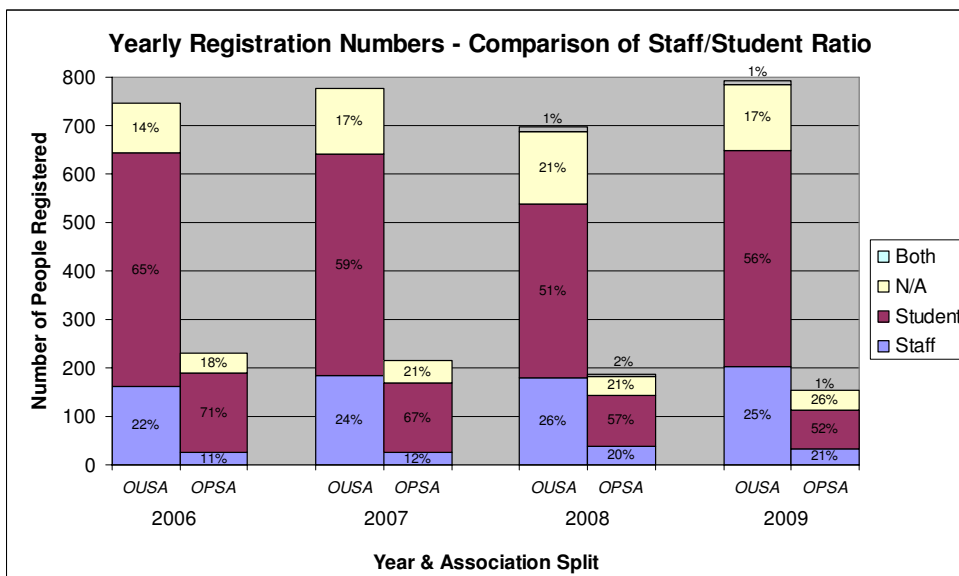


Figure 2

Since the inception of the scheme, yearly registration numbers are consistently high, ranging from approximately 850 – 1050 participants over the past 5 years. Although this is positive, the number of participants significantly outweighs the number of spaces (149 in 2009). This means demand is not being met by the existing provision of spaces.

A reasonably high number of staff use the scheme. It could be argued that staff parking is the responsibility of the employer, and that it is the University and Polytechnic that should be providing rideshare spaces for staff from their on-site parking spaces, which are significant in number. This would mean the scheme could be used more by students and other businesses who do not have on-site parking spaces. Staff usage ties up parks for the majority of the day creating less turn over. However, if it encourages staff to share rides then this helps to achieve the objectives, although possibly if there were no rideshare scheme staff might investigate other modes, such as passenger transport, walking and cycling, which would have even greater impact on the objectives of the scheme.

Every year a problem arises when University exam supervisors are told by the University to register for the scheme so that they can use rideshare parking spaces. They are not told they need to rideshare, and also, they are given the impression that parking spaces will be held for them and they are guaranteed a space. This is obviously not the case. It is not the Council's responsibility to provide parking for exam supervisors; this is the responsibility of the University.

Effectiveness:

Strengths:

- The popularity of the scheme should mean at least 149 carpools are set up each year, and likely many more.

Weaknesses:

- Demand exceeds by far the number of parking spaces available each year. If more parking spaces were available perhaps even more carpools would be set up each year. See Table 1 below for details on numbers of parking spaces.
- Currently we do not limit the number of people who can register for the scheme. As there is no forward programme to increase the number of parks each year, the likelihood of finding available parks decreases each year that the registration numbers increase.
- There is no philosophy around equitability of the scheme, whether this should be open to all, just students, or students and staff.

Improvements: (see discussion document Section 1 for further information)

- Increase the number of priority parks available.
- Investigate whether to limit the number of people who can register
- Investigate options around making the scheme equitable, and clarity as to who the scheme is for. If it is open to all then this should be made very clear.

4.1.7 Location and number of spaces

Rideshare priority parks are provided in various prime locations around the campus area. Table 1 below outlines the locations and lists how many parks have been available over the years.

Park Location	Number of Parks				
	2001	2003	2007	2008	2009
Cumberland St: St David St to Dundas	9	9	23	23	28
Cumberland St: St David to Union St	-	-	5	36	28
Albany Street: Leith to Hyde St	11	15	15	4	4
Clyde Street: Trent Ave to St David	6	31	41	41	40
Leith Street Central	8	8	6	6	6
Forth Street: Union to St David	10	10	10	10	10
Regio Street	6	6	6	6	6
Union Street: Harbour Tce to Anzac Ave	7	11	19	19	19
Harbour Terrace: Union St East to Dundas	9	8	8	8	8

TOTAL	66	94	133	153	149
<i>Difference</i>	-	28	39	20	-4
NOTES:					
2007 - metered parking in Albany St & other streets introduced in the area. 11 parks lost in Albany St, 36 parks gained in Cumberland St between St David & Dundas.					
2009 - loss of several parks in Cumberland St due to a long term construction zone being installed sometime in 2008 (these will be reinstated sometime in 2010) and bus stops being installed.					

Table 1

Effectiveness:

Strengths:

- Parks are located in prime parking areas which may contribute to the popularity of the scheme.
- Having priority parks located at various sites around the Campus area gives participants the opportunity to find a park reasonably close to where they want to go.
- The number of parks available have generally increased over the years.

Weaknesses:

- Parks are located in prime locations which may contribute to the level of abuse of the scheme, and also means that the Council are subsidising parking for the ridesharers, as the spaces are within the normally paid parking area.
- Having priority parks located at various sites around the Campus makes them harder to enforce, as parking officers have to circulate around the sites. People looking to abuse the scheme can then drive around waiting for the parking officer to move on and then park with only one person in the car.
- There are not enough parks to meet demand.
- The number of parks vary each year due to parking changes that take place in the area – parks were reduced by 4 from 08-09.

Improvements: (see discussion document Section 1 & 5 for further information)

- Increase the number of priority parks available.
- Ensure that when parking changes are made around the Campus area the number of Rideshare priority parks never decreases.
- Investigate ways to make enforcement easier.
- Investigate relocating parks to a single location, or to less popular parking locations – e.g. on the fringes of the campus area.

4.1.8 Ease of use

The Rideshare scheme is simple and easy to use. As long as the applicant enters in their details correctly, registration and gaining a token is simple. As for the actual ridesharing, as long as the rules are being met i.e. display at least two valid tokens on the dashboard of the vehicle and have all token holders in the vehicle at the time of parking there should be no issues.

Effectiveness: Good.

4.1.9 Cost of tokens/parks

Tokens are issued free of charge to Rideshare users and the priority parks are free, all day parks.

Effectiveness

Strengths:

- Having a free scheme contributes to the popularity.

Weaknesses:

- Due to the scheme being free people are more likely to abuse the scheme, we are aware this happens on a regular basis.
- A large number of people register each year – demand exceeds supply. There are also a number of people who register for the scheme, gain a token but for various reasons don't use it (14% according to 2007 rideshare survey).
- Costs are not recovered for running the scheme (see later section about costs).

Improvements: (see discussion document Section 4 for further details)

- Investigate whether there should be some form of payment for the use of the scheme e.g. yearly cost to join and/or pay discounted rate for parking.

4.1.10 Policing of the scheme

The introduction of Rideshare running all year round, 7am-6pm, coincided with changes to the hours Parking Enforcement Officers work. This change enabled Officers to be out enforcing the parks at the time the parks started filling up (generally from 7.30am), rather than going out when the parks were already almost full (generally from 8.30am).

Rideshare parks are policed regularly on a daily basis between the hours of 7am and 4pm. Enforcement includes making sure all token holders are in the vehicle at the time of parking, and ensuring that the minimum number of tokens is displayed.

For the period 01 July 2007 to 30 June 2008, 837 infringement notices were issued. For the period 01 July 2008 to date (being 25 May 2009), 920 infringement notices had been issued, of these less than half were actually enforced i.e paid. Guidance is given to CSA by Parking Services on when to enforce payment of a ticket.

Effectiveness

Strengths:

- Since the changes in 2008 came into place, parking officers have been able to enforce the parks at the times when most of the abuse is occurring resulting in more infringement notices being issued.
- Anecdotal evidence from reports from parking officers shows that even just the presence of parking officers is enough to discourage people from abusing the scheme.
- Now that the parking officers are out and about enforcing at the time when parks are filling we can ask them to do a 'blitz' on certain areas if we get complaints about specific locations and times, etc.

Weaknesses:

- In 2009 less than half of the infringement notices issued were paid as people can write to CSA with an explanation as to why they should not have to pay the ticket. Less than 50% enforcement is inexplicably high.
- The scheme has a number of rules in place should a person be found to be abusing the scheme. Unfortunately, there is no way for the Council to enforce these statements. If a person is caught abusing the scheme, the Terms and Conditions state that we have the right to confiscate their token. However, actually trying to track down this person and take away their token is almost impossible. Apart from sending them an email requesting that they hand the token in, or perhaps calling them (if a phone number has been given; this information is not always filled in) there is no other way to confiscate the token. We do not record licence plate numbers, or any other information that may be used to track the person down. Even if we were to confiscate the token, they could then apply for another token using a different name/email address.
- Anecdotal evidence from reports from parking warden shows us that people are willing to drive round and round if wardens are their enforcing a parking bay, waiting for them to go away which is increasing the original trip length and increases pollution.

Improvements: (see discussion document Section 5 for further information)

- Investigate the guidelines for ticket enforcement, and redraft if possible. Less than 50% enforcement is too high.
- Investigate ways to improve the enforcement of the Terms and Conditions i.e. confiscating tokens if user abuses the system.

4.1.11 Complaints

Each year we get numerous complaints from users regarding other users who are abusing the scheme. Mostly the complaints are to do with an individual parking in a Rideshare space. Although the number of complaints have not been recorded over the years, the general feel is that they are consistent in number and nature each year. In 2008 when the changes came into place regarding the enforcement times, and enforcement began the number of complaints fell, however the Council still get a number of complaints coming through.

Occasionally the Council get complaints about the website and how it is difficult to use, people are not getting matches, or they are getting matches but do not want them. In most cases the fault is not with the website, but with the information the person registering has provided (or not provided).

Another complaint that comes up often is regarding the rule 'having all token holders in the car at the time of parking'. Some people say this is inconvenient as they wish to drop their rideshare partner/s off outside the place they need to go, and then the drivers finds a park close to where they need to go. Some people feel this is inconvenient to them especially in bad weather, however, this rule is required as this is the only sure way that we can know that people have actually rideshared.

Effectiveness

Improvements:

- More enforcement especially in the early morning to catch those people with only one person in the car.
- Updated software may help with complaints regarding the website, however will not help with the human error issue.
- Until we come up with a better system, the rule having all token holders in the vehicle at the time of parking needs to be in place as this is the only way that we know for certain that people have actually rideshared.

4.2 Effectiveness in meeting objectives:

The objectives of the scheme are:

1. To provide improved commuting options for users;
2. To reduce the number of single-occupant cars on the roads and therefore traffic volumes, with knock-on effects of improving local air quality, reducing greenhouse gas emissions, reducing noise levels, improving amenity and safety;
3. To provide priority parking as an incentive to rideshare;
4. To reduce parking pressure in the Campus area.
5. To provide a journey matching service for participants wanting to share long distance journeys.

The above objectives are being met to differing degrees. Evidence of this has been measured through various methods.

From the survey undertaken in 2007, 85.7% (348 people) surveyed said they use the scheme. It is known that each year there is a small percentage of people who register for the scheme but for some reason never go on to gain a token. The 2007 survey found that of the 31% (406 people) that responded to the survey 7% said they never bothered to get a token for various reasons.

The University undertook a survey of staff for inclusion in this evaluation report to see whether the scheme is meeting people's needs. The results showed that:

1. On the whole people love the idea of the Rideshare concept
2. They think it is great so long as they are early enough to get a park - there seems to be a lack of available rideshare parks after 8.10 am, and parking is awkward to find during the day.
3. They are grumpy at single-occupant cars arriving and posting 2 "tickets"
4. They would like to see this scheme operate Dunedin-wide – e.g. spaces in the CBD - near the hospital and close to the Business school;
5. It ties up public spaces in the holiday times.

4.2.1 Occupancy and Duration Surveys

An occupancy/duration survey was carried in July 2001 when the scheme was first introduced. As part of this evaluation it was decided to undertake another occupancy/duration survey for comparison. This survey was carried out in July 2009.

Occupancy

Figure 3 and 4 below show the average occupancy per time slot for both the survey years. When comparing the 2001 occupancy/duration survey and the 2009 occupancy/duration survey you will see that the average occupancy rate for all locations over both survey years is quite high. Although the average occupancy varies from bay to bay, occupancy for both surveys during the main part of the day ranges between 75% to 99%. This indicates that the scheme has remained popular since its inception and is almost at full capacity for the majority of the day.

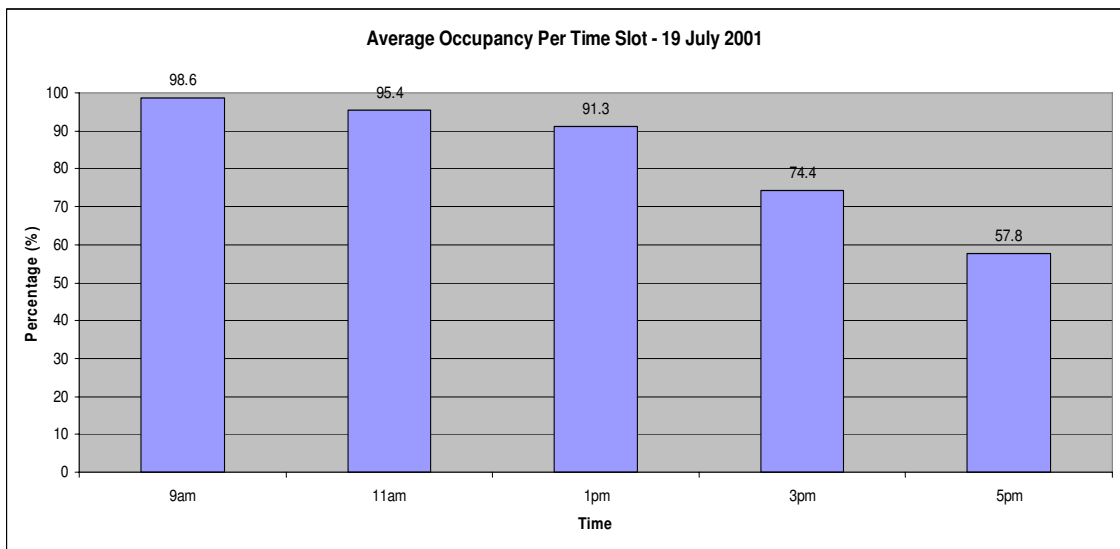


Figure 3

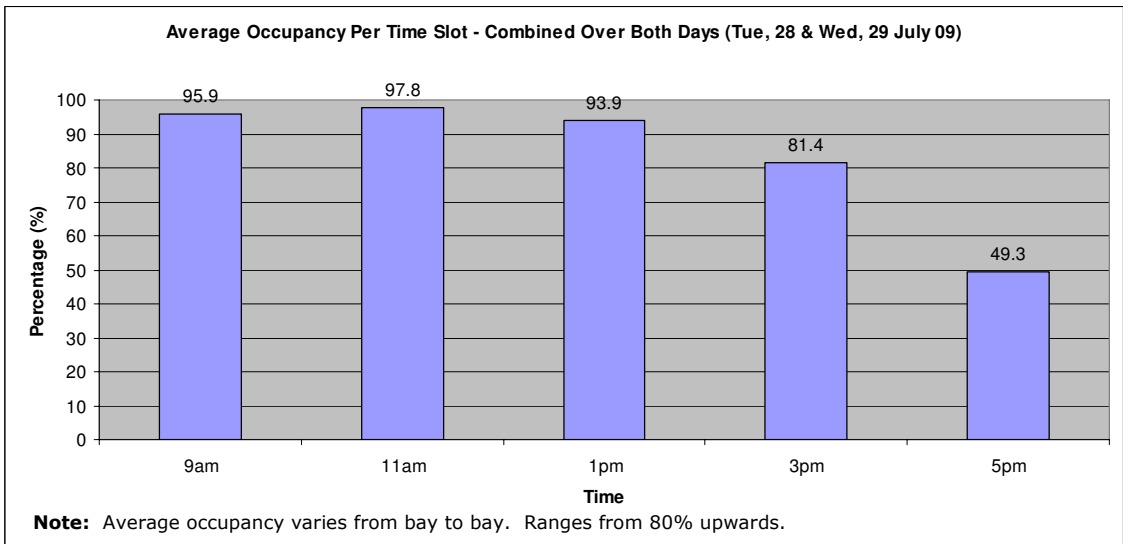


Figure 4

Effectiveness

Strengths:

- High occupancy for the majority of the day.

Weaknesses:

- Indicates that more parks are needed.

Improvements: (see discussion document Section 1 for further details)

- Add more parks.

Duration

Figure 5 and 6 below show the average length of stay for both survey years. When comparing the results for duration you can see that average length of stay has stayed about the same over the years. Approximately half of the users tend to stay for between 2 and 4 hours in a park. This indicates that turnover would be relatively high, however this could vary for each parking area.

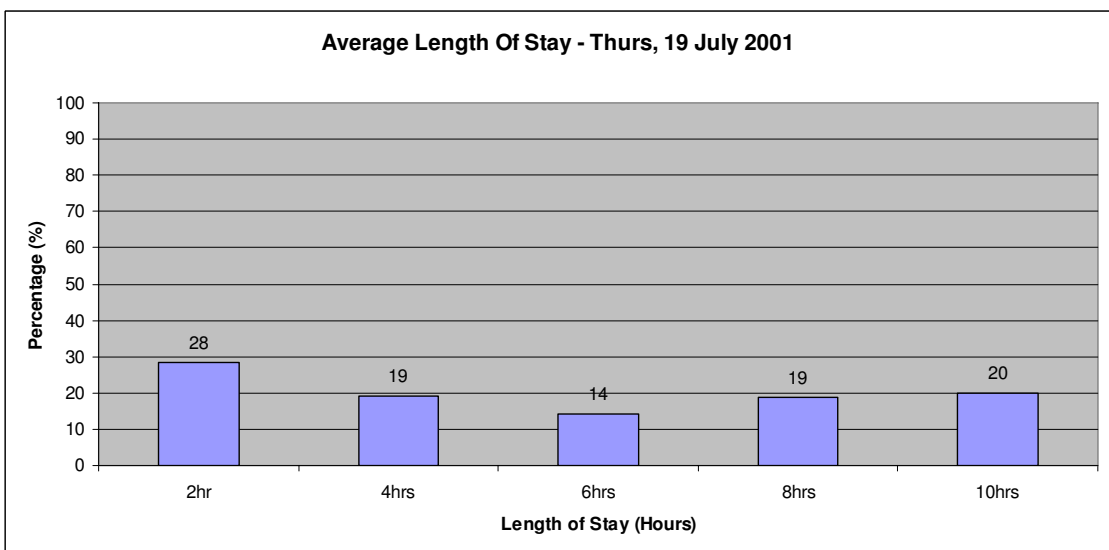


Figure 5

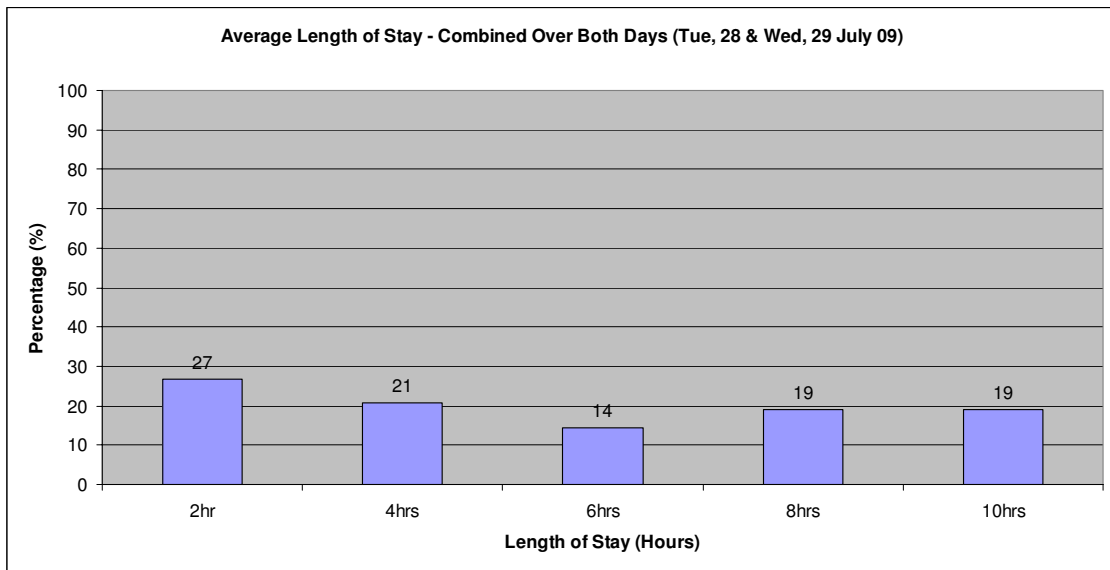


Figure 6

Note: Length of stay are estimated times as data was recorded only 2 hourly. Vehicles may have arrived before, or left after each of the survey times. For the purpose of calculations a vehicle that was recorded only in one time slot is assumed to have only stayed 2 hrs, a vehicle that stayed for 2 time slots = 4 hours, 3 time slots = 6hrs, 4 time slots = 8 hrs, and 5 time slots = 10hrs.

Effectiveness

Strengths:

- There is some level of turnover as about 50% vehicles park for 2-4 hours approx.

Weaknesses:

Improvements:

- Investigate the time of day the 2-4 hour time stays are happening and what locations. We get requests from time to time to introduce short term rideshare parks to create more turn over and availability. Bearing in mind we are unable to cater for everyone's needs, but this may be worth looking trialling.

4.2.2 Summary of Effectiveness in meeting the objectives

Overall the scheme is reasonably effective in offering priority parking to approximately 150 car drivers per day, representing an estimated 300-400 users. This equates to a reduction in cars of around 150-200 per day which is quite significant.

However, a number of problems have been highlighted regarding the effectiveness of the existing model that is used whereby OUSA/OPSA administer the scheme and other problems have been identified relating to abuse of the scheme, policing, shortage of spaces, and so on.

5 IS THE SCHEME EQUITABLE?

The scheme is currently not equitable. Although we do not exclude other businesses in the Campus area from using the scheme, the Scarfie Rideshare scheme is aimed and promoted to the staff and students of the Otago University and the Otago Polytechnic, rather than being open and promoted to all residents in Dunedin City.

The advertising methods are directed towards the University and the Polytechnic population using handbooks and student magazines and the priority parking locations are within the campus area.

The intention was always to open the scheme up to run citywide, however this has not happened for various reasons including the high levels of abuse that continues to be a problem. Although the scheme is not currently equitable, as we are offering free parking in prime locations to a specific user type it would be unwise to open the scheme up to run city wide and install more priority parking areas as abuse would still be an issue but on a much larger scale.

Effectiveness

Strengths:

Weaknesses:

- Not equitable.

Improvements: (see discussion document Section 6 for further information)

- Look into all the suggested improvements for the scheme, and once the issues have been addressed investigate the possibility of opening this up to be a city wide scheme.

6 EFFICIENCY

Annual Cost of Scheme to DCC

Transportation Operations

Advertising	\$6,000
Printing tokens	\$200
Staff time	\$3,000
Replace signs/poles	\$1,000
Total	\$10,200

Parking Enforcement - Enforcement	\$20,000-\$25,000
CSA - Processing Explanations	\$6,000

Annual Cost of Scheme to OUSA/OPSA

OUSA/OPSA – (staff time, envelopes etc)	\$1,000 - \$2,000
-----------------------------------------	-------------------

Total Cost **\$43,200**

Total Income from infringement notices **\$38,000**

Overall cost to DCC **\$5,200**

Revenue from Parking Infringement Notices

Unable to tell what the revenue is as the number of notices issued and the number that are actually enforced (ie paid) differ, as people have the right to write in with an explanation and explain why they should be let off the infringement notice. These are processed by CSA, if the explanation is accepted they are let off and do not have to pay. The cost of a rideshare parking infringement notice is \$40.

From 01 July 2007 to 30 June 2008 - 837 notices were issued.

From 01 July 2008 to 30 June 2009 - 1374 notices were issued.

Of the 1374 notices issued, only 957 (70%) were paid bringing in revenue of \$38,000. 194 explanations were received as to why the person should be not have to pay the ticket. Almost twice as many people write in about rideshare tickets than any others (12% versus

7%). Of the 194 explanations received, 73% tickets were waived (compared to an overall average of 54% being waived). 256 of the rideshare tickets were sent to court for collection (at a cost of \$30 per ticket to lodge). The recovery rate is about 50%.

Effectiveness

Strengths:

Weaknesses:

- No costs recovered for administration of the scheme.
- Low costs recovered for enforcement of the scheme due to large number of people getting let off their tickets.

Improvements: (see discussion document see Section 5 for further information)

- Investigate the possibility of introducing a charge for the Rideshare scheme – whether it be a charge to join the scheme or low cost parking.
- Investigate the criteria for letting people off parking tickets. Perhaps set some rules for Rideshare.
- CSA (contact Brendan Shea) are keen to see improvements of the scheme and would like to be involved especially if any changes are going to impact on his team.

Summary of Efficiency:

It is costing DCC/OUSA/OPSA \$40,000 to administer the scheme which works out as around \$100 per person using the scheme (estimating 400 regular users).

The 150-200 cars that do not make the trip into town is significant, however, these journeys may have been made by other modes such as PT, walking or cycling.

Conclude – it is probably not very good value for money. Suggest improvements eg people pay for tokens, more tickets are issued and enforced (not let off!).

Feedback from OUSA / OPSA

OPSA

- Gauging by usage the popularity of the scheme is high (e.g. increasing numbers of tokens issued and constantly full parking space during term). Certainly almost all of the applicants are grateful for the scheme when they front up for a token.
- Value - gauging by usage, yes (assuming the abuse to be low). It is the only real initiative to minimise car usage in the area, and, putting environmental issues aside, it is the only real initiative that helps with parking issues in the area, and therefore it is worthwhile.
- Abuse - little or none reported here.

OUSA

- Abuse - We note that abuse of the scheme is rising compared with previous years – things such as the same person registering with two different email addresses and coming in at two different times to redeem tokens, but that this rise is commensurate with the massive increase in numbers using the scheme (i.e. a perceived rather than an actual increase in abuses)

It is difficult to say if people arriving with one person in the car are deliberately abusing the scheme or just dropping somebody off down the road; as part of the conditions of their using the scheme they must arrive at the park with their second person, but many people are impatient with that.

We rarely get told of perceived scheme abuse. Sometimes we receive complaints from users who have received tickets even though they feel their tokens are clearly displayed.

Short term employees of the University who they send to us for parking tokens are a continual annoyance; particularly when there is an expectation on the part of the employee that there is then some sort of park held for them.

- When people contact the DCC to ask questions about the Rideshare scheme, they are often told that it is run by OUSA and not by the DCC. The people then think we are giving them the run around.
- We do suggest there be a limit on the number of tokens issued, and that this be publicised on the website. This would also give us some certainty in giving them out; we are able to tell people there is a line drawn, and this is it. Either that, or up to 200 more parks should be made available and many more tokens printed.
- More parks – as the last of the free parks slowly get absorbed into paid parking.
- People use it as a parking scheme, as that is what all publicity is around, rather than a car pooling scheme. Maybe it should gradually be changed to the car pooling format, if the aim is for people to rely less on individual cars. Promotions could be hooked on this aspect.

Conclusion

Although the Scarfie Rideshare Scheme has its flaws, the idea and the objectives of the scheme are still very relevant to today's environment. There are many new rideshare or carpooling schemes out there, which may be more effective and be less easy to abuse. These schemes should be investigated to see if there are any that could be modified to fit the Dunedin City environment.

A separate discussion document has been prepared which outlines issues brought up from this evaluation. Each section has gone into further detail as to why a change needs to occur, weighing up the pros and cons, what possible options are available and whether investigation is required.