



CITY OF RICHMOND

REPORT TO COUNCIL

TO: Richmond City Council
FROM: Councillor Malcolm Brodie, Chair
Planning Committee
RE: LANE POLICY

DATE: May 4th, 2000
FILE: 6360-00

The Planning Committee, at its meeting held on Tuesday, May 2nd, 2000, considered the attached report, and recommends as follows:

COMMITTEE RECOMMENDATION

That the Lane Policy (attached to the report dated February 16th, 2000, from the Manager, Land Use), be adopted, and that a copy of the proposed policy be forwarded to the Urban Development Institute for comments, prior to the submission of the policy to Council on June 12th, 2000.

Councillor Malcolm Brodie, Chair
Planning Committee

Attach.

VARIANCE

Please note that staff recommended that the Lane Policy be adopted.

STAFF REPORT

ORIGIN

Planning Committee reviewed the following report at their meeting of March 21st, 2000 at which time a number of questions were raised. This report is the same as that which was reviewed on March 21st with additional information inserted into the document. For easy reference, Attachment 6 consolidates the responses to questions raised at Planning Committee.

The purpose of this report is to propose a Lane Policy (Attachment 1) for the City of Richmond. This is an opportune time for Richmond to support the development of lanes because:

- Better traffic management was the second most requested improvement by residents in the 1997 OCP Survey. Traffic congestion along major roads continues to be an issue for Richmond residents and will only increase as the population of Richmond grows;
- TransLink has approved a number of Richmond's major arterial roads as part of the regional major road network, upon which it will be important to maintain regional traffic flow. A system of lanes behind the major roads will enhance traffic flow and road capacity (Attachment 2 shows the major road network approved by TransLink (GVTA) as of June 1999); and
- We are seeing a high proportion of development applications along major roads, partly due to the age of the housing stock along major roads (of all rezoning applications as of September 1999, 70% were along a major road). Some of these applications result in the provision of a lane behind a major arterial. However, a Lane Policy would ensure a more consistent and co-ordinated approach in terms of the City's requirements for lane development.

FINDINGS OF FACT

A number of lanes were built in Richmond when some of the earlier subdivisions were developed in the 1950's. While these lanes have a 6 m right-of-way, many of them are not built to current City standard as the paved surface is too narrow or there is no lighting and drainage. Since the development of these first lanes, relatively few lanes have been created. Even though there is general agreement that lanes are beneficial, the City of Richmond has not had a policy that specifically supports the creation of lanes.

Earlier initiatives to address the traffic flow and safety issues resulted in an Access Policy (Attachment 3) adopted by Council in 1989. The Access Policy restricts the creation of new access points along major and local arterial roads through the establishment of minimum lot sizes in areas where lane access is not provided. (Attachment 4 shows the major and local arterial roads). However, the Access Policy does not directly support the creation of lanes.

The new Official Community Plan (OCP) supports the creation of lanes. The transportation objective and policy with regard to lanes reads: "Manage traffic flow for efficient and convenient travel while enhancing neighbourhood livability by requiring lanes parallel to major roads rather than driveways which impede traffic flow and create safety hazards for motorists, cyclists and pedestrians". While the OCP supports the creation of lanes, no tools have been introduced yet to implement the policy.

The most direct action which the City of Richmond has taken with respect to lanes has been through development. In the recent past, where subdivision or rezoning has occurred along major roads, the City has generally required that the applicant either provide the land and/or construct and pay for a lane. However, there has not been a consistent or co-ordinated approach in terms of the City's requirements.



Typical Older Lane

The benefits of lane development include:

- increased safety through reducing conflicting traffic movements;
- improved accommodation of pedestrians, cyclists and transit;
- improved appearance of streets due to a continuous boulevard with street trees along the major roads and the relocation of garages to the rear of the property thereby increasing the front yard green space;
- enhanced traffic flow and road capacity due to the reduction of potential conflicts from cars entering or exiting from driveways to major roads; and
- increased pedestrian and cycling route options.



A New Lane

ANALYSIS

The following section addresses a number of questions with regard to lane development and forms the basis for the policy.

What is a lane?

The basic definition for a lane is that it provides access at the rear of abutting properties thereby eliminating the need for driveways onto the fronting street. A lane is not considered a “public road” as defined in the Zoning Bylaw because it does not have a minimum width of 9m (29.527 ft.); However, a lane is meant for public use. A lane is also different from a shared access driveway, that runs through the middle of a townhouse development, primarily because a lane is meant for public use whereas a shared driveway is meant for use by residents whose property access the driveway. The following chart shows additional differences between a shared driveway and a lane.

CHARACTERISTICS	SHARED ACCESS DRIVEWAY	LANE
Who owns it:	Strata Council	Province or City
Who is liable:	Strata Council	City
Who uses it:	Local residents or visitors	Public
Location:	Within site	Rear of property
Built to:	Building Code standards	Engineering standards
Maintained by:	Strata Council	City
Secured by:	Shared Access Agreement	Dedication/Public Rights of Passage

Can a lane be located mid-way through a site?

Typically, NO. A lane is typically located at the rear of a property for a number of reasons:

- if it is located midway through the site, the City then has control over the middle of the site and it has the effect of splitting an existing site in two separate properties;
- a lane along a major road will likely serve townhouse, two-family dwelling or small lot single family developments. The lane would normally be located at the rear, rather than in the middle, to serve types of developments such as single family that have less flexibility in siting building envelopes; and
- a lane at the rear of the property has the potential to serve the most number of properties should the lots fronting the interior street choose to use the lane.

Should a frontage road be used instead of a lane?

Generally, No. Frontage roads have been used in some areas of Richmond and are preferred by some because they create a larger separation between the home and the busy street and they provide an opportunity for more landscaping and green along the streets. However, they are being phased out and are less desirable than lanes because:

- they cause awkward turning movements between the local road and major road;
- a “sea” of pavement is created when the major road and the frontage road are located next to one another;
- from a pedestrian point of view it is not as appealing because the corridor jogs in for the block length and then must jog back out at the major intersection; and
- they are less attractive and interesting for passing vehicles, cyclists and pedestrians.

Where should the City target lane development?

The primary goal of lane development is to limit individual access points onto major roads. This is an issue where there are many single-family lots with individual access points. For example, a typical block face on an arterial road in west Richmond has 35 parcels/accesses whereas a typical block face on a residentially oriented arterial road in the City Centre has only 10 parcels/accesses.

Therefore, the proposed policy would support lane development along arterial roads in residential areas primarily in West Richmond where there are a number of individual land parcels that directly access major arterial roads. These areas are designated "Neighbourhood Residential" on the Generalized Land Use Map in Richmond's Official Community Plan.

Specifically, the policy would apply to those parcels outside of the City Centre designated Neighbourhood Residential which front:

- a major arterial road;
- a local arterial road that is also a Bike Route (Attachment 5 shows the Bike Network Roads in Richmond); and
- Francis Road between No.1 and No.4 Road.

Francis Road is included because:

- while it is not classified as a major arterial, it has recently been upgraded to four lanes;
- its length contributes to its use as a through road similar in function to other major arterial roads; and
- the types of land uses permitted along Francis Road will be similar to those permitted along other major arterials due to the common "Neighbourhood Residential" land use designation.

The map attached to the Lane Policy (Attachment 1) shows the areas that are designated Neighbourhood Residential and the roads along which the City would require lane development.

Would the lane policy apply in every situation?

NO. There are certain situations where the lane policy would not apply:

- where there is a lane already built to City standards;
- where the property is less than 30m in depth; or
- where there is, or the City approves, an alternative permanent access, such as a frontage road, shared access, or internal road.

Where an alternative to a lane, such as a shared access, may be considered, the main principles used by staff to determine non-lane access suitability are:

- there are to be no additional accesses created to the major arterial road;
- the proposed access will not impede the intended function of the arterial road; and
- the type of access is consistent with the current or anticipated form of development.

After all the exceptions are considered, only about half of all the frontages as shown in Attachment 1 will be required to provide land and pay for new lane construction.

How can the City support lane development?

Consistent with the City's approach to obtaining services through development, where the City approves Rezoning, Development Permit and Subdivision applications for residential properties along major roads, the City can require the applicants to dedicate land at the rear and/or side of the properties for a lane and/or a mid-block lane access and to pay for construction of the lane and/or mid-block lane access to City standards.

Does a Lane Policy mean the City would be encouraging redevelopment along all major roads to facilitate lane development?

NO. The Lane Policy isn't meant to signal that the City is encouraging redevelopment in order to facilitate the provision of lanes. The City would continue to examine each application in terms of meeting OCP objectives, Lot Size Policies and other factors. If, from a land use perspective, it makes sense for a property to redevelop, then a lane would be required subject to the Lane Policy.

Are there population growth implications with the Lane Policy?

An increase in population would be attributable to the OCP, not to the Lane Policy. The OCP does suggest that some redevelopment in the form of smaller lots, two-family dwellings and townhomes along major roads is expected. The 2021 population projection in the OCP accounted for 2,400 additional units along major roads for a total additional population of approximately 5500 people.

Who should pay for the lanes?

The City has not been consistent in requiring applicants to provide land and/or pay for the provision of lanes. A range of standards have been applied including:

- requiring the applicant to dedicate the land and/or construct and/or pay for the lane;
- requiring a Public Rights-of-Passage for the lane but no monetary contribution; or
- requiring nothing from the applicant to facilitate lane development.

The City needs to be clear about its requirements. At this point, the City is only frustrating applicants and obtaining variable provision for lanes. It is not likely that the City would have the funds to pay for lane acquisition and construction in the future due to scarce resources and competing capital works projects. In other development situations, if the City is clear about the need for a capital improvement, such as road widening, the applicant is required to pay. Therefore, it is recommended that the developer provide land and pay for the construction of a lane. In cases where the lane is not immediately constructed, the monies would be collected under the Neighbourhood Improvement Charge (NIC) Program.

What are the costs for building lanes?

The cost for providing a lane is \$600 a meter (including curb, gutter, pavement and lighting). While this cost is significant, the developer of a lot along an arterial road usually does not have to pay for the costs of other service upgrades because they have generally already been undertaken by the City. As a comparison, development along an internal road, that had not already been upgraded, would cost \$953 a meter (including curb, gutter, pavement, lighting, sidewalk, storm sewer, and tree planting). Therefore, even if the City requires the applicants to pay for lane construction, the overall cost for service upgrades are significantly less than if the same development were constructed on a road that had not already been upgraded.

Are some of the smaller forms of redevelopment able to finance the cost of the lane?

While it would seem that this is a reasonable question to ask, it is the kind of question that has the same response whether we are talking about site remediation or a DCC. The costs are factored into the pro-forma for a project. The cost of the lane construction is fixed but the costs for other factors, such as the price of the development site can vary. The development revenues can also vary as the selling price for units adjusts based on demand and supply. Building generally occurs when all these factors result in some positive financial benefit for the investor. Therefore, other factors adjust as another cost is added. Obviously, as there is evidence throughout Richmond, the additional cost for lanes has not impeded smaller forms of redevelopment with lane development.

How do lanes function – how should they be introduced into our existing road system?

The road system is classified by a hierarchy according to function. For example, the primary function of a lane in a residential area is to provide individual accesses for single-family residential lots. The primary function of a major road, on the other hand, is to move high volumes of traffic on an area or regional basis and therefore there is a need for access control.

In terms of safety and supporting traffic flow, cars should not travel directly from a lane to a major road or vice versa but rather enter a local or collector road first. In this way the change in speed is accomplished gradually and the number of potential points of conflict are reduced and focused. *Diagram 1* shows the preferred road hierarchy.

Diagram 1: Preferred Road Hierarchy

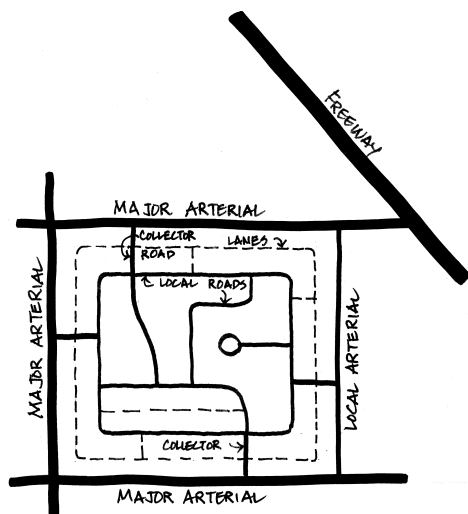
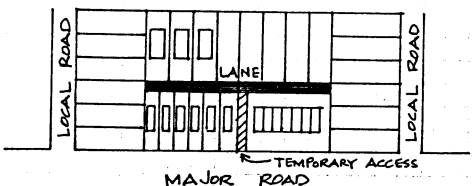
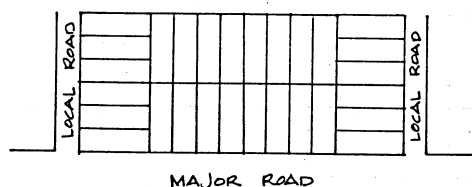
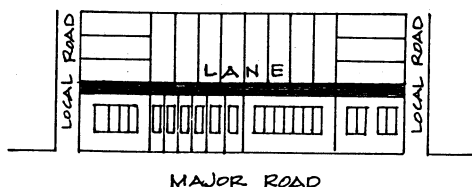


Diagram 2: Lane Development over Time



RE-DEVELOPMENT ALONG A
MAJOR ROAD WITH TEMPORARY
LANE ACCESS



LONG TERM RE-DEVELOPMENT
AND LANE ALIGNMENT

However, in older fully developed areas it is not always feasible for a lane to connect to a local road in the short term. At the end of the block it is possible in some cases to extend the lane to the local road but the property lines do not always line up or redevelopment of the properties at the end of the block may not occur for a considerable period of time. Additionally, it is difficult to obtain the land to provide mid-block lane access within the neighbourhood as redevelopment is unlikely on the local roads.

Therefore, every attempt should be made to ensure that the lane does not exit directly onto a major road. Where this is not feasible the following options may be possible:

- a full lane is provided with a permanent mid-block lane access with the new lots accessing their properties from the lane; or
- a full lane is provided with a temporary mid-block lane access with the new lots accessing their properties from the lane; or
- land is dedicated and monies are collected for the future construction of a lane with an interim, temporary single-width, shared access driveway provided for the use of the redeveloped lot(s).

Diagram 2 shows how the preferred lane alignment could be achieved over the long term. While it is not ideal for a lane to connect directly to the major road, the number of individual access points to the major road will be reduced. Both temporary and permanent accesses would be considered part of the lane system and would be required to be constructed to the minimum lane standards.

What happens with lanes at intersections?

In developing configurations for a new lane, care would be taken to minimize opportunities for the new lane to intersect a roadway in close proximity to a major intersection. If the situation required that a lane intersect an arterial road next to an intersection, turn restrictions or other traffic control measures may be required to ensure safe movement of through traffic.



Lane Exiting to a Local Road

In cases where temporary mid-block lane access or a temporary shared access driveway is provided, monies would be collected by the City to pay for the removal of the curb cut at such time that the lane becomes operational. Additionally, the future use of the land should be identified during the rezoning, development permit or subdivision process. These uses could include:

- the land could be landscaped;
- the land could be used as a pedestrian connection; or
- depending on the space available, an additional unit could be constructed.

Will lanes become secondary roads or short-cutting routes?

NO. Lanes are not wide enough to permit cars to move quickly. The design standard and legal speed limit for lanes is 20 km/hr. In terms of possible short-cutting, where possible, the new lanes will not be designed to directly connect major roads at both ends, therefore, they are only convenient for adjacent residents for local access. In some cases, when necessary, it would be possible to implement measures to alleviate specific problems.

Where the rear property lines do not line up, how is a continuous lane ensured?

In cases where rear property lines do not add up, the lane configuration would be adjusted and the City may require additional space from the applicant to accommodate turning.

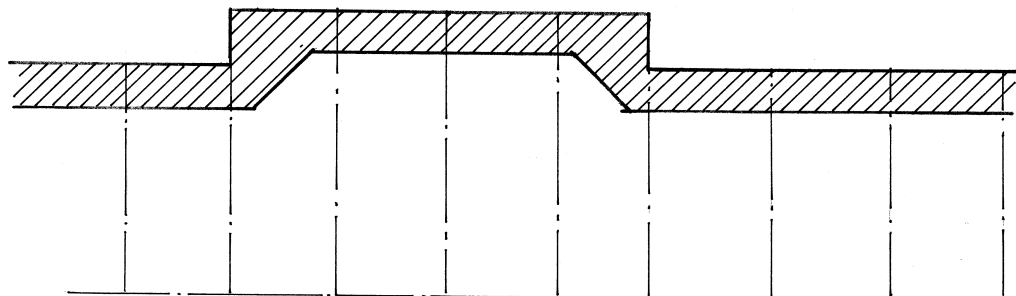


Diagram 3: Lane Schematic Where Rear Property Lines Do Not Line Up

What is the minimum lot depth to support a lane?

Under current zoning, the minimum subdivision lot depth for the single-family zone is 24 m (78.74 ft) and for the townhouse zones is 35 m (114.83 ft). However, the townhouse zone presupposes a certain form of development. It would be possible to accommodate some forms of townhouse development, for example a row house form, in the same depth of lot as a single family home. Therefore, the minimum lot depth before dedication of the lane would be 30 m (98.42 ft).

Should the lane be secured through a right-of-way agreement or through dedication?

A previous section explored the difference between a shared access and a lane. A right-of-way or a dedication is just the legal means for securing the lane the same as a Shared Access Agreement is the legal means for securing a shared access. Therefore, both a right-of-way or dedication result in the creation of a lane. However there are some differences between the two legal mechanisms which are detailed in the following chart.

DEDICATION (PREFERRED)	RIGHT-OF-WAY
Applicant loses density under conventional zoning	Applicant does not lose density under conventional zoning
Property lines for lane show up on land use maps	Property lines for lane do not show up on land use maps
It is owned by the Province	It is privately owned
It is under the control of the City/the City is liable	It is under the control of the City/the City is liable
The City is responsible for maintenance	The City is responsible for maintenance unless otherwise arranged
No terms can be attached to the agreement	Special terms can be attached to the agreement
The property lines shift to the inside edge of the lane therefore no need to adjust existing building setbacks in the zone	Need to adjust zoning or use covenant to ensure appropriate building setbacks from the lane

The City prefers dedication because it is more straightforward. Once a lane is dedicated, there can be no argument about the terms. With a right-of-way, it is possible in the future for the property owner to argue about terms. Additionally, the legal conditions attached to each right-of-way can be different so, unlike a lane where one can look at a map and then understand exactly what its' role and function is, it makes it necessary to look up the conditions for each right-of-way.

How does the City ensure that the raising of properties does not limit accessibility from the lane?

Often there is a difference in grade between the arterial roads and the local roads. Generally, when a lane is constructed, it is built at the height of the local road to limit the impact from a possible raising of the water table and to ensure that the internal properties have access to the lane.

However, as properties along arterial roads are generally lower than the arterial road bed, some properties are raised or filled to a higher level and are therefore higher than the lane. Therefore, covenants would be required to ensure that raised sites are accessible by vehicles from the lane.

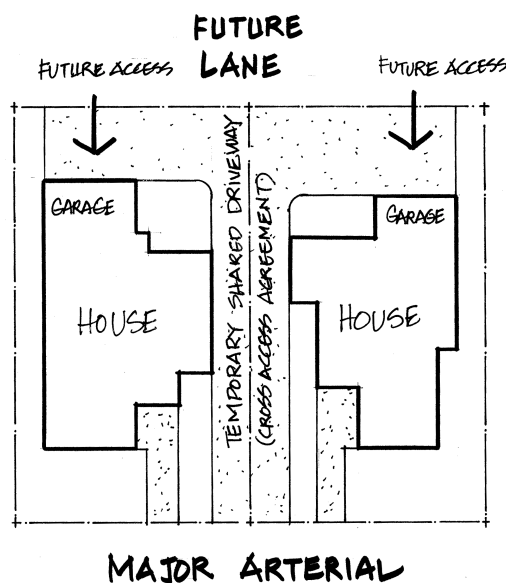
When a new single-family residence is built where a rezoning, development permit or subdivision is not required, can the City require a lane and funding through the building permit process?

NO, the Municipal Act does not permit the City to do this. The City could change the Zoning Bylaw to require building setbacks that would ensure that the building envelope does not restrict future establishment of the lane. However, this approach is not recommended as it is difficult to define a setback for a lane that is not in existence and it would be onerous to expect a property owner to give up development rights when the City is not providing any benefit in return. Therefore, with single-family development when no rezoning or subdivision occurs, the Lane Policy would take longer to achieve.

Once a section of lane is operational, how is it ensured that the lane would be used to access individual properties?

Through the rezoning process the City should ensure that the garages are located at the rear of the property. A covenant would be attached to the property to ensure that when the lane is operational, the access to the road is closed. *Diagram 4* shows one way that a garage can be located for use before and after a lane is made operational.

Diagram 4: Garages Located For Use Before and After Lane Development



Would the proposed Lane Policy affect the Access Policy?

NO. The Lane Policy could result in the following lane configurations:

- a permanent lane exiting at the end of the block to a local road;
- a permanent lane exiting mid-block to a major road;
- a temporary lane exiting mid-block to a major road; and
- a temporary, shared, single-width driveway.

These lane configurations are consistent with the Access Policy as they do not create additional accesses onto major roads or they result in the creation of a lane.

Would the proposed Lane Policy require adjustments to the Single-Family Lot Size Policy?

No. The Lane Policy would only come into effect in areas where redevelopment (e.g. a rezoning from large to smaller single family lots) is permitted. If there is a Lot Size Policy in place that does not permit smaller single family lots, then unless the Lot Size Policy is amended, the proposed development would not be permitted. In cases where a Lot Size Policy permits subdivision with the presence of a lane, then a lane must be constructed as part of the redevelopment. Payment by the developer for the construction of a future lane would not be permitted unless the Lot Size Policy is amended.

Therefore, the Lane Policy takes its lead from a Lot Size Policy, if there is one. There is the potential however for Lot Size Policies to be amended over time. Note that almost half of the areas targeted for lane development are restricted from subdividing through Lot Size Policies and therefore, currently, lane development will not be achievable in these areas.

How would adjacent properties be affected by lane development?

The impact of lane development will be felt by neighbouring property owners in the form of some traffic noise, exhaust fumes and activity (i.e. bicycles, pedestrians). The impact on the properties across the lane at the rear will be limited by the zoning requirement for a 6 m (19.65 ft.) minimum setback of the house from the rear property line for single-family and townhouse zones. In situations where a mid-block lane access is provided, impact on the properties next to the access could be greater as the zoning requires only a 1.2 m (3.94 ft.) minimum setback from a single-family home to the side property line. These factors would be taken in consideration in the siting of any mid-block lane accesses.

Will crime be an issue?

There may be a perception that socially unacceptable behaviour could take place in lanes. Lanes do provide alternative accesses to properties. Staff have made contact with the RCMP who stated that there weren't any statistics to substantiate this perception. However, they did point out that lighting and the design of the fences to permit surveillance were key considerations.

The provision of lighting in lanes is addressed in the servicing agreements for the construction of the lanes. In terms of fencing, the Screening and Landscaping section of the Zoning Bylaw permits a fence height of 2 m (6.5 ft.) along all property lines except the front where it is restricted to 1.2 m (3.9 ft.). The Zoning Bylaw could be amended to address the height of fences next to public lanes. However, fence height is difficult to enforce, especially when many existing fences would not meet a new standard. At this time, staff are not proposing to amend the Zoning Bylaw regarding fences.

Will lanes affect privacy?

There are two different schools of thought on this issue. Some feel that a lane removes the privacy that is enjoyed in individual backyards. Others feel that a lane provides alternative bike and pedestrian routes, increases opportunities for neighbours to get to know one another and provides a hard surface area for children to play on. Staff feel that the benefits outweigh any concerns.

What about parking in lanes?

The City's parking regulations stipulate that there is no parking permitted in City lanes. This has proven to be a problem in some areas that have a lack of parking. However, a minimum clearance is required for lanes to function. Currently, the City enforces this bylaw on a complaint basis. Parking, especially for visitors, is arranged for and addressed through the development permit process.

Will the lane be used for any services?

Of the services that generally access individual properties (ambulance, fire, garbage, mail, water, sewer, power and telephone), garbage, mail, sewer, power and telephone services could potentially relocate to the lane in certain circumstances and over time would be encouraged to do so. Ambulance services may or may not use the lane depending on the configuration of the development and the distance to the front door.

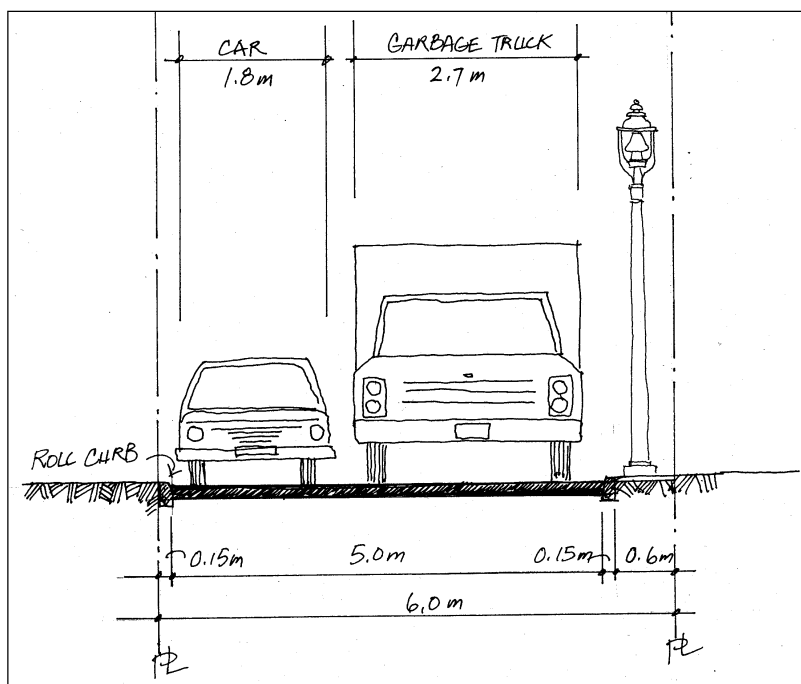
In terms of ease of access and efficiency of service, Engineering and Public Works staff prefer that garbage pick-up be located on major roads rather than on lanes. However, they agree that in terms of promoting the City's vision to be appealing and in terms of the ease for residents to put out garbage for pick-up where there are lanes, garbage pick-up would be better located along lanes than major roads. Nevertheless, there are some issues associated with locating garbage pick-up in lanes:

- Where cars have parked illegally in lanes, it will be difficult for garbage trucks to pass-by. It may be necessary to increase enforcement or place signage in the lanes reminding people that parking is not permitted;
- It can be difficult for the garbage trucks to manoeuvre, especially where it is necessary for them to back-up or turn around to exit. Therefore, garbage pick-up would only be located in a lane once there are entrance and exit points; and
- lanes can become unsightly with litter and overgrown vegetation. Civic Operations staff have suggested that a curb would make it possible for a street sweeper to effectively remove any litter. A curb also extends the lifespan of the lane by eliminating the break up of pavement that occurs along the edges of lanes, permitting vegetation (blackberry brambles) to grow and become unmanageable.

Therefore, staff recommend that garbage pick-up be phased in on through lanes.

What are the lane design standards?

Standards for lanes outside the City Centre are shown on the following diagram and include the provision of paving, drainage, lighting, curbs and a 6m (19.685 ft) right-of-way:



- A paved lane is provided because it is cheaper to maintain than gravel and makes it easier for baby strollers, bikes and basketball games;
- Drainage is required otherwise storm water will continue to run onto the neighbours property;
- Lighting is provided but at a lower standard than a road (4 lux compared to 9 lux on a major road and 6 lux on a local road);
- Curbs are required because they prevent the breakup of pavement at the edges of the lanes which in turn prevents the growth of brambles that eventually limit the driving width of the lane; and
- a right-of-way width of 6m (19.685 ft) is provided, which, after space is allocated for curb cuts and a street light, permits a driving surface of 5.1m wide (16.73 ft) which allows for a car and truck to pass.

Is it appropriate to develop two lane standards? (page 13)

YES. The basic lane standard in the City owned right-of-way remains the same. In some cases additional lane amenities such as sidewalks and street trees will be provided by developers on properties adjacent to the lanes and incorporated into the designs of the adjacent developments and will result in an enhanced lane standard. These additional amenities would be determined by staff and developers based on factors such as expected densities, façade orientation, visual appeal, traffic/pedestrian volumes and other right-of-way or physical limitations.

What will be the impact on the storm drainage system of the additional lanes?

Storm water drainage is a city wide issue, not specific to the provision of lanes. The addition of storm drainage in lanes will not increase the volume of water collected as much as increase the speed with which the water enters the system. This is because under the current system, water still finds its way into the storm drains via the drainage on the adjacent properties.

What about upgrading existing lanes?

Many of the existing lanes in Richmond are not built to current standards and are without curbs, lighting and drainage. Where redevelopment occurs next to an existing lane, the applicant will be required to pay for the upgrade of the portion of the lane adjacent to the development. Where there are concerns about the ability of an older lane to adequately serve the increased traffic, temporary access onto the major arterial may be provided until such time as the lane is upgraded.

What are the costs for lane maintenance?

After the lanes become operational, the City will be responsible for their maintenance. As with other City lanes, this would include street sweeping and cleaning catch basins. Occasionally it would involve pruning and clearing growth. Street sweeping for ½ mile of lane costs approximately \$300 a year. Cleaning catch basins for a ½ mile of lane costs approximately \$150 for a year. Overall, the maintenance cost for the additional lanes is expected to be minimal.

How long would it take before the results can be seen?

Lane creation is to be viewed as a long term endeavour. Lane development is relatively easy in large undeveloped areas; however, it is considerably more time consuming in existing built up areas. The rate of lane development would be dependent on the rate of redevelopment. There are some blocks for which redevelopment and lane creation will occur soon and others where it may be decades before redevelopment and lane creation occurs. The age of existing housing is a factor. As much of the housing along the major roads is getting older, there is a high potential for lane creation over the next decade as the second generation of housing is built. This opportunity should be used to establish lanes.

How would the lanes actually get built?

When an application is received, staff must first determine whether a lane is required. As part of the application process, the City would determine the short and long term lane alignment. The developer would then either provide the land and build the lane, or they would provide the land and the money for future construction. The lane would only be constructed once it has an access/egress point. This access/egress point may be a long term temporary access to a major road. A servicing agreement would be made with the developer to actually construct the lane. Another option would be that the City would construct the lane when enough money had been collected from the individual developments on that street. Both options would be followed.



Typical Upgraded Lane

Is it desirable to focus on an area to test the policy?

NO. One possibility would be to focus the Lane Policy on an area such as No. 2 Road across from Blundell Shopping Centre where we would expect some redevelopment in the near future. In this way, the policy could be tested and the City could gauge the effect it will have. However, the City would lose many opportunities and in the interim we would still be treating applications outside this area differently. Implementing the policy more widely should not be an issue because proposed applications have to meet land use objectives first. In this regard it is not likely that there will be a rush of new applications resulting from this policy and any potential problems could be ironed out with the first few applications.

Should there be a public consultation process when a new lane is built?

Yes. Currently, when a lane is constructed as part of a development application the neighbouring property owners have the opportunity to comment through the application processes. The City does not directly consult with neighbouring property owners regarding the construction of the lane. This approach works. Problems can occur are when a neighbouring property owner has not followed the application process and is not aware that a lane is being constructed as part of a development, or when in the process of construction, it is determined that a fence is encroaching on the laneway and has to be relocated.

Options for further consultation could be to include information about the lane on the development sign or to mail out written notification to all owners adjacent to the project. However, as the existing system works, it is not recommended that any additional consultation be conducted at this time.

Options

1. Adopt the Lane Policy (Recommended)
The benefits of maximizing the efficiency of the arterial road system by having a consistent Lane Policy are significant.
2. Satus Quo
With this option traffic congestion on arterial roads will become worse and the City will not have a consistent policy to deal with lanes.

FINANCIAL IMPACT

After the lanes become operational, the City will be responsible for their maintenance. As with other City lanes, this would include maintenance of the driving surface, flushing of the storm sewer lines, street sweeping and cleaning of the catch basins. On a yearly basis, the maintenance is expected to cost \$. There would also be additional costs for garbage pick-up based on the added time required for drivers to access from the lanes rather than more directly from the main road.

CONCLUSION

Consistent with the Corporate Strategic Plan and the Official Community Plan, a Lane Policy is proposed to support the creation of lanes along major roads in conjunction with development activity.

Jenny Beran, MCIP
Planner 1

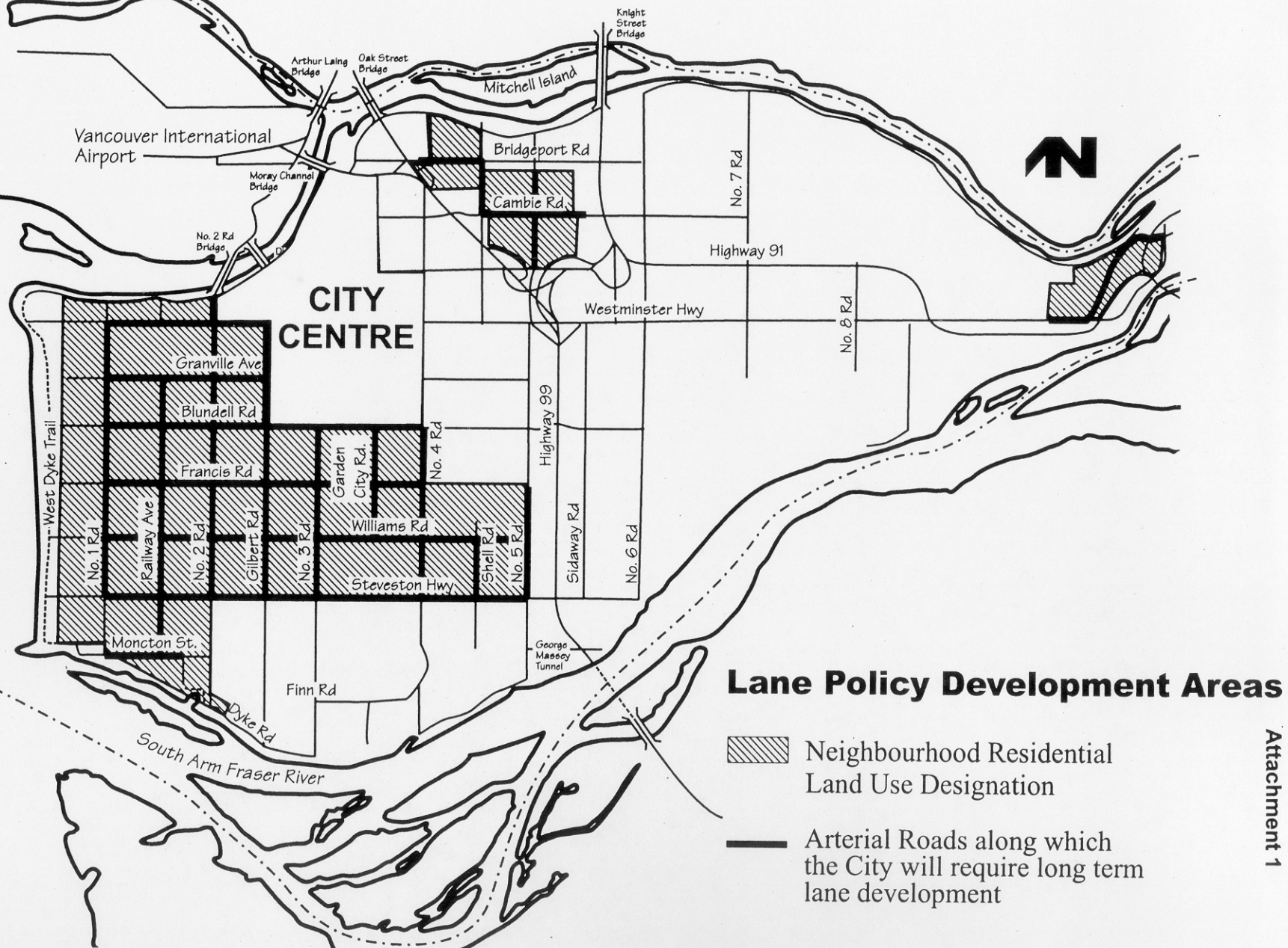
JMB:cam

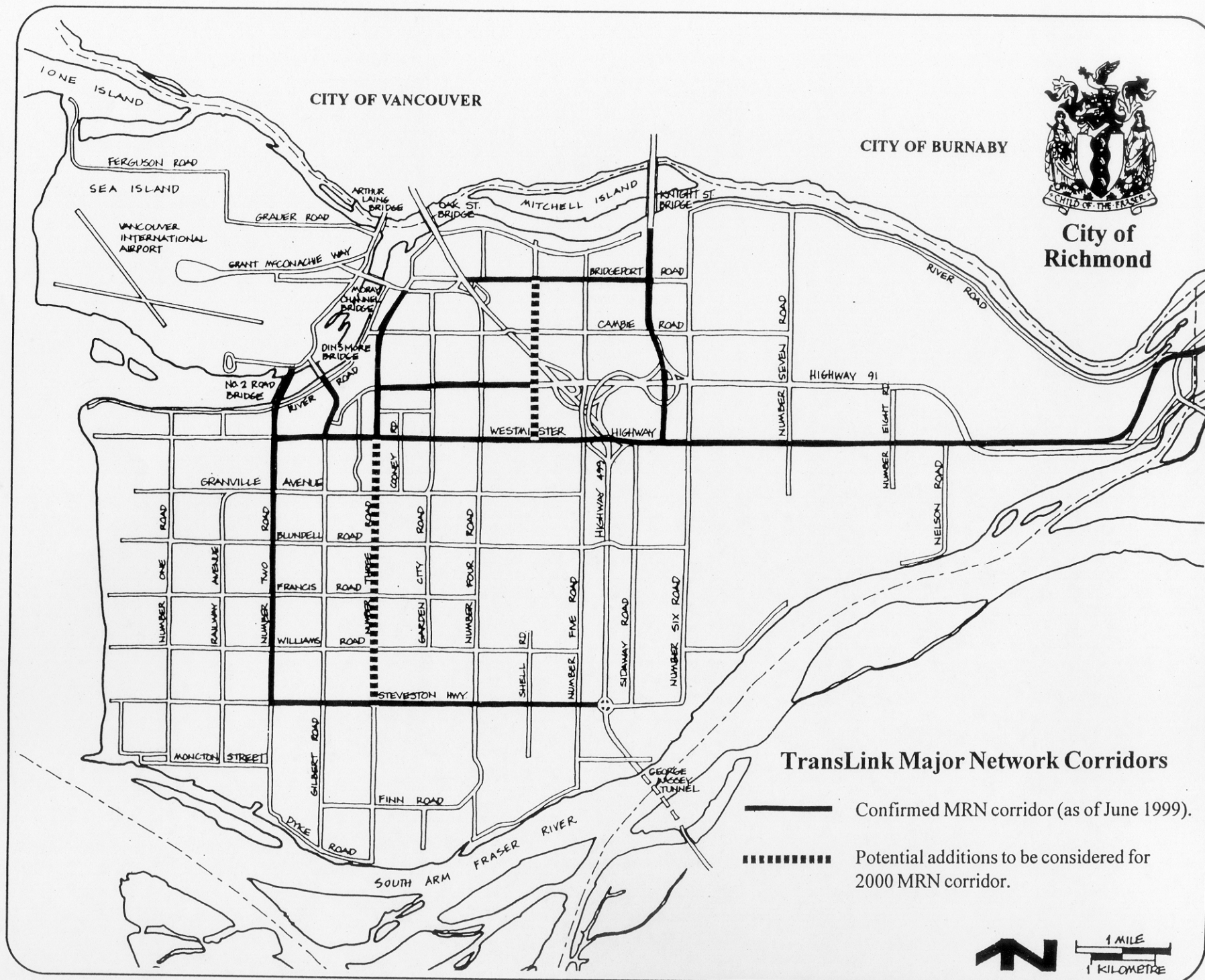
LANE POLICY

The purpose of the Lane Policy is to support the creation of lanes along major roads in conjunction with development activity.

It is Council policy that:

1. Where the City approves Rezoning, Development Permit and/or Subdivision applications for properties which:
 - a) are outside the City Centre;
 - b) are designated by the Official Community Plan as “Neighbourhood Residential”;
 - c) front a major arterial road, or a local arterial road that is part of the Bike Network; and
 - d) are illustrated generally on the attached map, “Lane Policy Development Areas”;the City requires the applicant to:
 - e) dedicate land at the rear and/or side of the properties for a lane and/or mid-block lane access; and
 - f) pay for construction, to City standards, of such lane and/or mid-block lane access.
2. A lane required under Section 1 must not exit directly onto a major arterial road, unless:
 - a) a permanent mid-block vehicular access is provided from the lane to the major arterial road; or
 - b) a temporary mid-block vehicular access, constructed to City standards, is provided from the lane to the major arterial road; or
 - c) land is dedicated and funding provided for the future construction of a lane and in the interim a temporary, single-width, shared access driveway is provided for use by vehicles accessing only those parcels located directly adjacent to the driveway on the understanding that any garage(s) is to be located at the rear of such property, to ensure that the access to the arterial road can be closed when the lane is operational.
3. In order to implement the provisions of Section 1, restrictive covenants may be required as part of a rezoning application in order to:
 - a) increase rear-yard setbacks;
 - b) ensure that where fill is added to raise the property, vehicular access to the lane is maintained;
 - c) ensure that garages, if any, are located at the rear of the property in question; and/or
 - d) ensure that when the lane is operational, access to the major road is closed.
4. Exceptions to the policy which would be determined with each application include where:
 - a) there is a lane already built to City standards;
 - d) the property is less than 30m in depth; or
 - a) there is, or the City approves, an alternative permanent access, such as a frontage road, shared access, or internal road.
5. The main principles used by staff to determine the suitability of an alternative permanent access referred to in clause c) of section 4 are that:
 - (i) there are to be no additional accesses created to the major arterial road;
 - (ii) the proposed access will not impede the intended function of the arterial road; and
 - (iii) the type of access is consistent with the existing and/or anticipated form of development.
6. Notwithstanding the provisions of this policy, the City will continue to examine development applications in terms of meeting OCP objectives, Lot Size Policies, the Access Policy and other requirements, standards and factors.





THE CORPORATION OF THE TOWNSHIP OF RICHMOND

Attachment 3

REPORT TO COUNCIL

DATE: October 4, 1989
TO: Mayor and Aldermen
Richmond Municipal Council
FROM: Ron Mann, Director of Planning
Harvey Gibault, Municipal Engineer
RE: ACCESS POLICY FOR SINGLE-FAMILY RESIDENTIAL REDEVELOPMENTS
FILE: 5001

(261)

STAFF RECOMMENDATION

That the following policy be established:

That zoning, subdivision and development approvals for single-family residential use be consistent with the access guidelines along arterial and collector roads and access be restricted along these roads in accordance with the map and table attached as Schedule A to the report dated October 4, 1989 from the Director of Planning and Municipal Engineer.

... 2







TABLE A - ACCESS ON ROAD CLASSIFICATION

CLASSIFICATION	PRIORITY	ACCESS	ZONE	MINIMUM FRONTAGE WIDTH (m)
Major Arterial	1	lane	R1/A	6
			R1/B	6
			R1/D	7.5
	2	direct	R1/E	18
			R1/F	18
			R1/G	20
Local Arterial	1	lane	R1/A	6
			R1/B	6
			R1/D	7.5
	2	direct	R1/C	13.5
			R1/D	15
			R1/E	18
			R1/F	18
			R1/G	20



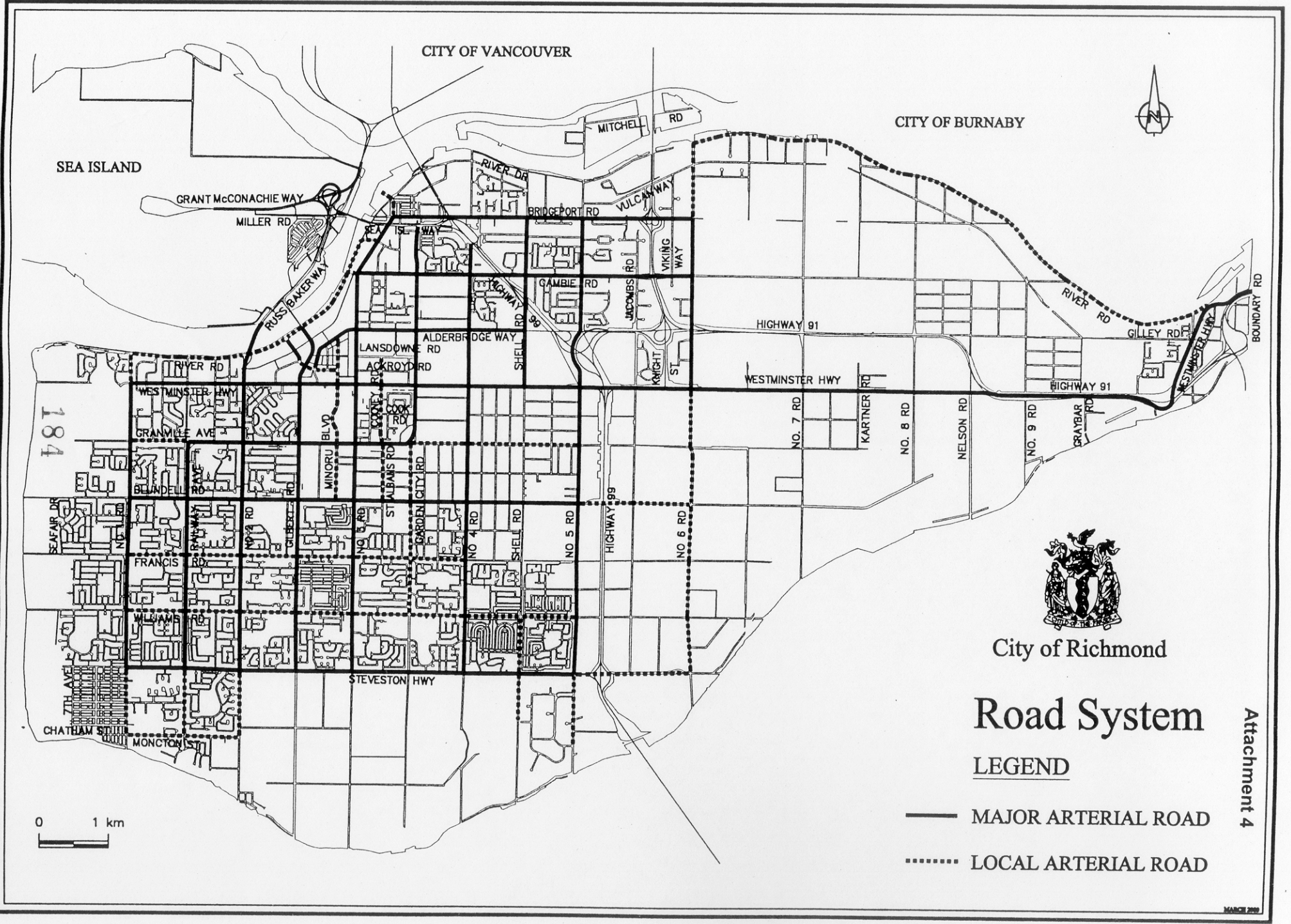
ROAD NETWORK & MAJOR INTERSECTIONS

LEGEND

- | | |
|---|---------------------|
|  | PROVINCIAL HIGHWAY |
|  | FEDERAL HIGHWAY |
|  | MAJOR ARTERIAL ROAD |
|  | LOCAL ARTERIAL ROAD |
|  | COLLECTOR STREET |
|  | MAJOR INTERSECTION |

JULY 1990

Original Adoption: June 22, 1989
Last Amended: June 19, 1995



City of Richmond

Road System

LEGEND

- MAJOR ARTERIAL ROAD
- LOCAL ARTERIAL ROAD

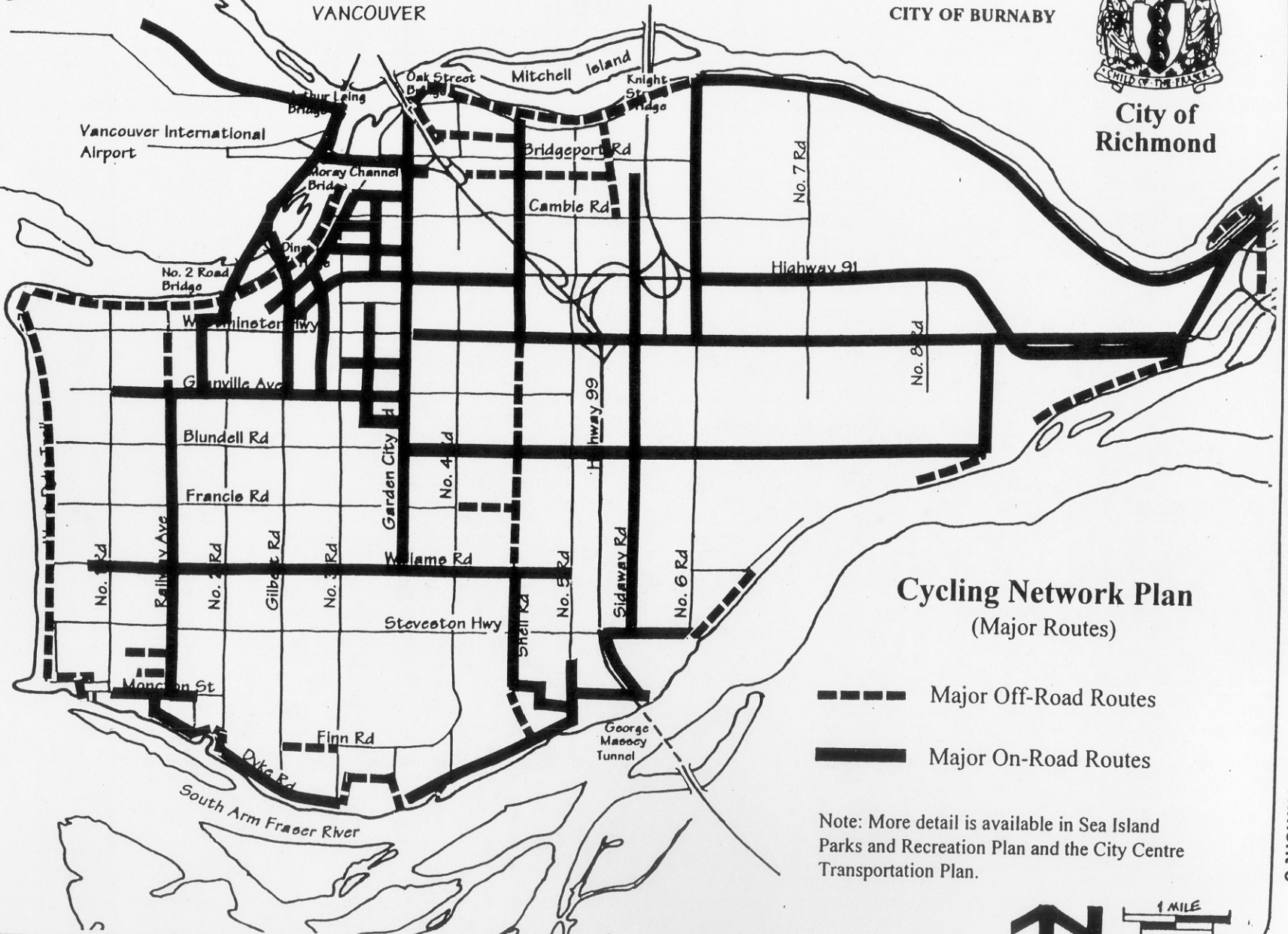
Attachment 4



City of Richmond

CITY OF VANCOUVER

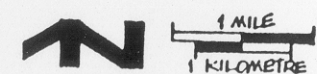
CITY OF BURNABY



Cycling Network Plan (Major Routes)

- Major Off-Road Routes
- Major On-Road Routes

Note: More detail is available in Sea Island Parks and Recreation Plan and the City Centre Transportation Plan.



Attachment 6 – Responses to March 21st Planning Committee

The following information responds to the questions that were raised at the Planning Committee meeting of March 21st, 1999. This information has been incorporated into the body of the report, replacing or updating previous information.

Where should the City target lane development? (page 4)

The primary goal of lane development is to limit individual access points onto major roads. This is an issue where there are many single-family lots with individual access points. For example, a typical block face on an arterial road in west Richmond has 35 parcels/accesses whereas a typical block face on a residentially oriented arterial road in the City Centre has only 10 parcels/accesses.

Therefore, the proposed policy would support lane development along arterial roads in residential areas primarily in West Richmond where there are a number of individual land parcels that directly access major arterial roads. These areas are designated “Neighbourhood Residential” on the Generalized Land Use Map in Richmond’s Official Community Plan.

Specifically, the policy would apply to those parcels outside of the City Centre designated Neighbourhood Residential which front:

- a major arterial road;
- a local arterial road that is also a Bike Route (Attachment 5 shows the Bike Network Roads in Richmond); and
- Francis Road between No.1 and No.4 Road.

Francis Road is included because:

- while it is not classified as a major arterial, it has recently been upgraded to four lanes;
- its length contributes to its use as a through road similar in function to other major arterial roads; and
- the types of land uses permitted along Francis Road will be similar to those permitted along other major arterials due to the common “Neighbourhood Residential” land use designation.

The map attached to the Lane Policy (Attachment 1) shows the areas that are designated Neighbourhood Residential and the roads along which the City would require lane development.

Does a Lane Policy mean the City would be encouraging redevelopment along all major roads to facilitate lane development? (page 5)

NO. The Lane Policy isn’t meant to signal that the City is encouraging redevelopment in order to facilitate the provision of lanes. The City would continue to examine each application in terms of meeting OCP objectives, Lot Size Policies and other factors. If, from a land use perspective, it makes sense for a property to redevelop, then a lane would be required subject to the Lane Policy.

Are there population growth implications with the Lane Policy? (page 5)

An increase in population would be attributable to the OCP, not to the Lane Policy. The OCP does suggest that some redevelopment in the form of smaller lots, two-family dwellings and townhomes along major roads is expected. The 2021 population projection in the OCP accounted for 2,400 additional units along major roads for a total additional population of approximately 5500 people.

What are the costs for building lanes? (page 6)

The cost for providing a lane is \$600 a meter (including curb, gutter, pavement and lighting). While this cost is significant, the developer of a lot along an arterial road usually does not have to pay for the costs of other service upgrades because they have generally already been undertaken by the City. As a comparison, development along an internal road, that had not already been upgraded, would cost \$953 a meter (including curb, gutter, pavement, lighting, sidewalk, storm sewer, and tree planting). Therefore, even if the City requires the applicants to pay for lane construction, the overall cost for service upgrades are significantly less than if the same development were constructed on a road that had not already been upgraded.

What are the costs for lane maintenance? (page 13)

After the lanes become operational, the City will be responsible for their maintenance. As with other City lanes, this would include street sweeping and cleaning catch basins. Occasionally it would involve pruning and clearing growth. Street sweeping for ½ mile of lane costs approximately \$300 a year. Cleaning catch basins for a ½ mile of lane costs approximately \$150 for a year. Overall, the maintenance cost for the additional lanes is expected to be minimal.

What happens with lanes at intersections? (page 7)

In developing configurations for a new lane, care would be taken to minimize opportunities for the new lane to intersect a roadway in close proximity to a major intersection. If the situation required that a lane intersect an arterial road next to an intersection, turn restrictions or other traffic control measures may be required to ensure safe movement of through traffic.

Will lanes become secondary roads or short-cutting routes? (page 8)

NO. Lanes are not wide enough to permit cars to move quickly. The design standard and legal speed limit for lanes is 20 km/hr. In terms of possible short-cutting, where possible, the new lanes will not be designed to directly connect major roads at both ends, therefore, they are only convenient for adjacent residents for local access. In some cases, when necessary, it would be possible to implement measures to alleviate specific problems.

What about parking in lanes? (page 11)

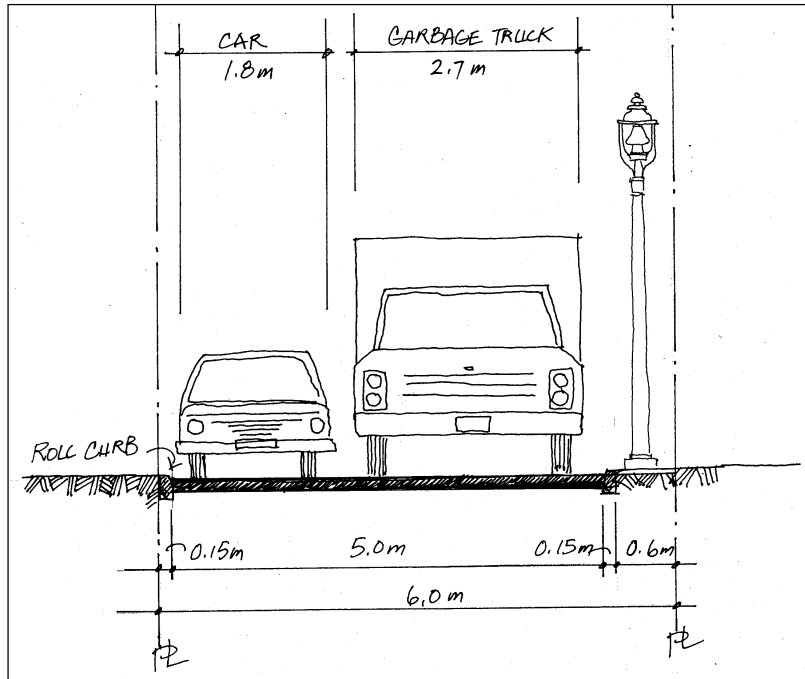
The City's parking regulations stipulate that there is no parking permitted in City lanes. This has proven to be a problem in some areas that have a lack of parking. However, a minimum clearance is required for lanes to function. Currently, the City enforces this bylaw on a complaint basis. Parking, especially for visitors, is arranged for and addressed through the development permit process.

What are the lane design standards? (page 12)

Standards for lanes outside the City Centre are shown on the following diagram and include the provision of paving, drainage, lighting, curbs and a 6m (19.685 ft) right-of-way:

- A paved lane is provided because it is cheaper to maintain than gravel and makes it easier for baby strollers, bikes and basketball games;
- Drainage is required otherwise storm water will continue to run onto the neighbours property;
- Lighting is provided but at a lower standard than a road (4 lux compared to 9 lux on a major road and 6 lux on a local road);
- Curbs are required because they prevent the breakup of pavement at the edges of the lanes which in turn prevents the growth of brambles that eventually limit the driving width of the lane; and

- a right-of-way width of 6m (19.685 ft) is provided, which, after space is allocated for curb cuts and a street light, permits a driving surface of 5.1m wide (16.73 ft) which allows for a car and truck to pass.



Is it appropriate to develop two lane standards? (page 13)

YES. The basic lane standard in the City owned right-of-way remains the same. In some cases additional lane amenities such as sidewalks and street trees will be provided by developers on properties adjacent to the lanes and incorporated into the designs of the adjacent developments and will result in an enhanced lane standard. These additional amenities would be determined by staff and developers based on factors such as expected densities, façade orientation, visual appeal, traffic/pedestrian volumes and other right-of-way or physical limitations.

What will be the impact on the storm drainage system of the additional lanes? (page 13)

Storm water drainage is a city wide issue, not specific to the provision of lanes. The addition of storm drainage in lanes will not increase the volume of water collected as much as increase the speed with which the water enters the system. This is because under the current system, water still finds its way into the storm drains via the drainage on the adjacent properties.