



The Greater Manchester Cycling Campaign

Cycles on Trams Working Group - Report

Greater Manchester Cycling campaign
c/o 304 Barton Road
Stretford
Manchester
M32 9RF

16th May 2010

Dear GMITA Cycles on Trams Working Group members

Please find below our groups written statement in support of cycle carriage, following the invitation from Sir Howard Bernstein requesting a statement and supporting evidence for consideration by the Working Group.

We would also be more than willing to accept any invitation to attend any meeting of the working group if necessary.

Yours sincerely

Steve Bowater
Transport Facilitator
[Greater Manchester Cycling Campaign](http://www.gmcc.org.uk)

The carriage of cycles on trams appears to raise a considerable number of concerns amongst transport operators, particularly in the UK where the carriage of bicycles is consistently frowned upon, with numerous claims about the problems posed by cycle carriage.

However, as we hope to show below, this appears to be a uniquely British view of cycle carriage.

Many claims about the dangers of cycle carriage appear to be based on unsubstantiated claims rather than fact, and indeed, the considerable number of systems around the world that allow cycle carriage appears to show that cycle carriage is not something to be feared, but rather embraced as part of a modern integrated transport system.

SAFETY

“It should be noted that from the information obtained from systems where cycles are permitted on trams, none have reported any safety issues or referred to any claims resulting from bicycle carriage”

- GMPTE Report into cycle carriage on Metrolink (Mott MacDonald 2009)

In 2009 the GMPTE commissioned a report to look into the implications of cycle carriage on Metrolink, and after extensive examination of numerous systems they were unable to find any reports of any safety issues or claims resulting from cycle carriage on trams.

Additionally, the GMPTE claimed that the majority of light rail systems in Europe do not permit cycles to be carried.

As shown in appendix A, we have reviewed 99 European Light Rail systems of the same “Standard Gauge” as Metrolink and found that :

- a) **the majority (62 out of 99 LRT systems) “allow” cycle carriage on their systems.**
- b) only 8 out of 99 LRT systems specifically ban cycle carriage.
- c) for the remaining 29 systems we were unable to find any details on their website.

Clearly, if cycle carriage was a danger to other passengers then no operator would allow a bicycle anywhere near a tram, but the reality is that cycle carriage is common place on the majority (over 60%) of standard gauge systems in Europe, with even the GMPTE being unable to find any evidence of any safety issues after extensive research.

INTERACTION WITH WHEELCHAIR USERS / FOOT PASSENGERS

Having reviewed 62 European LRT systems that allow cycle carriage, the common policy is that passengers in wheelchairs, along with prams, have priority over cyclists.

The policy appears to work on all systems, and we have no reason to believe that Manchester cyclists will behave any differently to European passengers / cyclists.

Further evidence that cyclists can successfully integrate with passengers even at busy periods is provided by the DfT’s Traffic Advisory Leaflet 4/04 – *Bike and Rail, A Good Practice Guide*.

Following a case study of trials on unrestricted cycle carriage on all Mersey Rail services the DfT concluded: *“Unrestricted carriage of bikes on trains was introduced for a trial period in May 1998 as a result of demand from local cyclists, and as no problems were encountered, has since become permanent. Although it might be expected that permitting cycle carriage at peak times would cause conflicts, experience on Merseyside has shown that demands on space are largely self-regulating with cyclists avoiding taking their bikes on trains during the busiest periods”*.

THE VIEWS OF DISABILITY GROUPS / CURRENT PASSENGERS

Following the GMPTA's decision in 2002 to allow cycle carriage on Metrolink, the views of both disabled users and current / potential passengers were sought in a further survey. The results of the survey were included in a 2003 GMPTE report "*Metrolink Phase 3 – Cycles On Trams - Report On Further Consultation*".

Question One asked: "Did people think bicycles should be allowed on trams?"

Respondents endorsed the decision of the GMPTA, with 69% (381 out of 552) thinking that bicycles should be allowed on trams. This broke down into:

- 69.2% (72 out of 104) of disabled respondents thinking that cycles should be transported, and
- 61.5% (219 out of 356) of on-stop/on-street respondents agreeing
- 97.8% (90 out of 92) of cyclists thinking that cycles should be transported

When asked if they would take a bicycle on the tram, 46% (254 out of 552) of respondents said they would. This broke down into:

- 39.4% (41 out of 104) of disabled people
- 39% (93 out of 238) of potential tram users and
- 28% (34 out of 118) of existing tram users.
- 93.5% (86 out of 92) of cyclists

The use of specially adapted bicycles (such as hand-cycles) greatly increases the ability for disabled users to travel further distances and access new locations than by a standard wheelchair. The same is also true for foot passengers.

Although the perceived conflict between cyclists and disabled / foot passengers is frequently highlighted as a reason for banning cycle carriage, it is clear that both disabled users and foot passengers both see cycle carriage as a great opportunity to increase their accessibility.

SIMILARITIES TO OTHER SYSTEMS

Concern was raised by the GMPTE that despite there being numerous LRT systems around the world, no system had the same type of network as Manchester, and that cycle carriage would be difficult to monitor without a conductor.

However, one system in particular is remarkably similar to Manchester.

	Manchester	Cologne (Köln)
Tram Type	Bombardier "Flexity Swift"	Bombardier "Flexity Swift"
Model	T68, M5000	K4000 / K4500 / K5000
70% Low floor	n/a	K4000 / K4500 (193 trams)
100% High floor	T68, M5000 (80 trams)	K5000 (74 trams)
Daily ridership	55,000	507,000
Conductor on board	No	No
Driver regulated	Yes	Yes
Shared with traffic	Yes	Yes (12% of network)
Uses converted rail lines	Yes	Yes
Cycle carriage allowed	No	Yes

Cologne is a far more complex and larger system than Manchester, with 11 lines and carrying nearly ten times the number of daily passengers, yet like Manchester, Cologne utilises virtually identical Flexity Swift trams to Manchester, switching between rail lines with high platforms (linking Bonn) as well as travelling through the city centre, with passenger use both being regulated via the driver.

LOSS OF CAPACITY

Fears over loss of capacity due to bicycles displacing foot passengers are generally unfounded, and it is to be expected passenger levels could increase.

Firstly, cycle access will be off-peak, when trams are running under capacity, with adequate unoccupied space. This was confirmed by the 2009 Mott MacDonald report for the GMPTE *"The Implications of the Carriage of Bicycles on Trams"* which looked at the space required for cycle carriage, but concluded that "the affect of bicycle carriage on capacity is largely academic as it is not suggested that it would be permitted when trams are heavily loaded".

Also, as was shown above in Traffic Advisory Leaflet 4/04, where there are occasionally busy off-peak periods (e.g. during football matches), cyclists will know when the trams will be full and the system will self-regulate itself.

There is also some evidence that passenger use and revenues will increase, with the increased potential for cyclists to use the tram system to access the countryside / leisure routes away from the city centre.

An example of this is on the Sheffield SuperTram (also operated by Stagecoach), where they have previously run a monthly "cycle special" tram service for cyclists to access the countryside.

Another example of the potential increases in passengers (and therefore revenue) was shown in the previously mentioned 2003 GMPTE report *"Metrolink Phase 3 – Cycles On Trams - Report On Further Consultation"*.

For this report a survey was undertaken of the views of cyclists, disabled users and current / potential Metrolink users.

When asked if they would take a bicycle on the tram, 46% (254 out of 552) of respondents said they would. This broke down into:

- 93.5% (86 out of 92) of cyclists
- 39.4% (41 out of 104) of disabled people
- 39% (93 out of 238) of potential tram users and
- 28% (34 out of 118) of existing tram users.

Leisure journeys by cycle and tram scored highly, with:

- 25.6% (65 out of 254) saying they would make such a journey more than three times a week, and
- 54.7% (139 out of 254) less than three days a week.

Regarding shopping trips:

- 11.4% (29 out of 254) of respondents would use cycle and tram for shopping trips more than three days a week
- 19.3% (49 out of 254) stating they would do so less than three times a week.

Given that cycle carriage will only be permitted off-peak when there is spare capacity along with the results of the GMPTE's survey showing the potential to increase shopping and leisure trips by bicycle, it is highly feasible that rather than restrict capacity, cycle carriage would increase passenger numbers.

THE CHANGING U.K. SITUATION

Although the UK has generally been hostile to cycle carriage, the situation is gradually changing, with Edinburgh due to start trials of cycle carriage shortly after the network is fully operational in 2012/13.

Additionally, SYPTe are currently surveying User Groups about their attitude to bicycles on Sheffield's trams which are also operated by Stagecoach.

(Stagecoach has already successfully run some "Cycle Special" services on Sundays).

OPERATIONAL ISSUES / TAKING CYCLE CARRIAGE FORWARD

There are clearly operational issues that need to be addressed before cycle carriage on Metrolink can commence, yet none of these issues are unique to Manchester.

One particular issue is that of dwell times, and the likelihood of increased journey times as cyclists board.

Research undertaken by Nottingham University (*Bike Access on Light Rapid Transit – Feb 2003*) of cyclists boarding and lighting trams in both Europe and North America indicated that the physical act of boarding and alighting a tram with a bicycle can be undertaken without causing significant additional delays.

Features that can assist in keeping dwell times to a minimum are items such as :

The inclusion of bicycle symbol logos on platforms and tram doors would indicate the correct boarding point for cyclists.

Simple ways of securing cycles within carriages, such as those proposed for Edinburgh's LRT system, and currently in use within some heavy rail systems.

Ensuring cyclists are aware of the conditions of carriage (eg by use of a permit system – discussed below).

However, every European city that allows cycle carriage will have had the same concerns and issues to address, including the Cologne system mentioned earlier, which appears to be a far more complex system, with more passenger numbers, and with a higher level of cycle use.

The fact that at least 60% of standard gauge LRT systems in Europe allow cycle carriage shows that any operational issues can safely and practically be overcome, and as mentioned above, although often overlooked as an issue, many of these cities – particularly in Northern Europe – have significantly higher levels of cycling than Manchester, and therefore more demand from cyclists on the system.

Encouragingly for Manchester, the new Bombardier M5000 trams have been designed with the capability to carry bicycles, and the proposed full internal refurbishment of the original T68/T68a trams would provide an opportunity to enable the whole Metrolink system to provide cycle carriage.

Many concerns have been raised against cycle carriage, yet time and again these appear to be based on perceptions rather than facts, and given that cycle carriage is normal in the vast majority of European cities, we believe that the time is now right to start trials of cycle carriage on Manchester's Metrolink.

Therefore, in order to take this issue further, we would like to propose the following to ensure that cycle carriage is integrated in a controlled and safe way :

1. Sunday only trials commence, involving "authorised cyclists", Metrolink staff, GMPTC officers, disability groups along with the HMRI (ORR) in order to get initial impressions of how cycle carriage could work.
Trials could initially and quickly commence on the new M5000 trams that are capable of carrying bikes.
2. Controlled trials can then be extended to Saturday, followed by Monday-Friday "off-peak" periods prior to allowing public access.
3. Once the older T68 trams have been internally refurbished, full public cycle carriage can be phased in – Sunday only – for an initial 6 month period to assess operational issues.
4. Following the 6 month period cycle carriage is allowed on all off-peak services.
5. In addition, a "permit system" is setup, requiring cyclists to complete a series of questions based on the conditions of carriage, to ensure that cyclists are fully aware of the rules. (This system worked well in the USA).
Cycle access will only be permitted to passengers with a permit – failure to possess a permit punishable by a fine.
6. A nominal charge for the permit could be raised to cover administration costs, and potentially to include 3rd party insurance cover (removing any financial responsibility for damage from the operator).

APPENDIX A:

List of 99 Light rail systems in 19 European countries with a standard 1435mm gauge (same as Metrolink) showing whether cycle carriage is allowed or not, as indicated on the operators website / terms of condition.

Austria (AT)	Graz	Tram	Not allowed
Austria (AT)	Wien (Vienna)	Tram	Allowed
Belgium (BE)	Brussel/Bruxelles	Tram / Metro	Allowed
Bosnia And Herzegovina (BA)	Sarajevo	Tram	No details shown
Bulgaria (BG)	Sofia	Tram	No details shown
Czech Republic (CZ)	Brno	Tram	Allowed
Czech Republic (CZ)	Most	Tram	Allowed
Czech Republic (CZ)	Olomouc	Tram	No details shown
Czech Republic (CZ)	Ostrava	Tram	Allowed
Czech Republic (CZ)	Plzen	Tram	No details shown
Czech Republic (CZ)	Praha (Prague)	Tram	Allowed
Denmark (DK)	København	Light Metro	Allowed
France (FR)	Aulnay-Bondy	Light Rail	No details shown
France (FR)	Bordeaux	Tram	No details shown
France (FR)	Grenoble	Tram	Allowed
France (FR)	Le Mans	Tram	No details shown
France (FR)	Lyon	Tram	Line C only
France (FR)	Marseille	Tram	No details shown
France (FR)	Montpellier	Tram	Allowed
France (FR)	Mulhouse	Tram	Allowed
France (FR)	Nantes	Tram	Allowed
France (FR)	Nice	Tram	Not allowed
France (FR)	Orléans	Tram	Allowed
France (FR)	Paris	Tram Train	Not allowed
France (FR)	Rouen	Tram	Allowed
France (FR)	Strasbourg	Tram	Allowed
France (FR)	Valenciennes	Tram	Allowed
Germany (DE)	Berlin	Tram	Allowed
Germany (DE)	Bochum-Gelsenkirchen	Light Rail	Allowed
Germany (DE)	Bonn	Tram / Light Rail	Allowed
Germany (DE)	Bremen	Tram	Allowed
Germany (DE)	Chemnitz	Tram	Allowed
Germany (DE)	Dessau	Tram	Allowed
Germany (DE)	Dortmund	Tram / Light Rail	Allowed
Germany (DE)	Duisburg	Tram / Light Rail	Allowed
Germany (DE)	Erfurt	Tram	Allowed
Germany (DE)	Essen	Light Rail	Allowed
Germany (DE)	Frankfurt/Main	Tram / Light Rail	Allowed
Germany (DE)	Hamburg	Metro	Allowed
Germany (DE)	Hannover	Tram / Light Rail	Allowed
Germany (DE)	Heilbronn	Tram Train	Allowed
Germany (DE)	Karlsruhe	Tram	Allowed
Germany (DE)	Kassel	Tram	Allowed
Germany (DE)	Köln (Cologne)	Tram	Allowed
Germany (DE)	Magdeburg	Tram	Allowed
Germany (DE)	Mülheim/Ruhr	Light Rail	No information
Germany (DE)	München (Munich)	Tram	Allowed

Germany (DE)	Nürnberg	Tram	Allowed
Germany (DE)	Nürnberg	Metro	Allowed
Germany (DE)	Potsdam	Tram	No information
Germany (DE)	Rostock	Tram	Allowed
Germany (DE)	Saarbrücken	Tram Train	No details shown
Germany (DE)	Schwerin	Tram	Allowed
Germany (DE)	Strausberg	Tram	Allowed
Germany (DE)	Stuttgart	Light Rail	Allowed
Germany (DE)	Woltersdorf	Tram	No details shown
Greece (GR)	Athina (Athens)	Tram	Allowed
Hungary (HU)	Budapest	Tram	Not allowed
Hungary (HU)	Debrecen	Tram	No details shown
Hungary (HU)	Miskolc	Tram	No details shown
Hungary (HU)	Szeged	Tram	No details shown
Ireland (IE)	Dublin	Tram	Not allowed
Italy (IT)	Bergamo	Tram	Allowed
Italy (IT)	Cagliari	Tram	No details shown
Italy (IT)	Catania	Metro	No details shown
Italy (IT)	Genova	Light Rail	Not allowed
Italy (IT)	Messina	Tram	No details shown
Italy (IT)	Milano	Tram	Allowed
Italy (IT)	Napoli	Tram	Allowed
Italy (IT)	Roma	Tram	Allowed
Italy (IT)	Sassari	Tram	No details shown
Italy (IT)	Torino	Tram	No details shown
Italy (IT)	Torino	Tram	No details shown
Netherlands (NL)	Amsterdam	Tram	Allowed
Netherlands (NL)	Den Haag	Tram	Allowed
Netherlands (NL)	Houten	Light Rail	No details shown
Netherlands (NL)	Rotterdam	Metro	Allowed
Netherlands (NL)	Rotterdam-Den Haag	Light Rail	Allowed
Netherlands (NL)	Utrecht	Light Rail	Allowed
Norway (NO)	Oslo	Tram	No details shown
Portugal (PT)	Almada (Sul do Tejo)	Light Rail	Allowed
Portugal (PT)	Lisboa	Metro	Allowed
Portugal (PT)	Porto	Tram	Allowed
Slovakia (SK)	Kosice	Tram	No details shown
Spain (ES)	Barcelona	Light Rail	Allowed
Spain (ES)	Barcelona	Metro	Allowed
Spain (ES)	Madrid	Metro	Allowed
Spain (ES)	Murcia	Tram	Allowed
Spain (ES)	Palma	Metro	No details shown
Spain (ES)	Parla	Tram	No details shown
Spain (ES)	Santa Cruz Tenerife	Light Rail	Allowed
Spain (ES)	Sevilla	Light Metro	Allowed
Spain (ES)	Vélez-Málaga	Tram	No details shown
Sweden (SE)	Göteborg	Tram	No details shown
Sweden (SE)	Lidingö	Tram	As Stockholm
Sweden (SE)	Norrköping	Tram	No details shown
Sweden (SE)	Stockholm	Tram	Not allowed
Switzerland (CH)	Geneve-Bellegarde	Light Rail	Allowed
Switzerland (CH)	Lausanne	Tram	Allowed