ATTACHMENT 1

DOWNTOWN PUBLIC REALM PLAN & STREETSCAPE STANDARDS

CITY OF VICTORIA

OCTOBER 2017

PUBLISHING INFORMATION.

Title: Downtown Victoria Public Realm Plan and Streetscape Standards

Author: Community Planning Division – Sustainable Planning and Community Development Department

Status: Council Approval – 2017

Printing Date: May 2017

Disclaimer: This Guideline may be subject to periodic updates and amendments. Please contact the City of Victoria Planning and Development Department for up to date information.

Additional Copies: The City of Victoria
Sustainable Planning and Community Development Department
Victoria City Hall, 2nd Floor
T 250.361.0382

Electronic versions (in PDF format) available on the City of Victoria website at www.victoria.ca/downtownpublicrealmguidelines

ACKNOWLEDGEMENTS.

This document was created by and for City of Victoria in association with:

PWL PARTNERSHIP LANDSCAPE ARCHITECTS INC.
LANDSCAPE ARCHITECTS + URBAN DESIGNERS

PUBLIC: ARCHITECTURE + COMMUNICATION
WAYFINDING DESIGN SPECIALISTS

CONTENTS.

EXECUTIVE SUMMARY

1 INTRODUCTION 1
1.1 Background And Overview 1
1.2 Purpose And Use 2
1.2.1 Monitoring & Updates 2
1.2.2 Scope 2
1.3 Downtown Context 4
1.4 Policy Framework 5
1.5 Relevant Plans & Initiatives 6
1.6 Defining The Public Realm 11
1.6.1 Importance Of The Public Realm 11
1.6.2 Streets As Public Spaces 12
1.6.3 Best Practices 13

2 DESIGN FRAMEWORK & STRATEGIES 15
2.1 Vision Statement 15
2.2 Design Framework 17
2.3 Public Realm Strategies 19
2.3.1 Making Things Simple 20
2.3.2 Activate The Waterfront 22
2.3.3 Energize Open Spaces 23
2.3.4 Discover The Secret Thread 24
2.4 Priority Public Realm Improvements 25
2.4.1 Energize Centennial Square 25
2.4.2 Government Street - Shared Space 26
2.4.3 Douglas Street - Transit Oriented Corridor 27

3 STREETSCAPE STANDARDS 29
3.1 Intro 29
3.2 Streetscape Design Principles 31
3.3 Streetscape Strategies 33
3.3.1 Corner Bump Outs 34
3.3.2 Mid-Block Bump-Outs And Crossings 36
3.3.3 Tree Planting 37
3.3.4 Sidewalk Treatments 40
3.3.5 Streetscape Elements 41
3.3.6 Accessibility 41
3.3.7 Lighting Strategy 42
3.3.8 Public Art And Culture Strategy 43
3.4 Character Areas 45
3.4.1 Inner Harbour 46
3.4.2 Old Town 52
3.4.3 Government Street Mall 58
3.4.4 Chinatown 62
3.4.5 Rock Bay 67
3.4.6 New Town 73
3.4.7 Douglas Street 79

4 IMPLEMENTATION FRAMEWORK 87
4.1 Updated Streetscape Standards 87
4.1.1 Developer Initiated Improvements 87
4.1.2 Operations And Maintenance Program 88
4.1.3 Capital Plan And Projects 88
4.2 Priority Improvement Projects 89
4.2.1 Short Term (0-5 Years) 89
4.2.2 Medium Term (5-10 Years) 90
4.2.3 Long Term (10+ Years) 90
4.2.4 Downtown Public Realm Committee 90

5 STREETSCAPE ELEMENTS CATALOG 93

LIST OF FIGURES

Fig. 1 Project Scope Map
Fig. 2 Project Process Diagram
Fig. 3 Policy Context
Fig. 4 Components of Public Realm.
Fig. 5 Benefits of public realm
Fig. 6 Design Framework
Fig. 7 Character precincts diagram
Fig. 8 Streetscape Strategies Diagram
Fig. 9 Typical Bump Out Diagram
Fig. 10 Bump Out Scenarios
Fig. 11 Mid Block Bump Out Diagram
Fig. 12 Tree Pit Details
Fig. 13 Tree Grate Detail
Fig. 14 Tree Typologies
Fig. 15 Sidewalk Treatment Patterns
Fig. 16 Boulevard Zone
Fig. 17 Lighting Fixture Strategy Diagram
Fig. 18 Lighting Typology Distribution Diagram
Fig. 19 Character Areas Diagram
Fig. 20 Inner Harbour Paving Strategy

Downtown Victoria is an area with rich cultural heritage demonstrated by local architecture, plazas, and distinctive character areas and is considered to be one of the most vibrant, walkable and recognizable Downtowns in North America. These characteristics, along with the significant role played by the City's public spaces, are all contributive to Victoria's unique identity and urban vitality.

EXECUTIVE SUMMARY

OVERVIEW

The City of Victoria has one of the most vibrant, walkable and recognizable Downtowns in North America. The City's public spaces have played a significant role in creating and supporting the City's identity and urban vitality. Victoria's Downtown has a rich history that can be seen in the buildings, plazas and distinct character areas that shape and define its unique identity.

The Downtown Public Realm Plan establishes a design framework and set of principles, strategies and standards for ensuring a unique, walkable, timeless and high quality downtown environment befitting of its role as the Provincial Capital. This Plan is further premised on respecting and showcasing Chinatown, Canada's oldest Chinatown and a National Historic Site, as well as Old Town, one of the Country's largest Heritage Conservation Areas. These precincts, together with a blend of contemporary buildings, contribute to a rich architectural fabric consisting of an eclectic mix of old and new elements.

THE PROCESS

The Public Realm Plan was developed through an integrated and collaborative planning process, Visual Victoria, which also included development of a City-wide Wayfinding Strategy, an important companion document to this Plan. The Visual Victoria process included a series of stakeholder and public workshops along with online and social media engagement, which resulted in extensive community participation, input and feedback. The broad purpose of this process was to support the creation of a memorable and positive image of Victoria based on its rich history and vision for the future while enhancing its unique identity and supporting vitality, accessibility and usability.

PURPOSE

The Downtown Public Realm Plan represents a renewed design framework for downtown public spaces including priority public realm improvements — with short and long term strategies for implementation — and a detailed catalogue of furnishing, materials, colours and specifications for Downtown Streetscapes. In this way, the Downtown Public Realm Plan clarifies important requirements for public spaces, waterfront and street design to both public and private sector professionals engaged in the facilitation, design, approvals and implementation of public realm improvements and infrastructure.

HOW TO USE THIS DOCUMENT

The first section of this document presents the background and rationale for the Plan. Section Two lays out the design framework including a set of principles, strategies for implementation, and priority public realm improvements. Section Three is comprised of a set of design guidelines and specifications to guide frontage improvements, capital projects as well as maintenance and upgrades for public streets and open spaces.

RELATED PLANS AND INITIATIVES

The City of Victoria has established a number of other plans and initiatives in addition to the Downtown Public Realm Plan. These plans should be used in conjunction with the Downtown Public Realm Plan and have been identified and linkages summarized in Section 1.4 Relevant Plans & Initiatives.

PART 1

INTRODUCTION

1 INTRODUCTION

1.1 BACKGROUND AND OVERVIEW

Downtown Victoria is an area with rich cultural heritage demonstrated by local architecture, plazas, and distinctive character areas and is considered to be one of the most vibrant, walkable and recognizable Downtowns in North America. These characteristics, along with the significant role played by the City's public spaces, are all contributive to Victoria's unique identity and urban vitality.

Since the early 20th century, sub-districts such as the Inner Harbour Causeway/Provincial Legislative area and the City's two Heritage Conservation Areas – Chinatown and Old Town – have been recognized as diverse components of a compact, multi-faceted city core. In addition, key corridors such as Douglas Street and Government Street connect major citywide attractions and destinations and provide key points of entry into the Downtown area and a focal point for business activity. Over the years, streetscape improvements have been based on the established Downtown character areas, resulting in a patchwork quilt of materials that range from furnishing to paving patterns. At the same time, Victoria's Downtown Core has expanded and the original character precincts have evolved.

The Downtown Core Area Plan adopted in 2011 establishes a framework for land use and development, economic vitality, mobility and urban design. The Plan renews the vision for Downtown as the economic, social and cultural heart of the city in anticipation of broad, balanced growth totaling approximately one million square meters of new building development, and the addition of approximately ten thousand new residents by 2040. The City is currently undertaking implementation of a network of All Ages and Abilities (AAA) separated bicycle paths, including four key corridors in the Downtown, which will integrate seamlessly with the pedestrian environment to enhance, prioritize and support low carbon mobility options in the City.

Continued growth in the number of people living, working and visiting the Downtown Core has created new challenges and roles that the City's public realm will need to address in the coming years. At the same time, the City's public realm and open spaces link a host of key destinations, services and attractions both within and outside the Downtown core. In order to support the connectivity of these spaces, an improved program for wayfinding that integrates with the overall approach to the public realm will be important in enhancing legibility and understanding for all users and establishing the Downtown as a more user-friendly and pedestrian oriented place.

To ensure a unique, walkable, timeless and high quality downtown environment, the Downtown Public Realm Plan outlines a design framework and set of principles, strategies, and standards for the Provincial Capital. Significant considerations have been placed on respecting and showcasing Chinatown, Canada's oldest Chinatown and a National Historic Site, and Old Town, one of the Country's largest Heritage Conservation Areas. Both of these precincts are home to a mixture of old and new architectural elements that contribute to the unique and eclectic identity of Downtown Victoria.

Visual Victoria, an integrated and collaborative planning process, included a series of stakeholder and public workshops along with online and social media engagement which resulted in extensive community participation, input and feedback. The input and feedback received was used to develop the Vision and set of principles, along with the strategies and guidelines contained within the Public Realm Plan. The City-wide Wayfinding Strategy, an important companion document to this plan, was also developed as a part of the Visual Victoria process.

1.2 PURPOSE AND USE

The overarching purpose of the Victoria Downtown Public Realm Plan is to provide long-term strategies, principles and guidelines for the design and programming of the public realm to support the Downtown Core Area Plan Document.

The Public Realm and Streetscape Plan builds upon existing public realm assets and the City's 1992 Downtown Beautification Strategy as well as other key City plans to develop a renewed strategy for public realm investment. This Plan clarifies important requirements for public space, waterfront and street design to all professionals engaged in the facilitation, design, approvals and implementation of the public realm. Professionals include both private and public sector representatives.

The Plan applies a consistent approach to all streetscapes in Downtown Victoria. These strategies, principles and guidelines are supported by the Standards Catalog for Public Infrastructure Works. The Standards set out the technical requirements for civil, landscape and infrastructure works that will be owned by or vested in the City of Victoria.

PURPOSE OF THIS PLAN

- Provides a strategic companion document to the Downtown Core Area Plan (City of Victoria, 2013).
- Outlines the value and importance of public spaces within the Downtown.
- Provides an updated catalogue of furnishing, materials, paving patterns and other guidelines and specifications for downtown public spaces.
- Provides clarity to developers, designers and City staff regarding long-term strategies, principles and guidelines for the design and programming of public streets and spaces in the downtown.
- Demonstrates application of design principles to Downtown public streets and open spaces.
- Provides design directions for the design of key public spaces.
- Provides a checklist of design principles.
- Demonstrates application of design principles to Downtown public streets and open spaces.
- Provides an implementation strategy for the short and long term.
- Provides design direction and construction standards for Public Realm Infrastructure.

1.2.1 MONITORING & UPDATES

It is important to note that the Plan and associated Streetscape Standards and Catalogue are intended to be updated from time to time based on ongoing monitoring and assessment of the performance and suitability of furnishing and materials. The Plan's implementation framework will also be updated as identified projects get implemented and new priorities identified.

1.2.2 SCOPE

This Plan applies to the area shown in the Project Scope Map, corresponding to the Downtown Core Area Plan (DCAP) boundary. The Plan considers important relationships between Victoria's Downtown and neighbouring areas.

Fig. 1 Project Scope Map

PROCESS

Public and stakeholder engagement that occurred as a part of Phase 1 resulted in an inventory and assessment of existing conditions, along with the identification of issues, opportunities and big ideas. The results of Phase 1 feedback were synthesized into a set of design principles. These principles guided the set of concepts and options developed as part of Phase 2. The outcomes of Phase 1 and Phase 2 guided concept refinement and detailed design that occurred in Phase 3, which is compiled into the Victoria Downtown Public Realm Plan.

All initial concepts and design vision were presented to the general public and stakeholders in the form of a slideshow and presentation. In addition, boards were generated to provide in depth details of the information presented.

Feedback was received in the form of interactive markups of boards, live questions and answers at the presentation as well as online (and onsite) survey with questions related to each topic presented.

Fig. 2 Project Process Diagram

1.3 DOWNTOWN CONTEXT

Located on the southern tip of Vancouver Island, Victoria is the capital of British Columbia. Victoria is home to over 80,000 residents while the surrounding Greater Victoria Region has approximately 400,000 residents. The City draws over 3 million tourists each year with its surrounding natural beauty, compact and unique Downtown, and historic old town area as well as other key attractions, special events and destinations in and around the Downtown core. Victoria's Downtown is the City's calling card and a major contributor to its livability. Past public and private investments in the City's urban fabric have created and revitalized a number of walkable districts in and around the Downtown core with distinct visual identities and strong destinations for both visitors and residents.

Increased population and job growth coupled with a strong growing number of visitors have placed continued pressure on the City's public spaces. At the same time, due to the lack of a current coherent strategy, public realm improvements and districting have resulted in some inconsistent approaches to public space design and infrastructure. The overall purpose of this process is to develop a coordinated plan that aligns limited City, private and other stakeholder resources into a cumulative program of public space improvement.

Victoria's compact size, relatively high overall residential and employment density and fine-grained street network enable convenient travel by foot, bicycle and public transit. These modes of transportation currently account for an approximate 46% share of resident trips to work each day, one of the highest multi-modal rates in Canada. By 2041, this number is expected to increase to 60%, according to the target set by the Official Community Plan. Within the Downtown Core, the Douglas and Government Street corridors play prominent roles as the City's primary mobility and retail corridors respectively. In recent years, these two streets have been identified by City Council and a number of Downtown stakeholders as important corridors in need of more detailed future planning and public realm design. Therefore, the treatment and role of Douglas and Government Street corridors are of key importance in the Plan and Strategy. As such, the Public Realm and Streetscape Master Plan provides detailed consideration for these two corridors.

Downtown Victoria also supports a large tourism industry. A vibrant cruise ship industry attracts over 200 cruise ships each year and unload over 450,000 passengers, many of whom will spend time walking through the Downtown and surrounding area. Furthermore, Clipper Vacations operates a daily, year-round passenger ferry service between Victoria's Inner Harbour and Downtown Seattle while Black Ball Ferry Line offers daily, year-round passenger and vehicle service between Inner Harbour and Port Angeles, WA. Together, these ferry services transport over 750,000 passengers and bring in 127,000 vehicles to Victoria each year. The Inner Harbour also contains several float plane operators who provide daily service from Inner Harbour to Vancouver BC, Seattle, WA and other destinations.

Ensuring a unified, cohesive, legible and high quality public realm environment is therefore an essential component of supporting a vibrant, pedestrian oriented and memorable downtown environment that is the social, cultural, and economic heart of the Capital City and region.

1.4 POLICY FRAMEWORK

Following is a summary of key studies, policies and initiatives that provide the background for this document.

OFFICIAL COMMUNITY PLAN (2012)

- A high demand for high to medium densities in the Urban Core.
- New development should create new memorable places, while embracing older special character areas through urban design, heritage conservation and animation of the public realm.
- To Promote social equity and physical accessibility.

DOWNTOWN CORE AREA PLAN (2011)

- Central Business District: to develop well-designed, clearly marked and safe pedestrian, cycling and transit networks, and to support the use of transit by encouraging commercial and residential mixed-use developments and street-level retail and businesses.
- Historic Commercial District: to reflect the historic character of the District in the public realm improvements, and to improve public wayfinding and streetscape to achieve a cohesive and consistent design.
- Rock Bay District: to be transformed into a key employment centre, to integrate a strong public transit network that supports employment uses and activities, and to promote environmental stewardship through the integration of green and innovative infrastructure.
- Inner Harbour District: to become a World-class gateway to Victoria, and to continue to promote a pedestrian-friendly environment and high-quality streetscaping.
- Residential Mixed-use District: to encourage pedestrian activity and support retail along selected streets.

VICTORIA HARBOUR PATHWAY PLAN

- The Harbour pathway aims to become Victoria's preeminent public space, envisioning a continuous, five kilometer public route along the City's waterfront, between Ogden Point and Rock Bay.
- "Special places" along the Harbour pathway route / a diverse waterfront experience, and to identify and enhance key viewpoints, view corridors and connections to the upland street network.
- There's currently no existing waterfront pathway in the Rock Bay District.
- In parts of Old Town, connections form the waterfront to downtown streets are through large areas of surface parking.
- Noted that there are significant conflicts between vehicle traffic and pedestrians in Fisherman's Wharf.
- Calls for incorporation of public art into the design of the harbour pathway.
- To minimize Pathway impacts while maximizing opportunities for site-specific habitat protection and enhancement along the Pathway.

CAPITAL REGIONAL DISTRICT - REGIONAL PEDESTRIAN & CYCLING MASTERPLAN (2011)

- The region has a healthy walking and cycling community. By upgrading pedestrian and cycling facilities in priority locations, the community would grow significantly.
- To provide levels of separation for on-street bikeways based on street classification and users' needs.
- To ensure that residents have the skills, information, confidence and support they need to walk and cycle more.
- To enhance legal protection for vulnerable road users and to enforce traffic safety rules for all road users.

PEDESTRIAN MASTERPLAN FINAL REPORT (2008)

- The Sidewalk Priority Index (map) identifies several segments in the Downtown core as high priority areas.
- To increase budgets for pedestrian infrastructure to be more reflective of its significant mode share and City goals to support walking.
- Provided examples of good configurations of the sidewalk.
- To update the Sidewalk Priority Index every 5 years to accommodate changing conditions and needs.
- To increase park programming opportunities and to enhance park safety.

URBAN FOREST MASTER PLAN (2013)

REGIONAL VISION ⟷ **LOCALIZED DESIGN**

DOWNTOWN PUBLIC REALM PLAN

Fig. 3 Policy Context

1.5 RELEVANT PLANS & INITIATIVES

In addition to the Downtown Public Realm Plan, the City of Victoria has also established a number of plans and initiatives that are referenced within the Downtown Public Realm Plan. These plans and initiatives should be used in conjunction with the Downtown Public Realm Plan and are listed below.

CITY OF VICTORIA WAYFINDING STRATEGY

This Victoria Citywide Wayfinding Strategy has been created by the City of Victoria to facilitate transportation around the city, primarily by pedestrians, cyclists and transit users. This document is intended to be used as a reference for anyone working on wayfinding projects within the City of Victoria. The information provided includes an overview of the process and reasoning behind the wayfinding system along with descriptions of the individual components of the system and how they are to be used in a variety of contexts. Recommendations and suggested work-flow processes are provided to inform the implementation of the system. Sign construction drawings are provided to a level of detail that should allow any sign fabricator to reproduce wayfinding elements that fit seamlessly into the system. Phasing schedules indicate which areas of the city are priority candidates for the new wayfinding system and the schedule by which they should be implemented.

CITY OF VICTORIA FOREST MASTER PLAN

The Urban Forest Master Plan is a city-wide policy that outlines the vision, goals and strategies for the management of Victoria's urban forest until 2060. The overall vision is for a healthy, diverse and abundant urban forest which is well integrated throughout all parts of the city, and which supports biodiversity and watershed health while also enhancing the character of neighbourhoods and creating places for activity, enjoyment and relaxation. The goals and actions established in the plan provide a focus for the City's urban forest program planning initiatives such as the Downtown Public Realm and Streetscape Standards.

BICYCLE NETWORK MASTER PLAN

Victoria is implementing a network of separated bike paths as part of the implementation of the Bicycle Network Master Plan, which, when complete, will provide over twenty-four kilometres of All Ages and Abilities bicycle infrastructure. When complete, the new active transportation network will encourage people of all skill levels to ride, skate and rollerblade throughout the Capital City.

HARBOUR PATHWAY MASTER PLAN

David Foster Harbour Pathway is enivisoned to be a waterfront route that connects residents and visitors with key destinations in the City, from award-winning restaurants to marine-based tourism activities, and everything in between. The Harbour Pathway celebrates the City of Victoria's unique working harbour, gives the opportunity to recognize Lekwungen First Nations history, enhances the natural marine habitat, and supports social and economic well-being. Once complete, the David Foster Harbour Pathway will extend over five kilometres from Rock Bay to Ogden Point. Special sites will be created along the pathway, increasing downtown public spaces, drawing people to the waterfront to gather with friends and family was well as taking in the Capital City's signature community celebrations.

CREATE VICTORIA

As outlined in the Official Community Plan: "the arts and culture are central to social sustainability and attributes of community well-being and quality of life. Culture can be defined as practices and values, heritage and place, the arts, diversity and social history. This plan includes policies for the creative city through the development and regular update of a Cultural Plan, coordination of art in public places initiatives, community public art and events in public space, and support for facilities and access to commercial space. Planning and delivery of arts and cultural programs and spaces will depend on funding and innovative solutions to increase and diversify the future supply of facilities and venues to perform, exhibit, create, work and live". In 2017, the City of Victoria began work on Create Victoria, a five-year Arts and Culture Master Plan that will align ideas, people, and resources around a shared vision and a set of goals, strategies and tactics to realize Victoria's potential and guide investment.

ART IN PUBLIC PLACES POLICY & GUIDELINES

Art in Public Places is a vital ingredient in the cultural fabric and streetscape of a creative city. The city of Victoria intends to promote the creation and inclusion of works of art in its public buildings and public spaces through the Art in Public Places Policy. The City of Victoria will provide the cultural leadership to guide the evolution of a distinct and vibrant artistic character for civic public places and ensure a visual legacy. Art in Public Places is a vital ingredient in the cultural fabric and streetscape of a creative city. The Art in Public Places Policy commits $150,000 annually to public art which is placed in a reserve fund, ten percent of which is dedicated towards the maintenance of existing art works. As well, exceptional, significant civic construction projects will include public art for up to one percent of the project's construction costs. For these projects, funds can be used to incorporate public art into a project's design, to create a stand-alone piece onsite or for public art at another location. The City of Victoria's Art in Public Places Policy reflects current best practices and creates a broad range of opportunities for citizen participation. The Art in Public Places Policy is revised every five years and will be revised as a part of Create Victoria, a five-year Arts and Culture Master Plan.

HANGING BASKET PROGRAM

The City's hanging basket program was started in 1937 to celebrate the 75th anniversary of the incorporation of the City of Victoria. The annual hanging flower baskets are now a trademark recognized around the world, and an important character defining element of Old Town in the summer. The basket program currently consists of over 1,300 hanging baskets, placed on lamp standards throughout the downtown between June and September each year. The hanging basket program is operated by the Department of Parks, Recreation and Facilities Management.

SEASONAL DECORATION PROGRAM

Over the years, the City has coordinated installation of seasonal decorations for Christmas, Halloween, Chinese New Year and other seasonal celebrations. Design of the program has generally been through joint discussion (and partnership in Centennial Square) with the DVBA, which has also undertaken an annual Christmas decoration program. A review was undertaken in 2014 to determine improvements to the program. Capital and operational budgets have been in place to support purchase of new decorations as well as installation and removal. Development of an updated seasonal decorations program defining objectives, criteria, responsibilities, partnerships and funding is recommended as an action of this plan. To align with Visual Victoria and the Create Victoria Arts and Culture Master Plan, the City of Victoria will develop of a formal process for addressing seasonal banners and decorations to ensure that they are physically attractive, liveable and "user friendly".

BANNER PROGRAM

Over the years, the City has coordinated a banner program in partnership with the DVBA. Art competitions open to the public have been held every two years since the program was initiated approximately twenty years ago. Banners were also introduced for the Christmas program in order to bring daytime colour during daylight shopping hours when lights were not yet on. Neighbourhoods were offered small banner programs to animate their neighbourhood/village centres in 2007 . City banner programs have focused on art, vibrancy and, to some extent, location identity (e.g. Chinatown). Organizations interested in promotion of events, commemorations and NFP fundraising have been directed to the cross-street banner administered by Public Works on Douglas at Pembroke. Commercial advertising is not permitted at any banners sites. Periodically, there is a request for the City to install banners for a national celebration or commemoration (e.g. Veterans, Cultural Capitals) where operational costs may or may not be covered. Development of an updated Banner Program defining objectives, criteria, responsibilities, partnerships and funding is recommended as an action of this plan to ensure that it is physically attractive, liveable and "user friendly".

this page was left blank intentionally

"The word citizen has to do with cities, and the ideal city is organized around citizenship - around participation in public life."

- Rebecca Solnit, Wanderlust: A History of Walking

1.6 DEFINING THE PUBLIC REALM

The public realm includes all exterior social spaces in the city that are generally open and accessible to all people regardless of ownership. These public spaces include streets, lanes, greenways, bridges, squares, plazas, parks, linkages, natural areas, transit hubs, views, and the waterfront. It also incorporates streetscape elements such as street furniture, lighting, public art, and sidewalk treatments.

The public realm requires a network of pedestrian-friendly streets interconnected to great civic spaces such as plazas, squares, greenways, and parks. These spaces become public outdoor rooms that create positive activity between buildings, as well as areas of reflection and reprieve.

The public realm is the city's holistic urban landscape, which cannot be separated from components of the city infrastructure. In addition to great buildings, the public realm is also one of the most memorable aspects in the city for visitors.

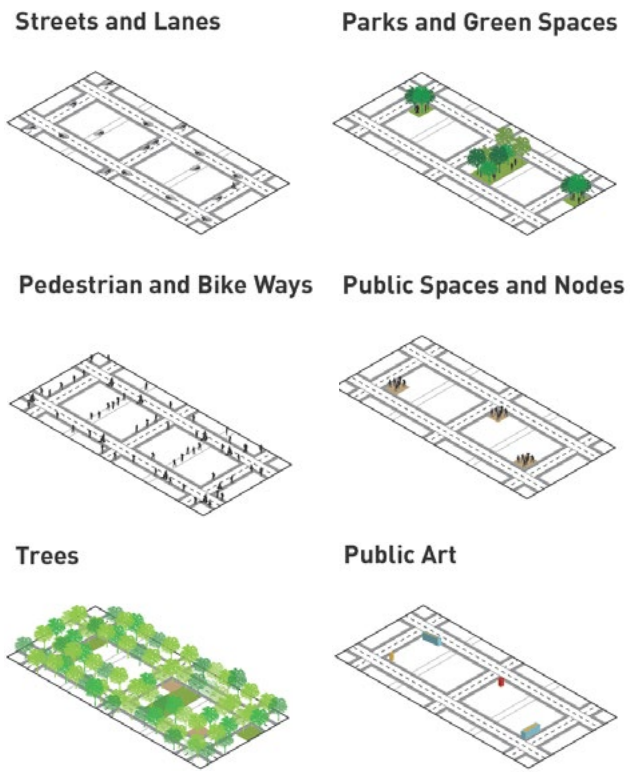


Fig. 4 Components of Public Realm.

The characteristics of a great public realm and great public spaces have been extensively studied and documented across North America and throughout the world. The public realm and public spaces must be constantly blended and woven together in order for cities to be more livable, neighbourhoods more engaging, and communities more memorable.

The public realm includes exterior spaces, linkages and the surrounding built form elements that are visually and physically accessible. Public realm components generally include parks and open spaces, plazas, streets, sidewalks, pathways, transportation hubs, gateways, waterfront areas, natural features, view corridors and the interface between these elements and surrounding buildings.

The overall quality, design and function of the public realm has significant influence on the local quality of life within the urban environment. The public realm provides the places and spaces where people gather, meet, socialize, recreate, shop and work.

The public realm strategy described in this Plan provides a comprehensive and focused approach to build upon the Downtown Core Area's successful history of place-making through public realm improvements that provide:

- Social and active spaces
- Versatile spaces that benefit all ages
- Meaningful and pedestrian-friendly connections
- Distinctive places that strengthen local identity
- High quality and attractive places
- Public amenities that are attractive and functional

1.6.1 IMPORTANCE OF THE PUBLIC REALM

A high quality public realm is essential to achieving an attractive neighbourhood experience at the human scale. It can encourage people to use sustainable transportation modes - walking, cycling, transit - by offering improved connections between places, and making those connections into memorable spaces as well. It can nurture community by providing gathering spaces that are appealing and functional. The public realm plays an important role in enhancing the quality of life in a community which, in turn, can improve its desirability as a place to live and work.

To achieve these benefits, the Public Realm Plan outlines a comprehensive and strategic approach to how the public realm is developed, enhanced and maintained.

1.6.2 STREETS AS PUBLIC SPACES

Collectively, streets make up the largest public space in most cities. The way in which people and vehicles move through the street network have a significant impact on the overall experience of a city's public realm. The first step in making cities safer and more pleasant places to live is to inspire residents to view their streets as public spaces. Long-term planning as well as inexpensive tactical transformation strategies can be powerful tools to encourage public participation and improve quality of life.

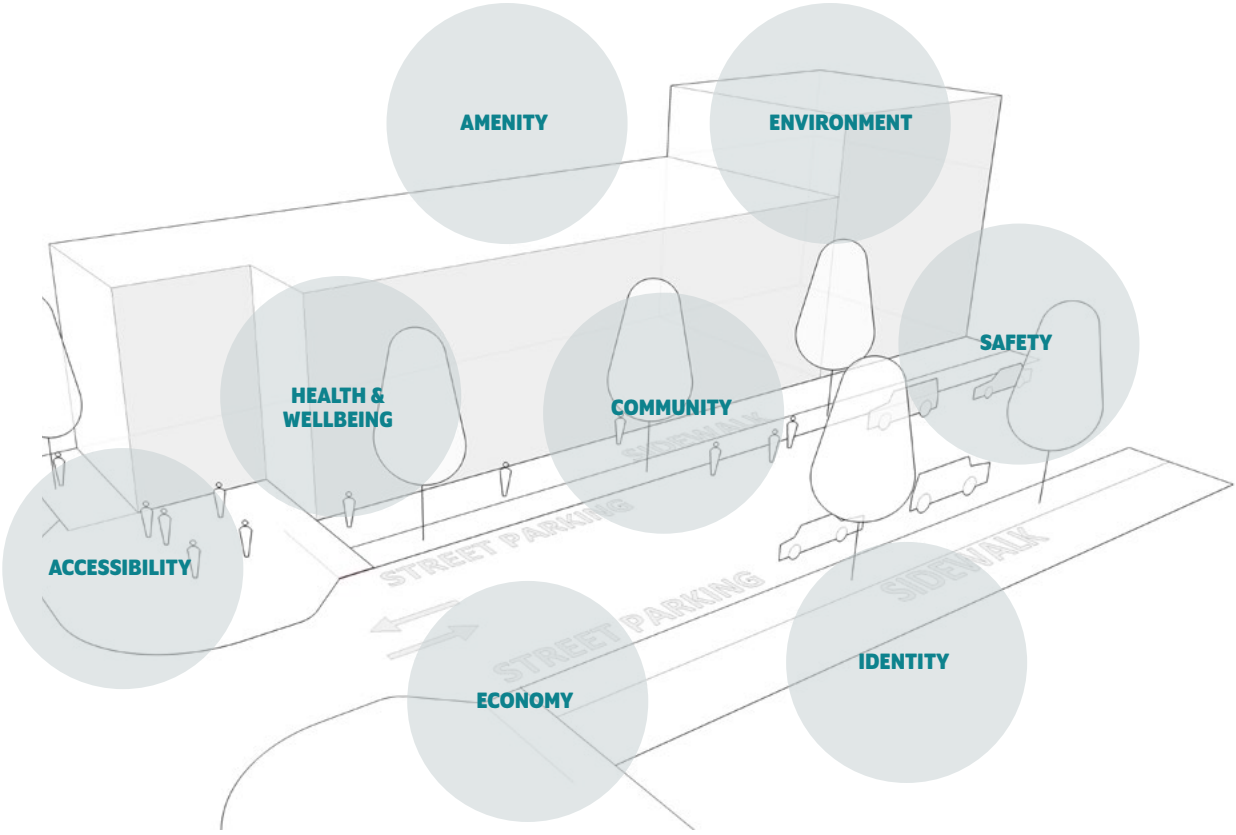


Fig. 5 Benefits of public realm come from excellent design and thoughfull programminng.

1.6.3 BEST PRACTICES

The Downtown Core Area will offer an array of vibrant urban neighbourhoods surrounding a thriving, pedestrian-friendly Downtown Core. All people will benefit from a high quality public and private environment and a broad range of employment, housing, shopping, and recreational opportunities, all within a well-connected and attractive urban environment that embraces the Victoria Harbour, celebrates its heritage, Victoria's role as the Provincial Capital and provides a model for livable and sustainable urbanism.

BEST PRACTICES

Identity of Place
Create public spaces with authentic character and identity.

Diversity of Use
Provide a mix of varied public spaces to support the diversity and uniqueness of the precincts and to meet the needs of current and future populations.

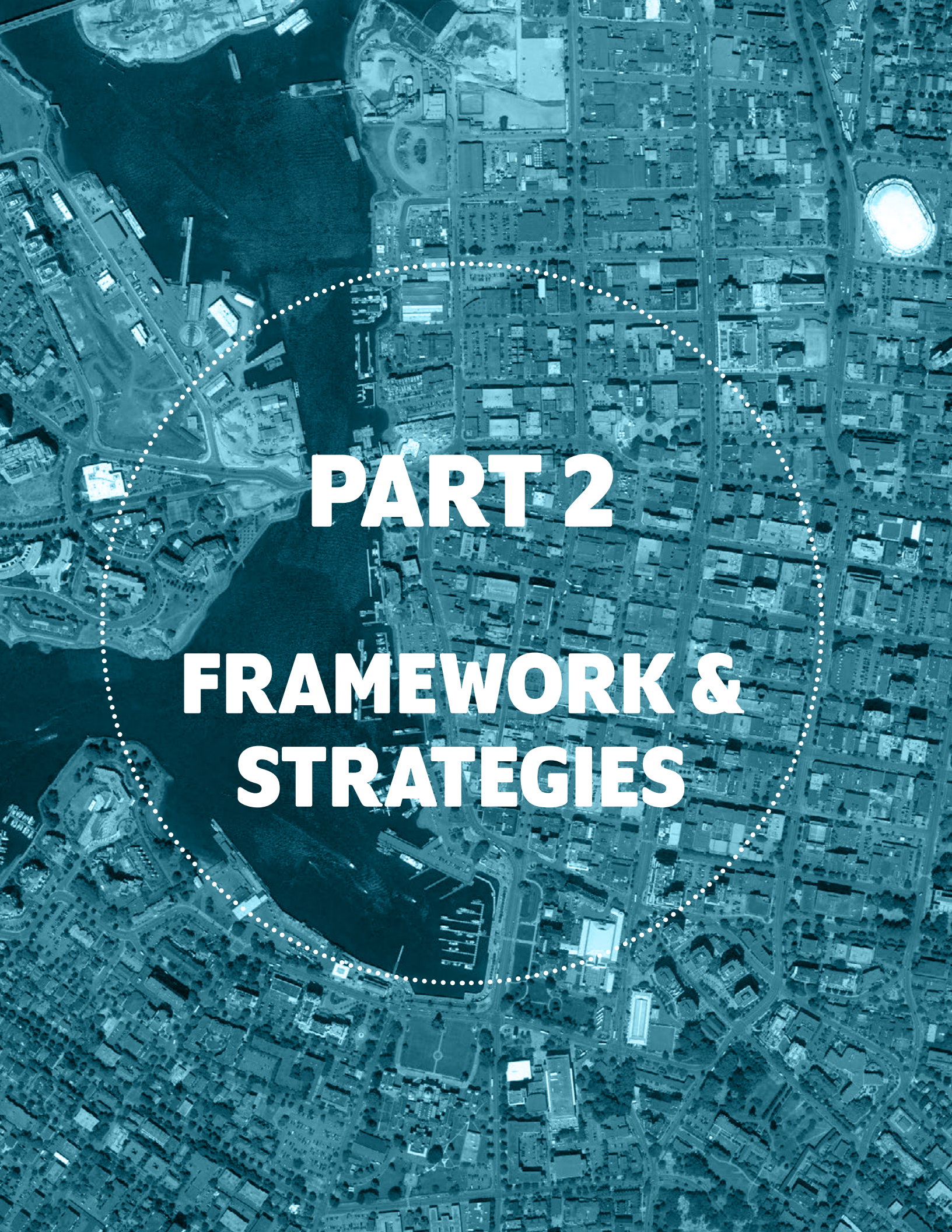
Community Focus
Ensure public spaces engage the local community and contribute to community health and wellbeing.

Sustainability
Design a public realm that improves environmental, material, financial and social sustainability.

Interfaces
Provide diverse and engaging building interfaces with streets, waterfronts and public space, attracting daily activities and enriching street life.

Accessibility
Incorporate universally accessible design into the public realm to allow barrier-free access.

Connectivity
Ensure permeability and safe linkages within Downtown by enhancing unique network of lanes and passages.



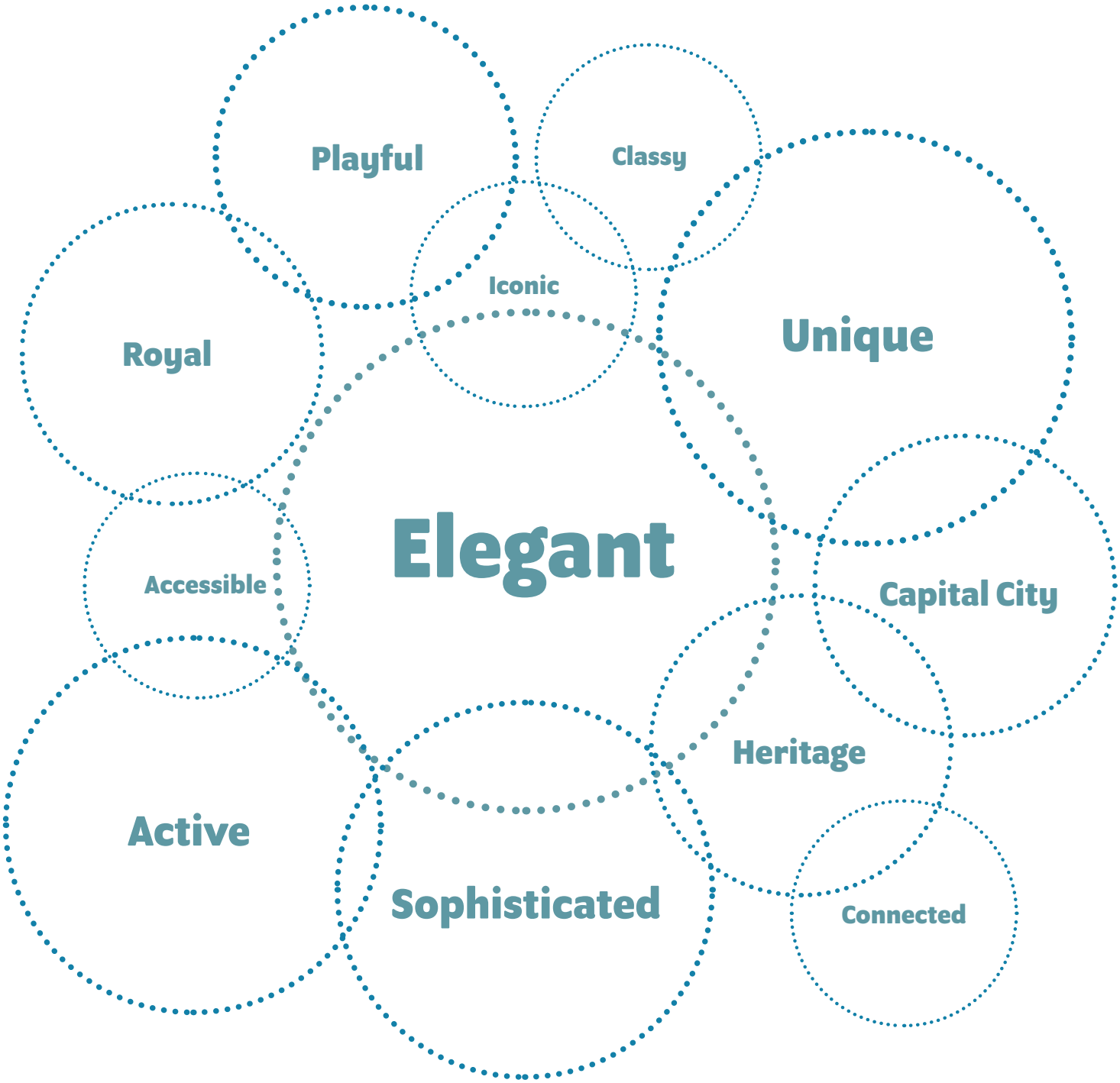
PART 2

FRAMEWORK & STRATEGIES

2 DESIGN FRAMEWORK & STRATEGIES

2.1 VISION STATEMENT

"The Downtown Public Realm will be a vibrant, well connected network of public spaces — from the outdoor shopping experience of Government Street and Douglas Street to small, intimate alleyways allowing for a sense of discovery. The simplified but sophisticated materials palette and unique selection of furnishing and street elements for each of the character areas creates a coherent and elegant environment that complements the rich heritage character of Downtown streets."

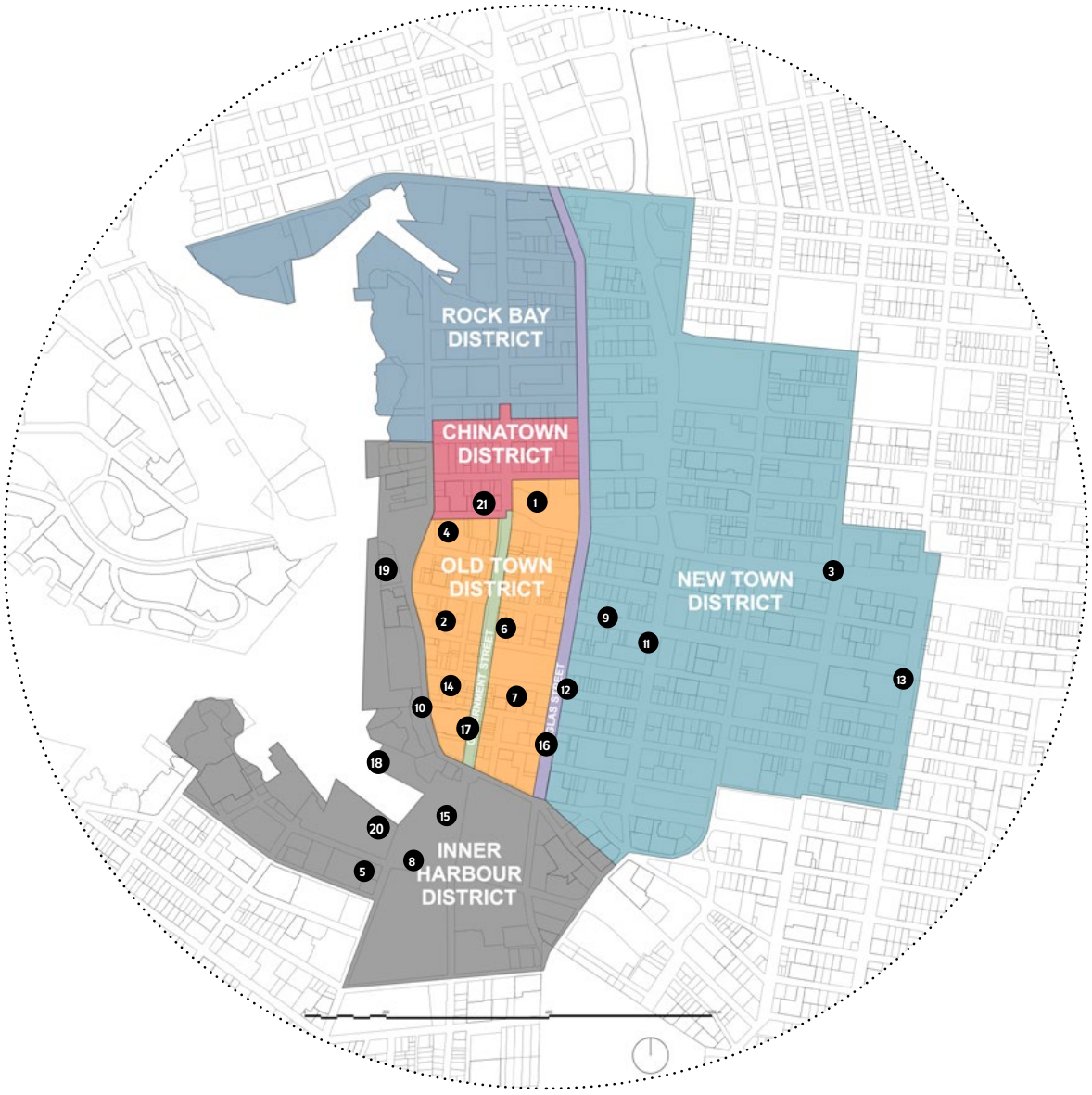


"A city is not an accident but the result of coherent visions and aims."

- Leon Krier, The Architecture of Community

2.2 DESIGN FRAMEWORK

This plan structures the downtown public realm into five distinctive character precincts: Rock Bay, Chinatown, Old Town, New Town, Inner Harbour, and two character streets: Government Street and Douglas Street. In addition, there are a number of considerations for various key public spaces in the downtown Victoria area, as listed below.



Key Public Spaces

1. Centennial Square
2. Bastion Square
3. Pandora Green
4. Market Square
5. Confederation Fountain
6. Trounce Alley
7. Broad Street
8. Belleville Street
9. Yates Street / 700 Block Yates
10. Wharf Street Esplanade
11. 800-1800 Block Blanshard Street
12. 700-800 Block Fort Street
13. Cook Street
14. Langley Street
15. Inner Harbour Causeway
16. Douglas Street
17. Government Street Mall
18. Ship Point
19. Reeson Park
20. The Legislature
21. Fan Tan Alley

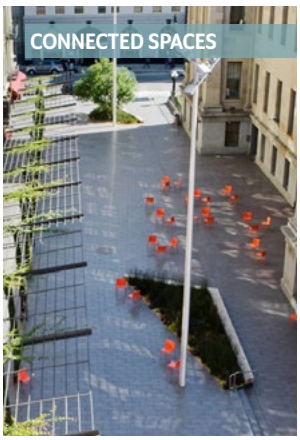
Fig. 6 Design Framework

"Cities have the capability of providing something for everybody, only because, and only when, they are created by everybody."

- Jane Jacobs, The Death and Life of Great American Cities

2.3 PUBLIC REALM STRATEGIES

The following Design Principles are premised on supporting the creation of a memorable and positive image of Victoria based on its rich history and vision for the future, while enhancing its unique identity and supporting vitality, accessibility and usability. These principles were established through public and stakeholder engagement that occurred as part of the Visual Victoria process, and are elaborated on as a set of strategies in the following pages.



Simplify
The diversity, "busy-ness" and lack of continuity of materials, furnishing, signs and colours is cluttered and haphazard. There is an opportunity to create a more simplified palette, or a 'quiet canvas', that provides an unfettered backdrop for the rich built environment and diversity of storefronts and activities that define Victoria's Downtown, as well as provide wayfinding clarity.

Activate
Lack of programming and activity results in poorly used and unwelcoming public spaces in some instances, for example, Centennial Square and the waterfront.

Slow Down
Downtown as a place where life can slow to a human walking pace, where people can mingle without fear of motor vehicles and access is possible for the widest spectrum of the population. Create wayfinding focused on pedestrians, cyclists and transit users with maps and signs which are readable by everyone.

Connect
The network of alleys, mid-block passageways, plazas, waterfront pathway and other pedestrian open-spaces can be better linked to create a connected whole. This would create an alternative network to complement the more central and busier promenades such as Government, Douglas and Yates Streets. Develop a wayfinding program that connects with existing systems to create a larger network.

Prioritize
Centennial Square is an important civic and public gathering space that was identified as a priority for improvement,including programming for activities throughout the year. It should not be just for special events. More play elements and features would attract children and families.

Respect and Celebrate Context and History
Ensure street furnishing, materials, colours and signs enhance, rather than detract from the Downtown's rich and diverse architectural heritage. Respect and honour First Nations past and present though place naming, signage and public art.

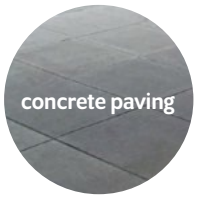
Play
Play can be introduced to city streets and public spaces with playful elements that invite all generations to explore and discover play in an urban environment. From small temporary interventions to permanent displays.

2.3.1 MAKING THINGS SIMPLE

The rich and varied architecture of Old Town, Chinatown and other Downtown precincts, as well as the eclectic and diverse mix of building facades and businesses, define the strong and unique character and identity of the Downtown area. A simplified and higher quality palette of streetscape elements will provide a 'quite canvas' and allow the rich architectural heritage and diversity of storefronts and activities that define Victoria's Downtown to shine.

USE FEWER BUT HIGH QUALITY MATERIALS

A mix of only four key paving materials in different proportions throughout the Downtown will simplify but allow for diversity. Proposed materials allow for a variety of finishes and sizes to ensure accessibility and to accommodate various user groups. Proposed construction details will also improve settlement differences to ensure unified and even surface.



tactile button

RICH HERITAGE MATERIALS
Brick is a heritage material already present within Downtown with a rich and sophisticated quality. It is used in the character precincts with significant heritage value.

HIGH QUALITY FEATURE MATERIALS
Stones are utilized as a feature visual element in the streetscape. The stone has a timeless, sophisticated and elegant quality. The proposed material maintains a continuous, even and uniform surface for increased accessibility.

Concrete unit pavers are also considered to be a feature visual element. These standardized pavers provide a comfortable pedestrian setting and easy accessibility for all user groups.

SIMPLE SIDEWALK MATERIALS
Concrete paving is practical and provides a uniform and even surface that allows accessibility to various user groups. They are used throughout sidewalk areas to maintain a comfortable and safe pedestrian environment.

IMPROVED CONSTRUCTION DETAILS
These materials are installed using a flexible mortar set that can accomplish a smooth finish with an even surface. Furthermore, elements such as tactile buttons and bollards provide additional safety for various user groups.

VISIBLE TACTILE BUTTONS
High quality stainless steel tactile buttons provide high contrast, yet elegant demarcation of all areas that require attention, creating safer and easier to navigate streetscape.

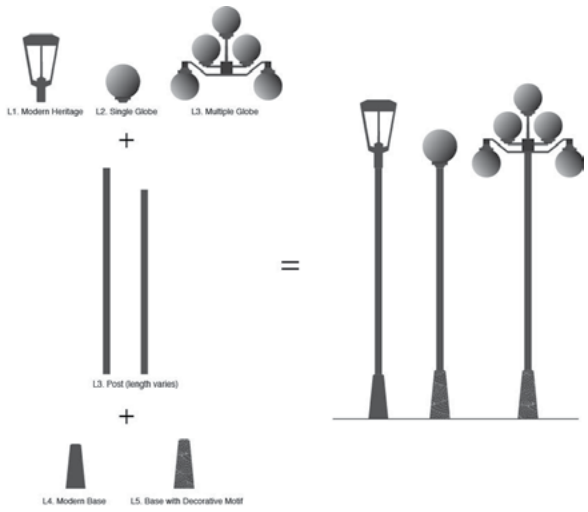
FEWER STANDARD ELEMENTS

Maintaining furnishing unique and iconic to Victoria and focusing them in specific character precincts, while reducing the number of standard elements in the downtown overall, will create a more simplified and focused palette of materials. This will help create a more cohesive and unified streetscape, better distinguish different character precincts and minimize maintenance costs over the long term.

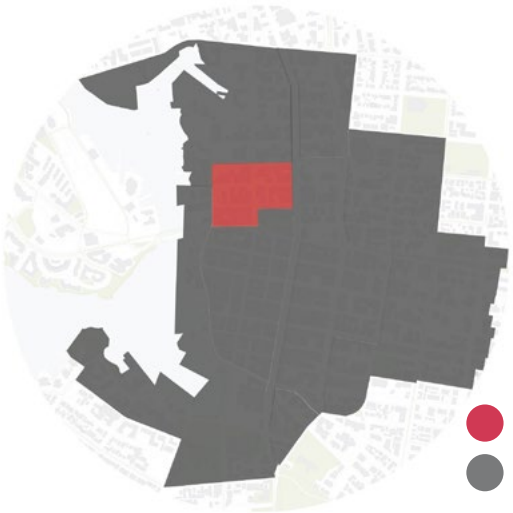
LIGHT STANDARDS

The Globe Light is an iconic element in Downtown Victoria, in particular Old Town and the Legislative Precinct. To enhance the character and identity of these two unique and identifiable areas, the use of Globe Lights will be focused only in the Old Town and Legislative Precincts.

In the New Town and Rock Bay precincts, a new "modern heritage" style lamp standard will be used to complement the mix of more contemporary architectural styles and create contrast with the Old Town and Chinatown heritage precincts. It will also help create a robust long term strategy to minimize maintenance costs.



COLOUR PALETTES



Chinatown Colour Palette

Downtown Colour Palette

UNIFIED COLOUR - GLOSSY BLACK

To unify and simplify downtown streetscape elements with a colour that is timeless and fits well with the heritage architectural fabric of Downtown, glossy black will be applied to all streetscape elements in the Downtown with the exception for Chinatown, which will remain red.

This includes the metal components of all benches, light poles, trash bins, bike racks, and bollards.

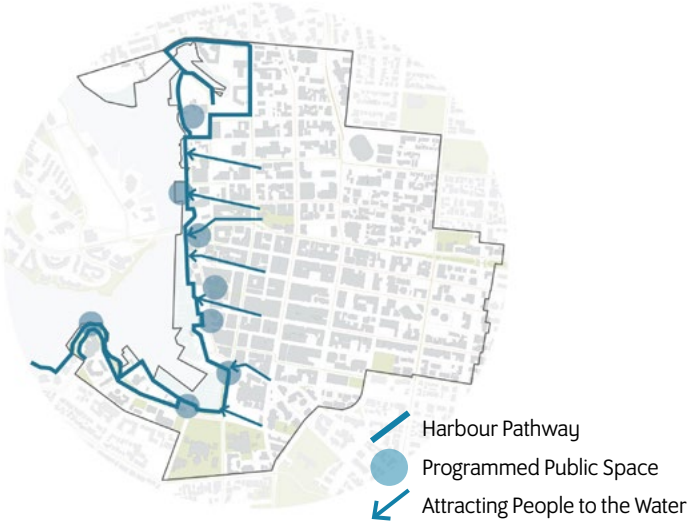
CHINATOWN UNIQUE

Chinatown is a Heritage Conservation Area, a National Historic Site and Canada's oldest Chinatown. It has a well-established and unique character defined in part by its streetscape elements. These include custom street lamps, red painted streetscape components, varied and unique street trees, catenary lighting on Fisgard, the symbolic sidewalk brick and paving pattern, and the Chinatown gate and lion statues on Fisgard at Government. These established streetscape elements will be maintained and expanded within Chinatown.

2.3.2 ACTIVATE THE WATERFRONT

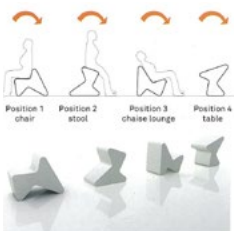
As a working harbour with an industrial past, the Downtown waterfront has been an important component of the City's economy and identity. In recent years, the industrial activities have subsided and the Downtown waterfront area is in a state of transition. While there are pockets of activity along the Downtown inner harbour, specifically along the Lower Causeway and at Ship Point when there are events and festivals, other sections of the Downtown waterfront have limited activity and connectivity to the Downtown.

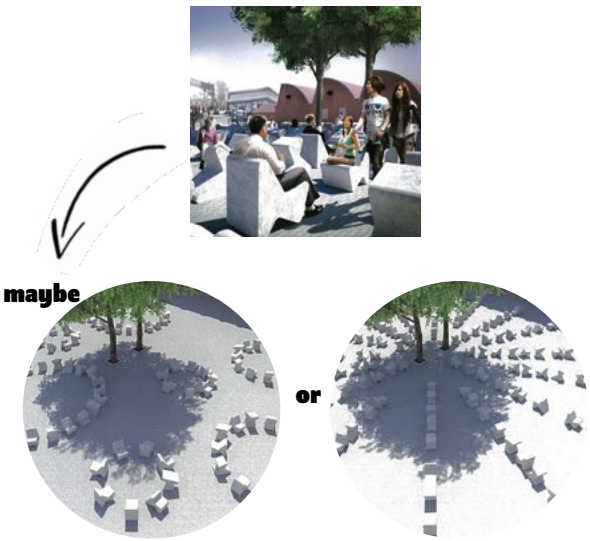
The Harbour Pathway is an important initiative that will help address this issue. Once complete, it will connect Rock Bay to Ogden Point through the Downtown along the Inner Harbour. A further opportunity to help activate the waterfront will be to program various activities along the Harbour Pathway that engage people of all ages and fit with the urban surroundings. Examples include bocce ball and lawn chess, shipping container cafés with patios, interactive public art, etc. In addition to activating the pathway along the water, programmed activities will draw people to the waterfront from all parts of Downtown, thus strengthening the urban fabric in the entire area. Following are some initial strategies for activating and unifying the waterfront.



REVEAL PROGRAMMING OPPORTUNITIES BY USE OF MODULAR + REMOVABLE STRUCTURES

- Flexible elements to accommodate people of all ages.
- Start with temporary interventions that can lead to the development of more permanent interventions over time.





PUBLIC ART TO UNIFY AND ENHANCE THE WATERFRONT

Public art can be used as a unifying element along the waterfront to help create a more cohesive, unified and enhanced public waterfront and Harbour Pathway through the downtown that will potentially extend along the entire Harbour Pathway. The City will undertake a Waterfront Public Art Strategy to supplement the Harbour Pathway initiative to define elements, components and implementation requirements that can help create a more cohesive, unified and enhanced public waterfront.

» As part of the exhibition "Please Touch the Art", Jeppe Hein reinvented the form of the park bench, and turned them into a series of witty and interactive sculptures to engage and be enjoyed by park users of all ages!

2.3.3 ENERGIZE OPEN SPACES

Plazas and open spaces are the defining elements of the public realm. Clear pedestrian linkages between open spaces draw people from one to the next and contribute to a sense of spatial cohesion throughout the city.

Locations such as Reeson Park, Ship Point, Belleville Street / Green, Centennial Square, Menzies Plaza and Laurel Point should be re-activated and re-animated with a myriad of diverse programming to help form a cohesive vision including interactive public art opportunities.

LEGEND

- Primary Open Space
- Secondary Open Space
- Tertiary Open Space

PRIMARY OPEN SPACE

1 **Centennial Square**
Activation of Centennial Square.

2 **Bastion Square**
Pop-up fair / temporary interactive installations.

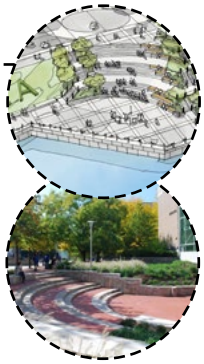
3 **Ship Point**
A world class waterfront park and signature festivals and events venue, and programming for passive and active uses year round as a key City public open space destination.

SECONDARY OPEN SPACE

4 **Reeson Park**
Movable furniture and playable/ interactive public art on the sloping lawn.

5 **Laurel Point**
Art installations.

6 **Belleville/Menzies Plaza**
A terraced plaza with an amphitheater design to support connectivity and activity.



2.3.4 DISCOVER THE SECRET THREAD

Creating a sense of comfort, curiosity, and excitement for pedestrians means giving them increased choices–where to walk, where to pause, where to sit down, how to engage, when to interact, when to play.

The network of alleyways and mid-block connections is a unique and interesting feature that adds an element of surprise and sense of adventure to the Downtown urban fabric and provides alternate routes to the busier street network. Creating better connections and recognition of the network of alleys and mid-block connections within the larger open space network will enhance its legibility and attractiveness. Further, programming these spaces with art and activities will make them more vibrant and interesting places to be.

Weaving Pedestrian Prioritized Network into the City

Pedestrian Network

Central Corridors as Pedestrian Prioritized Promenades

FROM INVISIBLE TO SPECIAL - A LAYERED APPROACH

A layered approach is combined with a phasing strategy–starting with temporary interventions of wayfinding and recognizable branding, followed by incremental changes towards diversified programming opportunities and uses.

1. VISUALLY CONNECTED

The intent is to create a physical guide to connect and recognized the laneway network within Downtown.

This can be done in a number of ways:

- Use of temporary and permanent street paint of a ground plane, murals on the vertical walls.
- Installation of vertical wayfinding elements and plaques
- Use of unique materials, special pavers and colour to demarcate laneway entry points at street crossings
- Use of interesting and artistic patterns such as footsteps, a continuous graphic line or other graphic patterns in the alleyways as well as at crossing zones

2. DIVERSIFIED BY PROGRAMMING + USE

The intent is to recognize and highlight the existence of the laneway network and bring new life and energy to these narrow and interesting spaces.

This can be achieved by:

- Allowing sidewalk cafés
- Providing financial incentives
- Providing art and culture programming such as festivals, musical performances, art installations
- Providing permits for "legal street art"
- Creating an art program that pairs several artists each year with laneways to create temporary artwork

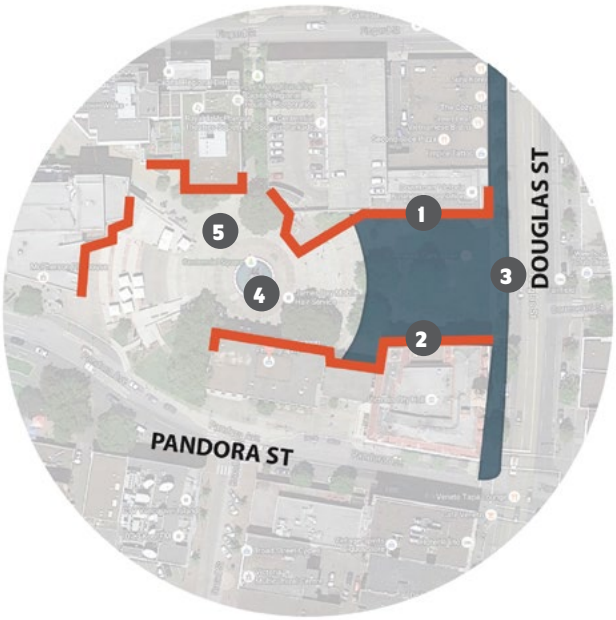
2.4 PRIORITY PUBLIC REALM IMPROVEMENTS

2.4.1 ENERGIZE CENTENNIAL SQUARE

Centennial Square is the City's main civic, ceremonial and recreational plaza and serves as a venue for a number of different types of events and large public gatherings ranging from protests to honouring ceremonies, from demonstrations and displays of public art to theatre performances, and from music and cultural festivals to local markets. Centennial Square was constructed in the 1960s as part of a major initiative to preserve, restore and revive downtown Victoria, and to celebrate the 100th anniversary of the incorporation of the City of Victoria. A major renovation to the south west corner of the plaza was completed in 2009. Centennial Square is surrounded by both modern and historic structures, including historic City Hall constructed in 1891, and features a fountain incorporating a balustrade rim and mosaic concrete totems, which serve as a focal point to the plaza.

Today, outside of when there are events and festivals, activity in the square is lacking. Further, infrastructure in the square, including the fountain, some of the surface treatments, and parkade structure, is aging and in need of major maintenance and repairs.

As part of the Visual Victoria process, Centennial Square was identified as a priority public space for significant improvement and refresh, specifically to activate and energize the square, provide support for major events and festivals and better connect to the adjacent street network/open space context. Over the short term, this could be accomplished by updating and refreshing surface treatments, and programming the plaza to have more 'sticky edges' (active edges that draw people into the square and make them want to stay). This could also include incorporating strategies to create stronger visual and physical connections to the adjacent streets and open spaces, and strategies to open up the plaza and create a more open, continuous and usable open space to support the plaza as the City's major events, festivals and cultural space.



LONG TERM CHANGE BEGINNING WITH TEMPORARY INTERVENTIONS.

Over the long term, this could include redevelopment of the aging parkade structure into a new mixed-use building that incorporates active ground floor uses with a potential mix of civic, institutional, and cultural/community uses above, and an underground parking structure below.

Both short and long term strategies would be explored and committed to as part of a Master Planning process for Centennial Square, which is a key recommended action of this Plan. Below is a summary of potential strategies to explore as part of a future master planning process for Centennial Square to create a more continuous, integrated, and vibrant civic environment.

1. **Create 'sticky edges' with new building development**
   Increasing ground-level commercial and café /restaurant space will transform the square around the clock.

2. **Create 'sticky edges' with temporary installations or activities**
   Temporary café kiosks or food trucks can build an instant sense of place and become a destination.

3. **Connect to Douglas Street**
   Replacing the grassed area to the east of the square with a hard surface treatment, and incorporating a unique canopy structure that could double as a transit shelter at Douglas, will create stronger visual and physical connections to Douglas and help enliven the space with people.

4. **Incorporate Play Elements**
   Incorporate permanent and temporary elements to help activate the plaza and to make it more inviting and welcoming for children and families.

5. **Use high quality materials**
   Introduce natural stone paving as a key surface material to complement the existing heritage brick in order to enhance the quality of materials befitting the City's main civic square.

2.4.2 GOVERNMENT STREET - SHARED SPACE

With a diversity and concentration of pedestrian oriented shops and services, and as a key pedestrian connection between the legislative precinct through Old Town to Chinatown, Government Street is the Downtown's most prominent pedestrian priority street and one of its signature destination retail high streets. Streetscape improvements emphasizing Government Street's role as pedestrian priority street, including the use of brick pavers, rolled curbs and widened sidewalks, were completed from Wharf Street to Yates Street in the late 1970's.

The Downtown Core Area Plan adopted in 2011 includes a direction to extend the established pedestrian oriented streetscape character from Yates to Pembroke. Further, Government Street is identified to be part of the City's All Ages and Abilities bike network. A number of additional improvements were identified during the Visual Victoria process to be incorporated as a part of further detailed design for this corridor. These include:

- Reconfiguring the intersection of Government Street and Wharf Street to make it more comfortable and accessible for pedestrians, and emphasize it as a key pedestrian gateway and connection point between the Lower Causeway/Legislative Precinct and Old Town.
- Implementing a 'shared street' or whoonerf streetscape design on the new extension between Yates and Pembroke. Specifically, a curb-less streetscape environment with a continuous ground plane and paving materials, and the separation of pedestrian from vehicular space using bollards, bench elements and other streetscape elements and furnishing. Together with temporary and seasonal traffic closures, this design will support the use of Government Street as a linear plaza, and an events and festivals space. This will also increase the use of the corridor a ceremonial street and parade route.
- Exploring the opportunity to incorporate more on-street parking within a shared streetscape environment similar to Broad Street for the existing section between Wharf Street and Yates Street.
- Exploring the opportunity to re-establish two way vehicle travel along Government Street through the Downtown.

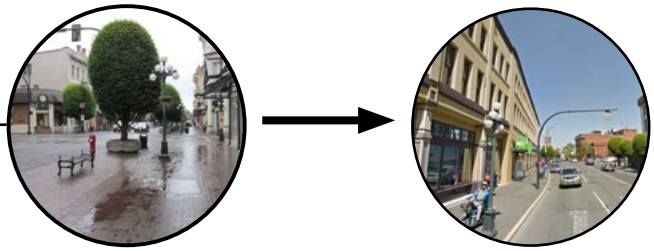
Conceptual and detailed design based on these design directions and strategies will be undertaken as a key action item of this Plan.

As a more immediate, short term action, the street trees and planters between Wharf St and Yates St will be replaced, given their deteriorating condition and the desire to have a more suitable tree species that does not block views of heritage building facades. Street trees and planter types are specified in Part 3 of this document. As a part of this strategy, an irrigation system would also be installed. The tree and planter replacement as well as the irrigation system implementation would occur in stages to minimize impacts to the public realm.

— Potential long term improvements
•••• Temporary interventions/ potential ideas

Complete the street

- Extend existing Government St. treatment and aesthetics between Wharf St. and Yates St. all the way to Pandora Street.



Envision long term change

- Curb-less shared street with multi-modal users freely moving through.

Replace street trees and planters

- Replace existing trees with dense canopy in planters with more transparent canopy trees that will allow the true heritage of Government Street to shine and become more visible.

Encourage sense of shared space

- Allow for temporary road closure to promote pedestrian environment and community building.

2.4.3 DOUGLAS STREET - TRANSIT ORIENTED CORRIDOR

Douglas Street is the City's traditional ceremonial and principal retail 'main' street. It has been a major north-south shopping and transit corridor for the last century. In recent years, its prominence has diminished somewhat as retail activity has shifted and dispersed to other downtown retail streets such as Government Street and Johnson Street as part of the revitalization of Old Town.

As the city's principal transit corridor and key gateway to downtown from the north, and as the transitional street between Old Town and New Town, Douglas Street is the spine of the Downtown and a major defining element of it. As such, the revitalization of Douglas Street as a key downtown promenade and transit priority corridor with its own unique identity is a priority action in this plan.

A substantial reconfiguration of Douglas Street should be undertaken over the long term to enable it to become the envisioned major rapid transit corridor and pedestrian promenade. Within its current configuration, short term streetscape improvements can be made to improve the pedestrian environment while establishing a unique character and identity for this key downtown corridor. Following is a summary of long term strategies and short term improvements to revitalize Douglas Street.

More space for people

- Temporary parklets as waiting zones for transit.
- Visual extension of pedestrian zone into parking areas.

Use temporary interventions to test long term visions

- Temporary street closures for community events.
- Claiming traffic lanes with artful street graphics.
- Extending bus lanes into the Downtown area.
- Using colour and paint to test ideas as part of public art program.

Develop distinct 'kit of parts'

- High quality materials such as concrete unit pavers and stone accents.
- Larger scale pedestrian lights to emphasize the importance and prominence of the street.
- Modern heritage style street and pedestrian lighting unique to Douglas Street.

Uniform street elements

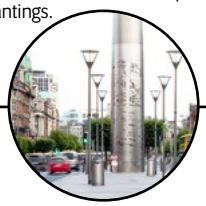
- Glossy black as part of overall Downtown strategy.
- Mix of standard and custom seating options.

Continuous street trees

- Plant trees with transparent canopies that help frame the street and allow high visibility for businesses.

Envision long term change

- Consider central median as a pedestrian/transit oriented zone with bus stops and plantings.



Potential long term improvements

Temporary interventions/Potential pilot ideas

PART 3

STREETSCAPE STANDARDS

3 STREETSCAPE STANDARDS

3.1 INTRO

This Streetscape Standards Section replaces the Downtown Beautification Strategy Manual and associated "kit-of-parts" first published in 1992. As a component of the City's Downtown Plan of that time, the older document initiated an on-going program in the expression of numerous distinctive character precincts in Victoria's city centre.

In the 1992 Beautification Manual, elements of the City's public realm were presented in varying groupings of colour and furnishing suites, intended to underline individual character and to provide contrast for the divergent identities of a variety of Downtown precincts. Over the last few decades, this program of enriched and diverse streetscape development has gradually led to visual clutter and inconsistencies throughout the Downtown area, decreasing the visual quality of Downtown Victoria's streetscapes.

Further, time has weathered the condition of the streetscape and painting program. Elements of the originally envisioned streetscape have not been put in place and some outdated elements are due for replacement. At the same time, Victoria's Downtown Core has expanded and the original character precincts have evolved.

The new Downtown Public Realm and Streetscape Guidelines represents a renewed and simplified palette of materials to help emphasize the existing heritage of built form, stimulate pedestrian interest, and guide orientation based on a the framework of character precincts and streets as shown in figure 7.

Maintenance of this streetscape system will require a re-dedication of efforts as the downtown grows and changes. Moreover, a refashioning of the original Beautification Streetscape Initiative is needed to align this program to a steadily developing expanded Downtown Core.

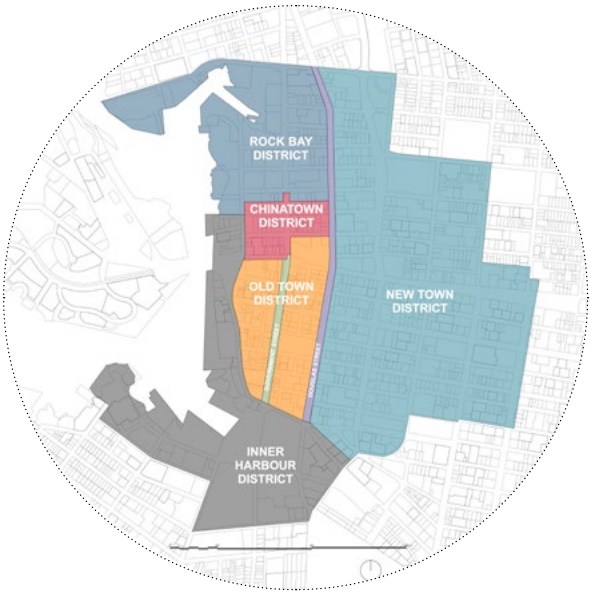


Fig. 7 Character precincts diagram

"Cultures and climates differ all over the world, but people are the same. They'll gather in public if you give them a good place to do it."

- Jan Gehl, People Cities: The Life and Legacy of Jan Gehl

3.2 STREETSCAPE DESIGN PRINCIPLES

The development of the Streetscape Standards for Downtown Victoria has been guided by a clear set of Design Principles that have been established to help achieve the Vision Statement for the Downtown. Design Principles will continue to provide a guiding framework for frontage improvements, capital projects and priority public realm improvements implemented over the years ahead.

District Identity
The Streetscape Standards will seek to reinforce the unique identity of individual character areas within well-defined boundaries of Downtown as a whole. Streetscape designs for each character area will be coordinated to create a unified and cohesive character for the downtown.

Successful Businesses / Multi-Use Streets
Streetscapes will be developed to support successful businesses and allow for a variety of uses such as retail display, outdoor seating, street vendors, festivals, performances, etc.

Pedestrian & Transit Friendly Destination
The public realm design will give priority to the comfort, safety and accessibility of pedestrians, cyclists and transit users over the accommodation and convenience of private vehicles.

Waterfront Connection
The public realm design will physically, visually and thematically reinforce the Downtown's relationship to the waterfront.

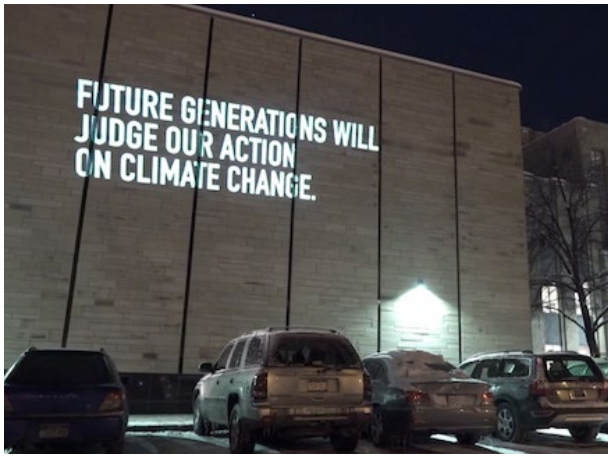
Civic Connection
The development of unique character for Douglas Street and Government Street will reinforce the link between the Municipal Hall Complex and facilities along the waterfront.

Sustainability
The design, implementation and maintenance of the public realm will be socially, economically and environmentally sustainable.

High Quality / Long Life
The Standards will promote design strategies and material choices that will result in easy-to-maintain, durable and high quality streetscapes.

Flexible Implementation
The Standards will allow for implementation through phased and incremental development.

Accessibility
The public realm design will provide for universal accessibility in downtown Victoria through a comprehensive material palette.



A fresh alternative approach with a simplified palette of materials emphasizes Victoria's existing heritage of built form, stimulate pedestrian interest and guide orientation.

3.3 STREETSCAPE STRATEGIES

In order to achieve all the goals and objectives of the Design Principles of the Streetscape Standards, four key strategies have been developed to help focus implementation and application of new developed standards over time.

STRATEGIES

Feature Corner
High quality materials and unique layout design focused on all street corners.

Simplified Sidewalk Treatment
In order to balance high quality corner treatments, sidewalks are designed to be simple and durable with only slight variations of patterns.

High Quality Street Trees
Great and healthy trees contribute to creating great streets. With limitation on green infrastructure in the Downtown core, it is critical to provide a healthy growing environment for all street trees.

Unified Streetscape Elements
Glossy black becomes a streetscape elements standard and the number of already existing elements is being reduced to a minimum.

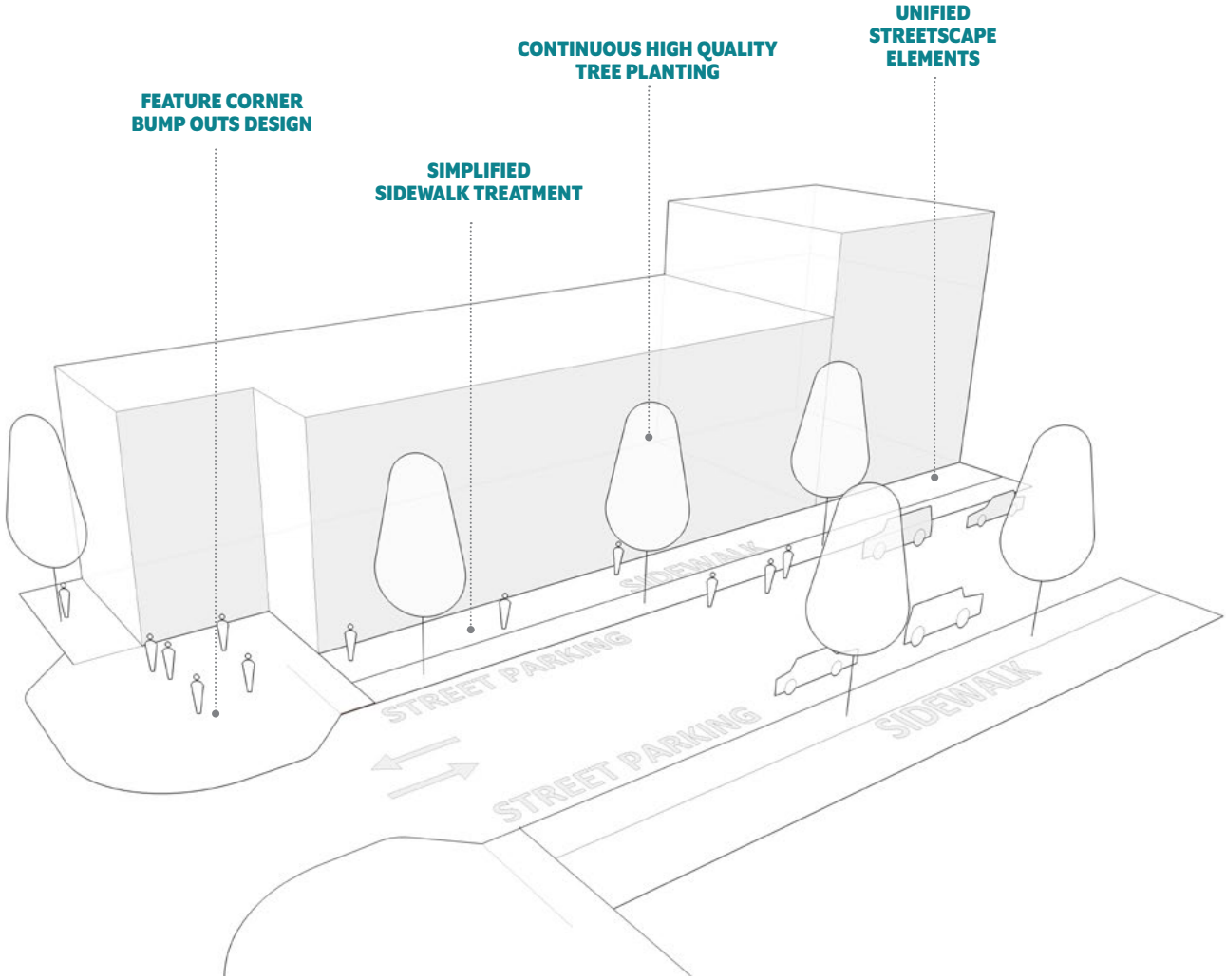


Fig. 8 Streetscape Strategies Diagram

3.3.1 CORNER BUMP OUTS

INTENT

Where traffic movement and the arrangement of adjoining parcels permit, new street corner bump-outs will be developed to provide a range of benefits aimed at improving the pedestrian environment, including:

- Increased room for waiting and circulation.
- Improved sense of pedestrian safety.
- Reduced length of crosswalks.
- Improved connectivity throughout Downtown.

APPLICATION

New bump-outs are proposed at all street corners except in the following situations:

- Where a bump-out already exists.
- Where bus stops occur.
- Where conflicts arise with the arrangement and configuration of the adjoining parcel, such as where existing driveways are in conflict.
- Where conflicts arise with the current road configuration, such as where right turn lanes are in conflict.
- Where it is deemed impractical due to vehicle turning requirements.
- Where other circumstances are deemed to be in conflict.
- Narrower streets of Old Town where a unique street pattern is already established.

TYPICAL BUMP OUT LAYOUT

Zone 1: Uninterrupted walking zone

- Paving material as per Character Area specifications.

Zone 2: Uninterrupted crossing zone

- Tactile stainless steel domes as specified in this document and to be located and installed according to the City of Victoria Subdivision and Servicing By-law.

Zone 3: Outdoor room

- Single chair seating arranged to face one another.
- Where enough room is available, backless wood benches could be used with a chair combination.
- Outdoor rooms should be located along quieter street.

Zone 4: Furniture zone and wayfinding

- Typical furnishing includes: trash bin, bike racks, street light poles, traffic signal poles, pedestrian lighting.
- Wayfinding pilon signs when needed.
- In addition to waste receptacles available, multi-stream receptacles are to be used when appropriate on a case by case basis, as approved by the City of Victoria. See Part 5 Streetscape Catalogue for details and specifications.

Note: Please refer to City of Victoria Wayfinding Strategy for signage details and location guidelines.

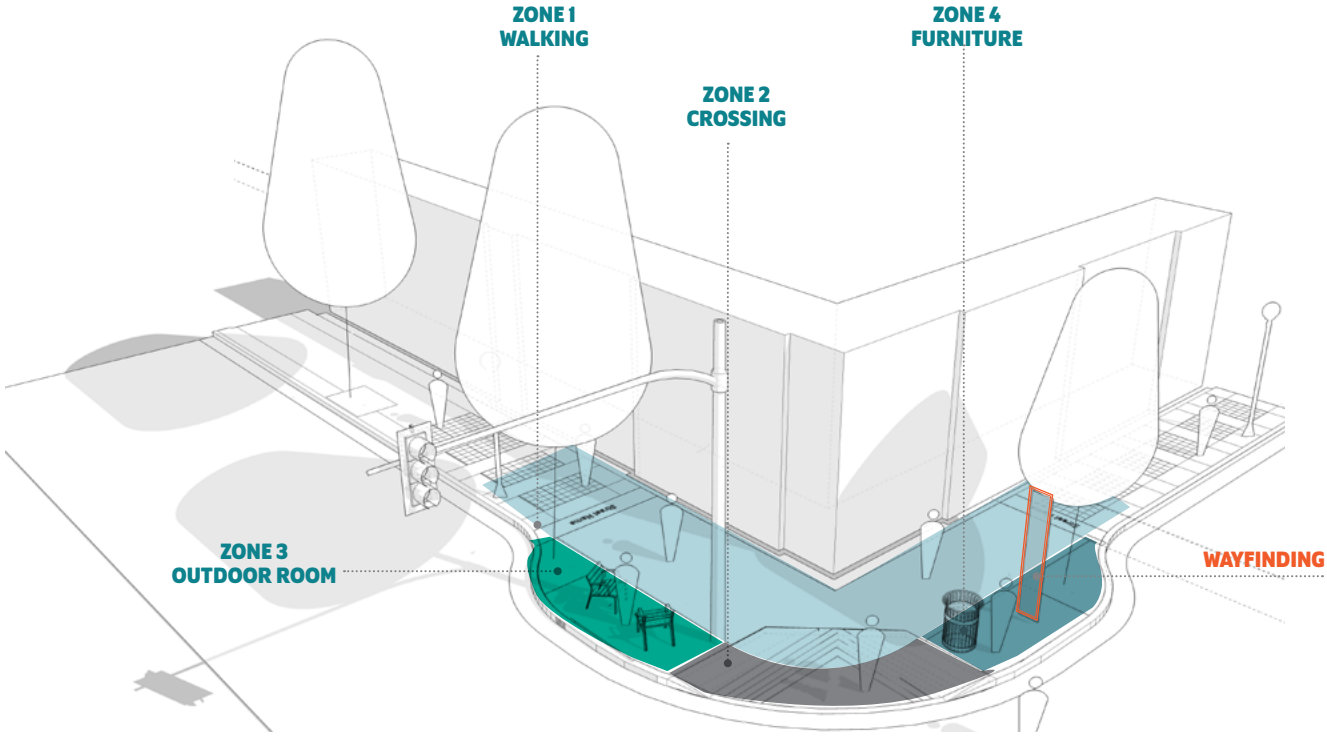


Fig. 9 Typical Bump Out Diagram

SCENARIO 1

Corner with bulges on both sides would include:

- Tree planting at both bulges when possible.
- Outdoor room zone and furnishing zone.
- Feature paving elements: both entry bands, curved feature band.
- Street names at entry bands.
- Bollards at curb's edge.

SCENARIO 2

Corner with bulge on one side would include:

- Tree planting at bulge side.
- Outdoor room zone or furnishing zone at bulge side.
- Feature paving elements: both entry bands, curved feature band.
- Street names at entry bands.
- Bollards at curb's edge.

SCENARIO 3

Corner without bump out would include:

- Feature paving elements: entry bands only.
- Street names at entry bands.
- Only 2 bollards at curb's edge flanking the corner.

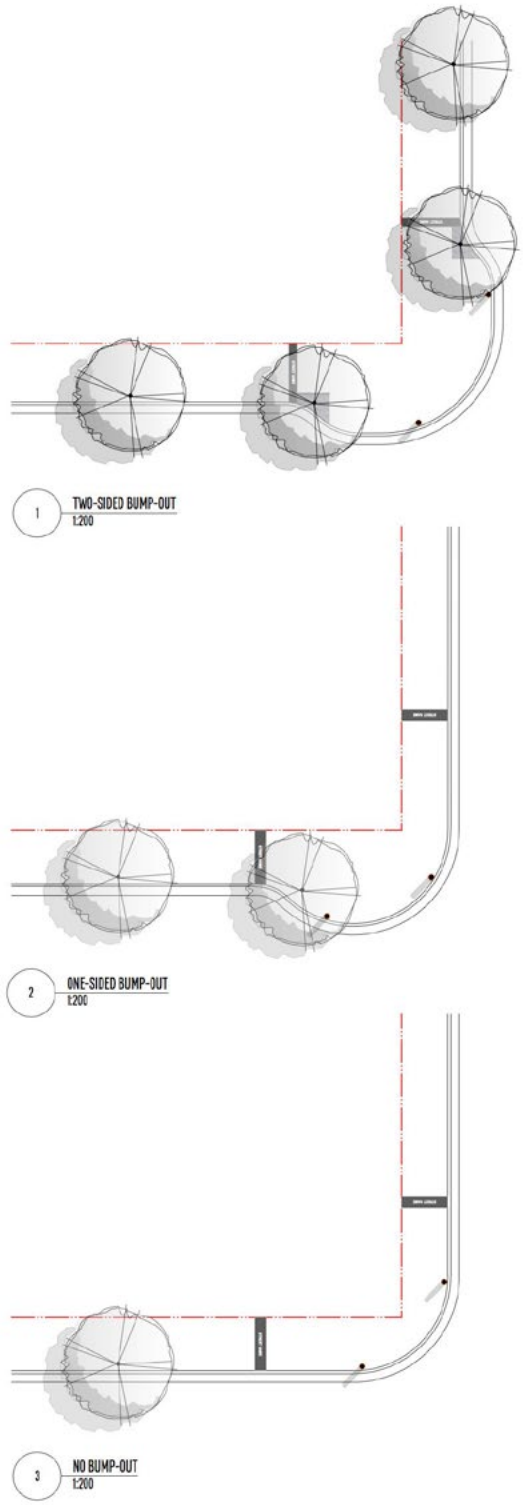


Fig. 10 Bump Out Scenarios

3.3.2 MID-BLOCK BUMP-OUTS AND CROSSINGS

Mid-block crossings are locations of marked crosswalks between intersections. The crosswalk may be signalized or not. They provide convenient locations for pedestrians to cross mid block in areas with infrequent intersection crossings.

INTENT

Where traffic movement and the arrangement of adjoining parcels permit, new street mid-block bump-outs would be developed to provide a range of benefits aimed at improving the pedestrian environment, including:

- Increased opportunity to cross mid-block.
- Increased room for waiting and circulation.
- Improved sense of pedestrian safety.
- Reduced length of crosswalks.
- Improved connectivity throughout Downtown.
- Improved pedestrian priority throughout Downtown.

APPLICATION

New mid-block bump-outs are proposed at all streets locations with all of the following conditions:

- Where parallel parking allocation exists at street edge and can be adopted for bump out mid block.
- Where there is no bus stops.
- Where adjacent building uses allow for sidewalk expansion into the parking zone.
- Where there is a need to reduce the length of the street block for better pedestrian circulation.
- At all locations where lanes meet the City streets if there are no conflicts with vehicular maneuvering.

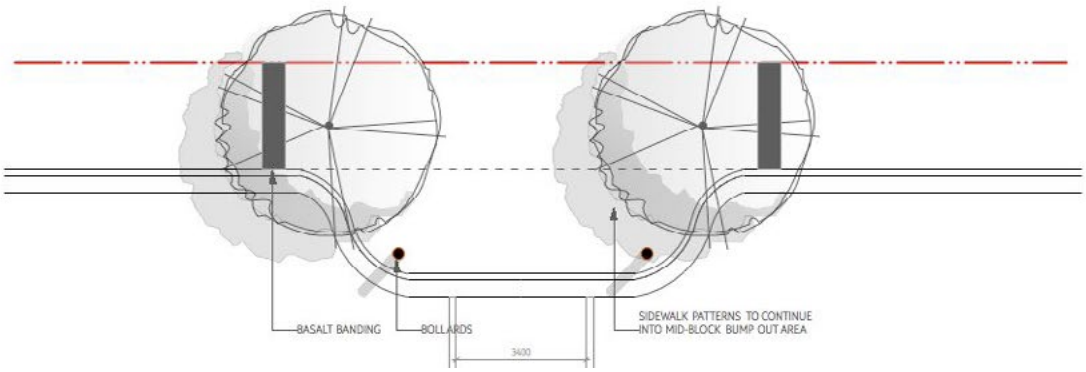


Fig. 11 Mid Block Bump Out Diagram

3.3.3 TREE PLANTING

Street trees are City owned infrastructure and a key component of public streets. The planting of street trees in the Downtown core began in the 1960's. Over time, a number of trees have been removed and new trees have been planted in some locations, resulting in a mix of species and vitality. These streetscape standards aim to improve trees in the Downtown core by adding additional street trees, and provide guidelines for replanting when a tree is removed.

INTENT

The general objectives of the street tree strategy are to:

- Increase the extent of the tree canopy within the Downtown Area.
- Increase the general health and long term success of tree planting.
- Retain existing healthy trees where possible.
- Improve growing conditions of existing trees where possible.
- Provide the best growing conditions possible for new tree plantings.
- Selectively remove and replace unhealthy or unsuitable trees.

New tree planting is proposed to achieve the objectives established in the Urban Forest Master Plan

1. Achieve regularly spaced street trees along all streets to provide visual continuity.
2. Develop and maintain strong community-wide support for the urban forest.
3. Protect, enhance and expand Victoria's urban forest.
4. Design and manage the urban forest to maximize watershed health, biodiversity, and the conservation of sensitive ecosystems.
5. Maximize community benefits from the urban forest in all neighbourhoods.

STREET TREES REQUIREMENTS

New street trees should conform to the City of Victoria Downtown Tree Specifications. All plant material must meet or exceed the 'Canadian Standards for Nursery Stock' set out by the CNLA and BCLNA.

City of Victoria Downtown Tree Specifications:

- Healthy and vigorous standard shade trees.
- True to name, type and form with no substitutions.
- One dominant central leader or single straight trunk.
- The caliper measured at 15 cm above the ground to be 6cm – 8cm.
- Well branched balanced heads.
- Branching must start at between 1.5 – 2.5 m above the ground.
- No crossing or rubbing branches, included bark or other flaws which could affect the tree's long-term health or structure.
- B&B Trees shall be hand or machine dug, placed in wire baskets or wrapped in burlap and secured with ropes (balled and burlapped) in such a way as to not damage the root, crown or trunk.
- Potted Trees shall be free of girdling and/or circling roots from previous pottings.
- With adequate fibrous and absorptive roots developed by the proper cultivation, transplanting and root pruning to enable the full recovery of the tree.
- No more than 2" from the top of the prepared rootball to the root flair.
- Free of all known diseases, insect infestations, defects, sunscald injuries, abrasions and decay.
- No perennial weeds must be contained in the soil root ball or growing media.
- 1 year replacement warranty.

TREE SPECIES AND HARDSCAPE PLANTING SELECTION

Appropriate street tree selection is critical to the overall urban forest management and stormwater management strategies of the City, as well as creating great streets in Victoria Downtown. Ideally, selecting species that are long-lived and can be raised over time to reduce obstructions at the street and sidewalk level is preferable to short-lived trees or small trees that will have minimal impact or presence on the street. Refer to City of Victoria Preferred Tree List for Hardscaped Areas for a list of approved tree species in the Downtown area.

INTENT

- To have long-lived, healthy and large-scaled street trees in Downtown.
- To have street trees that address stormwater management and provide habitat for local fauna.
- To diversify tree species in park areas and within the public realm.
- To increase mature tree canopy size in order to mitigate urban heat island effect.

For tree planting strategies in the Downtown Core, refer to Urban Forest Master Plan.

TREE PLANTING DETAILS

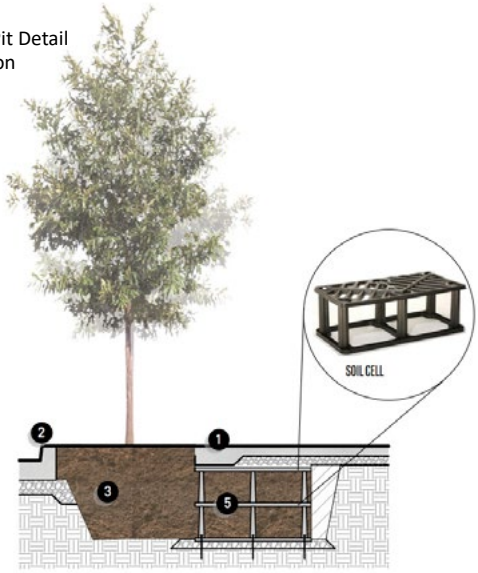
Planting conditions are critical to the success of street trees in urban environments. Soil quality and volume are two aspects that are crucial to the health of street trees. Without either, the life of planted street trees is dramatically reduced and the benefits they bring to the city and neighbourhood diminish in proportion.

The majority of past streetscape improvements and building construction projects provided minimal soil volumes, and often compacted the small volumes of soil which remained. Base compaction of material prevents tree roots from penetrating the native soil below. If the tree pit has minimal soil volume, the tree suffers and cannot reach its natural size. There are a number of measures for improving planting conditions in urban environments that are becoming standard across North America. These affect not only the street tree quality, but also stormwater management, urban forestry, biodiversity, long term maintenance, durability and resilience - all of which support the City of Victoria's sustainability goals.

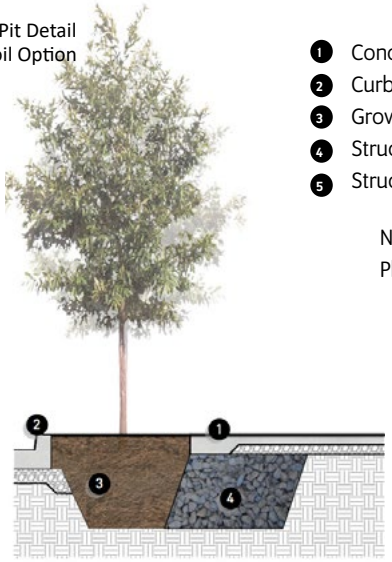
INTENT

- Ensure there is adequate soil / growing medium to produce healthy large scale street trees.
- Ensure there is adequate above ground and below ground space for the species selected.

Typical Tree Pit Detail
Soil Cell Option



Typical Tree Pit Detail
Structural Soil Option



1. Concrete Sidewalk
2. Curb and Gutter
3. Growing Medium
4. Structural Growing Medium
5. Structural Soil Cell

Note: refer to Urban Forest Master Plan for details

Fig. 12 Tree Pit Details

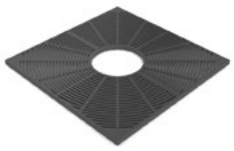
TREE PLACEMENT

The Public Realm Plan proposes a simplified pattern of locating new street tree planting in relations to proposed paving patterns and established boulevard zone.

- All new street trees should be planted in spacing based on the paving pattern provided. See character areas section for detailed guidelines on tree spacing for each zone.
- All street trees should be planted in a tree pit with a 450mm offset from the curb line. See diagram below for details.

For details on Site/Growing Conditions, and Structural Soils requirements, please refer to page 43 and 44 of UFMP document.

SQUARE TREE GRATE



METAL TREE GUARD

Typical Square Tree Grate and Tree Guards to be used in all precincts. For details, please refer to Part 5 Streetscape Catalog.

- Note: Alternative Round Tree Grate option is available when more flexibility is required or Square Tree Grate cannot be accommodated. See Furnishing section of Part 5 Streetscape Catalog for details.

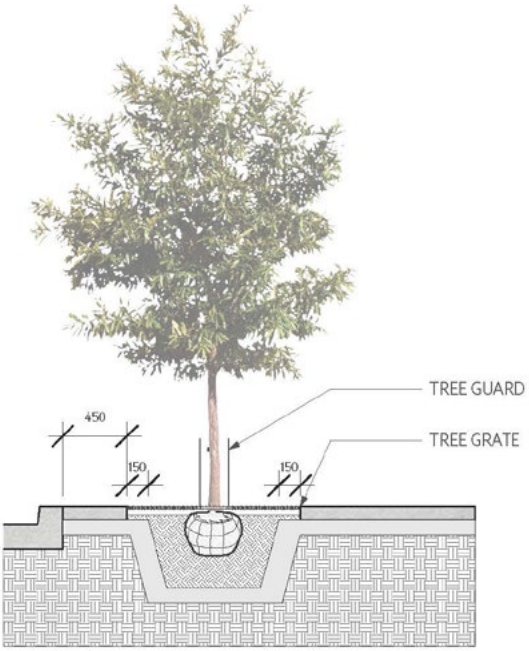


Fig. 13 Tree Grate Detail

TREE RECOMMENDATIONS

The Public Realm Plan proposes a simplified approach to tree selection that is based on general recommendations of:

- Size: large, medium, small
- Form : columnar, rounded, broad
- Canopy coverage: dense, transparent

Following sections of the document specify the key typologies for each Character Area based on these elements. Please refer to Character Areas section for detailed recommendations.

SIZE

LARGE **MEDIUM** **SMALL**

FORM

COLUMNAR **ROUNDED** **BROAD**

CANOPY

DENSE **TRANSPARENT**

Fig. 14 Tree Typologies

5.3.1 SIDEWALK TREATMENTS

INTENT

The Public Realm Plan proposes a palette of simplified paving materials and patterns for all Downtown sidewalks including sand blasted cast-in-place concrete and broom finish concrete. Reducing the number of materials for all sidewalks treatment allows for a more coherent environment:

- Simplified materials.
- Simplified patterns.
- Simplified maintenance and reduced inventory of replacement paver types.
- Improved sense of pedestrian safety.
- Improved surface consistency and quality.
- Improved connectivity across Downtown.
- Increased opportunity to reduce clutter.

Use of concrete as a general sidewalk material with only slight variations in patterns allow for coherency for all of Downtown as well as for Feature Corners to stand out.

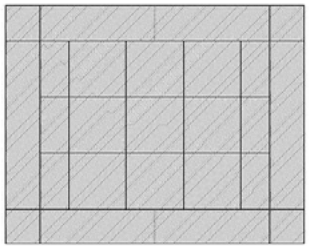
APPLICATION

There are four distinct sidewalk patterns developed that are applied throughout Downtown. All are characterized by common layout elements:

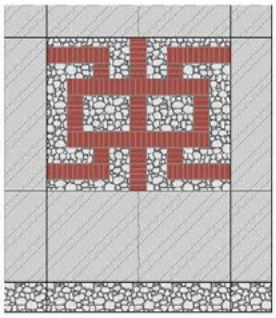
- Fine broomed finished frame.
- Trowel jointing.
- Cast-in-place concrete field with the exception of Chinatown area that carries its own custom brick pattern in an exposed concrete field.
- Note: when sidewalks are narrower than 2 m, simplified concrete treatment with 450mm frame and without any patterning should be applied.

NOTE: The patterns below are only demonstrative of the patterns present in each precinct. For details of paving materials and application, please see section 3.4 Character Areas Section of this document .

OLD TOWN AND INNER HARBOUR PATTERN

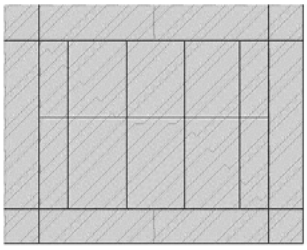


CHINATOWN PATTERN

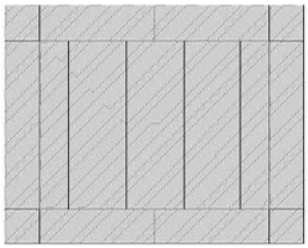


- NOTE: Please refer to section 3.4 Character Area Section for specification of the different Chinatown paving patterns.

NEW TOWN PATTERN



ROCK BAY PATTERN



EXISTING FEATURE PAVING AREAS

There are a number of areas throughout Downtown where special paving treatments exist and differ greatly from new proposed sidewalk patterns for these areas.

Key areas identified are:

1. Broad Street - a unique street with a comprehensive, unique and distinct paving pattern.
2. Yates Street between Douglas St. and Blanchard St. - strong and distinctive brick paving pattern with shades of yellow and burgundy brick.
3. Areas of Old Town such as Wharf Street - large continuous treatments of unique concrete pavers.

Recommendations for those area are as follows:

- Existing paving patterns should be maintained for the foreseeable future.
- When larger area improvement becomes necessary, it is recommended to undertake full block replacement to avoid patchwork approach and piece meal condition.
- New paving system will not be applied unless the entire block face is replaced.

Fig. 15 Sidewalk Treatment Patterns

5.3.2 STREETSCAPE ELEMENTS

INTENT

The Public Realm Plan is premised on decluttering and simplification of the number of streetscape elements and furnishing to create a "quiet canvas' for the heritage and rich architecture. This includes:

- Identifying opportunities to reduce clutter.
- Implementing a unified palette of furnishing and materials while distinguishing a reduced number of unique character precincts.
- Implementing a unified colour palette.
- Improving the sense of pedestrian comfort and safety.
- Improving the quality of materials.
- Creating a unique style and character for Downtown as a whole.

APPLICATION

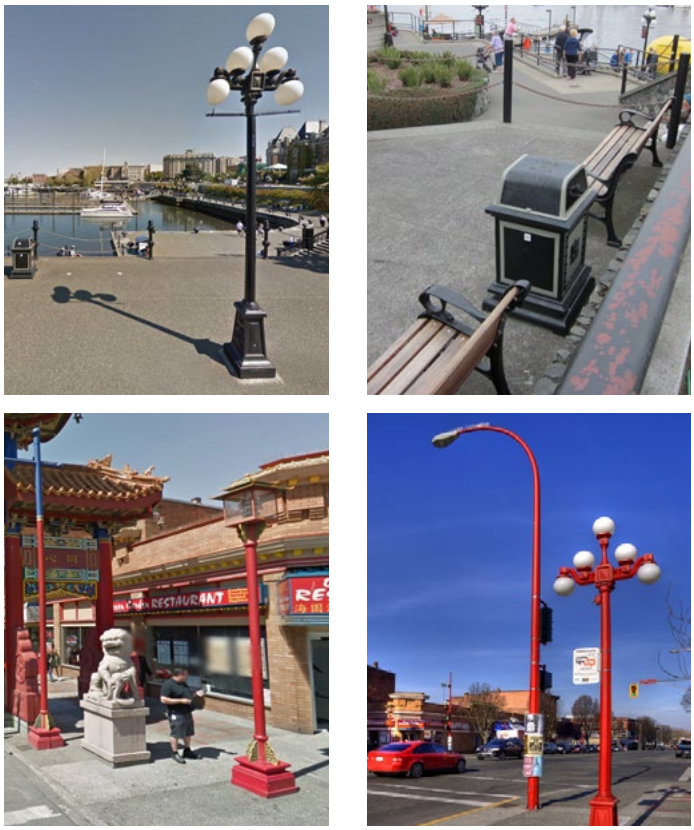
A simplified palette of furnishing and street lights will be applied to all areas in Downtown.

KEY STRATEGIES

- Use of glossy black as unifying colour.
- Removal of all unnecessary elements not specified in this guideline.
- Use only furnishing specified in this document.
- Establish a defined boulevard/furnishing zone to locate site furnishing and maintain a sufficient pedestrian zone.
- Focus on street corners.

FURNISHING PLACEMENT - BOULEVARD ZONE

- All streetscape elements must be located within the 1.2 m boulevard zone of the sidewalks to allow uninterrupted sidewalk walking zone clear of elements.
- With sidewalks narrower than 2m, all elements shall be placed as close to the curb line as possible.
- In addition to waste receptacles available, multi-stream receptacles are to be used when appropriate on a case by case basis, as approved by the City of Victoria. See Part 5 Streetscape Catalogue for details and specifications.



Examples of established furniture palette in Downtown

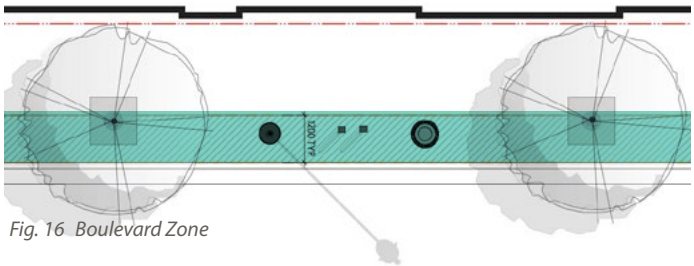


Fig. 16 Boulevard Zone

5.3.3 ACCESSIBILITY

INTENT

The Public Realm Plan proposes a materials palette that will facilitate barrier-free universal accessibility throughout Victoria's downtown public realm.

- Create a barrier-free universally accessible environment within the downtown Victoria public realm.
- Use long-lasting, quality materials that are easily accessible and promote safety for all ages and abilities.
- Implement pilot projects such as the tactile dome strategy to alert people with visual impairments.

KEY STRATEGY

Accessibility approaches includes the use of tactile elements embedded within the sidewalk to alert people with visual impairments.

Currently the city is developing a tactile dome strategy, with pilot projects in the Downtown. Once complete, tactile dome standards will be established and set out in the City of Victoria's Sub-division and Servicing By-laws.

Tactile buttons

5.3.4 LIGHTING STRATEGY

INTENT

The lighting strategy is premised on enhancing the Downtown's unique and identifiable character and helping to distinguish defined heritage precincts while ensuring durability, maintenance and overall sustainability of pedestrian lighting assets.

This is achieved by focusing and distinguishing the use of the iconic globe/ cluster pedestrian light within the Old Town and Inner Harbour Character precincts, and along key corridors as shown in figure 18.

- maintaining the historic feature lighting in Bastion Square and Chinatown
- implementing a new 'modern heritage style' pedestrian light standard within the New Town and Rock Bay character precincts.

The development and implementation of a new downtown pedestrian light strategy is a key action item of this Plan. The pedestrian light strategy will identify a design specification for a new light standard for the areas identified in figure 18 based on the following general performance objectives:

- Based on the 'modern heritage lantern style light included in this document.
- Is durable and cost effective to install, maintain and replace/source
- Achieves dark sky and energy efficient requirements.
- Is sympathetic to the rock bay and newtown character precincts
- Supports other city initiatives and strategies

KEY STRATEGIES

- Use of glossy black as unifying colour for all lights, including street lights.
- Utilize street lights poles for placement of pedestrian lights.
- Use light typologies specified in this document only.
- Use boulevard zones for placement of all pedestrian and street lights.
- Use furnishing zone at corner bump outs for placement of pedestrian lights.

LIGHTING TYPOLOGIES

There will be two typologies of pedestrian lights that are distributed throughout Downtown with feature lights applied to specific areas. See diagram below for distribution of light types

- Heritage Cluster Globe light: city designed mold
- Modern Heritage Style Lantern light: Identified and implemented in phases within the New Town and Rock Bay character precincts
- Feature Lights: China Town Lantern Lights, Bastion Square Heritage Lights, Centennial Square Pedestrian Lights, Harbour Pathway Feature Lights

Modern Heritage Style Lantern Lights Districts

Heritage Cluster Globe Lights Districts

Feature Lighting

The lighting design will allow for flexibility to mix and match pole and base style with selected lighting typology that is needed for a particular location.

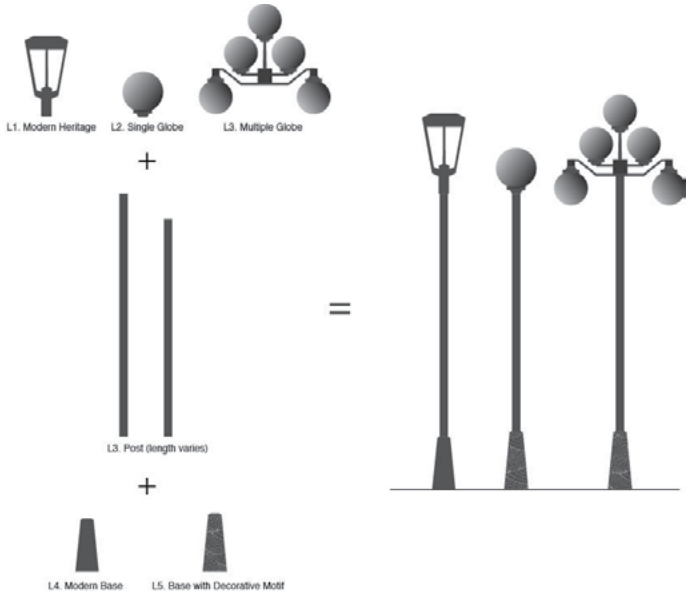


Fig. 17 Lighting Fixture Strategy Diagram

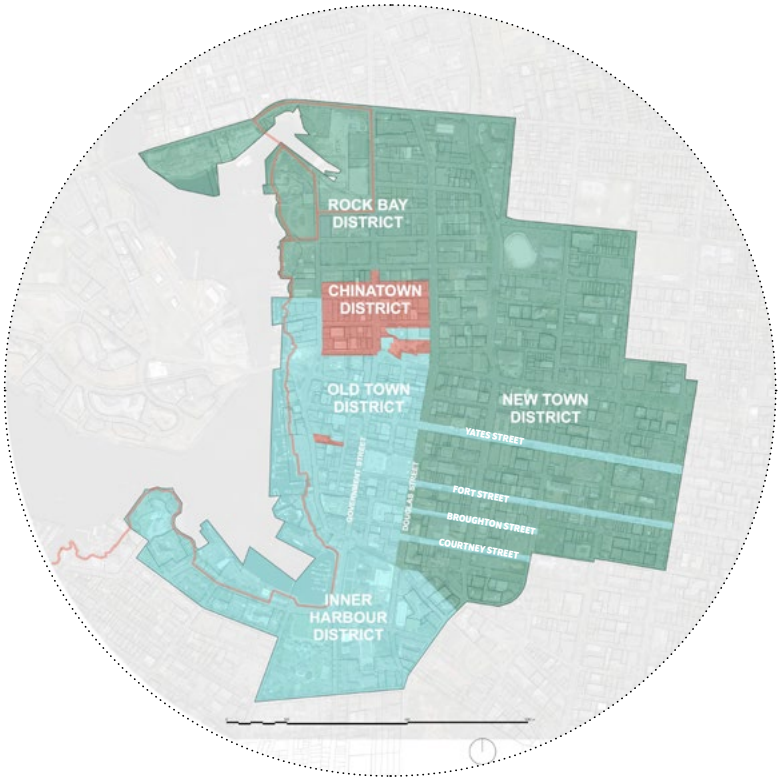


Fig. 18 Lighting Typology Distribution Diagram

5.3.5 PUBLIC ART AND CULTURE STRATEGY

The Arts and Culture Master Plan and Art in Public Places Policy are important companion documents to this plan. These documents should be used in tandem with this plan to guide implementation of the following strategies as opportunities arise.

PUBLIC EVENTS STREET AND LANEWAY CLOSURES

Roads and laneways are seen as natural extensions to events that are already beginning to occur within Downtown. The temporary closure of streets and laneways provide opportunities for art and festivals. These spaces can be returned to their everyday use after events and can also be updated with the necessary infrastructure to help facilitate those events.

- Encourage and reinforce road and laneway closures for special events.

CREATIVE SIGNAGE ON BUILDING FACADE

Encourage businesses to work with local artists to create imaginative and extraordinary commercial signage which will simultaneously add to the night-time experience and allow for development of a vital and exciting media exploration.

- Encourage signage to reinforce diverse, eclectic and artistic character.
- Update guidelines and signage.

MURALS ON BLANK WALLS

Blank walls in the downtown can be thought of as "canvases for public art". Indeed, many blank walls in the downtown have already been converted to attractive murals, a practice that is encouraged to continue, specifically to reinforce the diverse, eclectic, history and artistic character of the downtown. The Arts and Culture Master Plan together with the Art in Public Places Policy provide guidance to implementation of murals throughout the City.

PUBLIC ART @ HARBOUR PATHWAY

This is suggested as a way to reinforce the waterfront experience along the David Foster Harbour Pathway as the epicentre of a vital and imaginative community, where temporary painting of the path can create an ever changing environmental experience for visitors and users of the area. This would be an opportunity for artists and community groups to work together to create temporary masterpieces in the spirit of renewable excitement and empowerment.

PUBLIC ART ON SIDEWALKS

It is proposed that a series of engraving patterns, stamping or inlaid cast iron elements, be installed within the Downtown sidewalk. Additionally, it is proposed to have engraving/sandblast patterns in all areas on the entry bands as well as a linear boulevard band along Douglas Street.

Inscribed basalt slabs located in the entry bands would create a repeated or connected motif forming a necklace of artwork connecting streets in the Downtown Core. At each corner, there would be basalt entry banding slabs inlaid with the street name inscribed on its surface. As a part of the same approach, it is proposed that public art pieces are introduced at the ground plane of feature locations such as small plazas and key building entries, and be inlaid in basalt slabs or cast in iron and placed in concrete sidewalks. The selected works could be garnered by a competition to choose one or more artists. This approach would be simple to install and could be implemented over time.

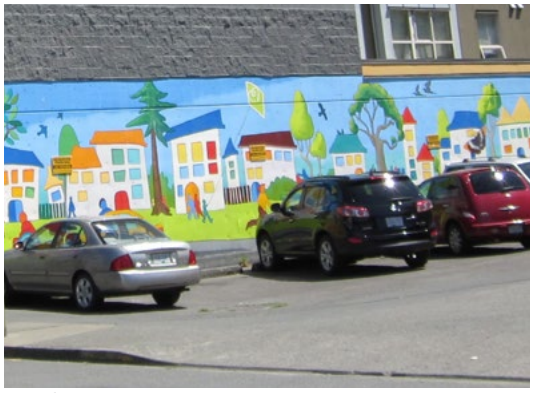
The idea behind the Public Art Strategy is to help link the neighbourhoods with iconic 'drawings in stone' in such a way that they do not overpower the material palette of the sidewalks but rather complement, in a quiet and localized way, the material choices of the surrounding environment.

SITE FURNISHINGS AS PUBLIC ART

It is recommended that when appropriate, site furnishing can be used as public art elements or display such as special red bench in Inner Harbour area along the Government St. to celebrate Victoria as the most romantic city in Canada.

Temporary Street Painting

Creative Signage



Murals

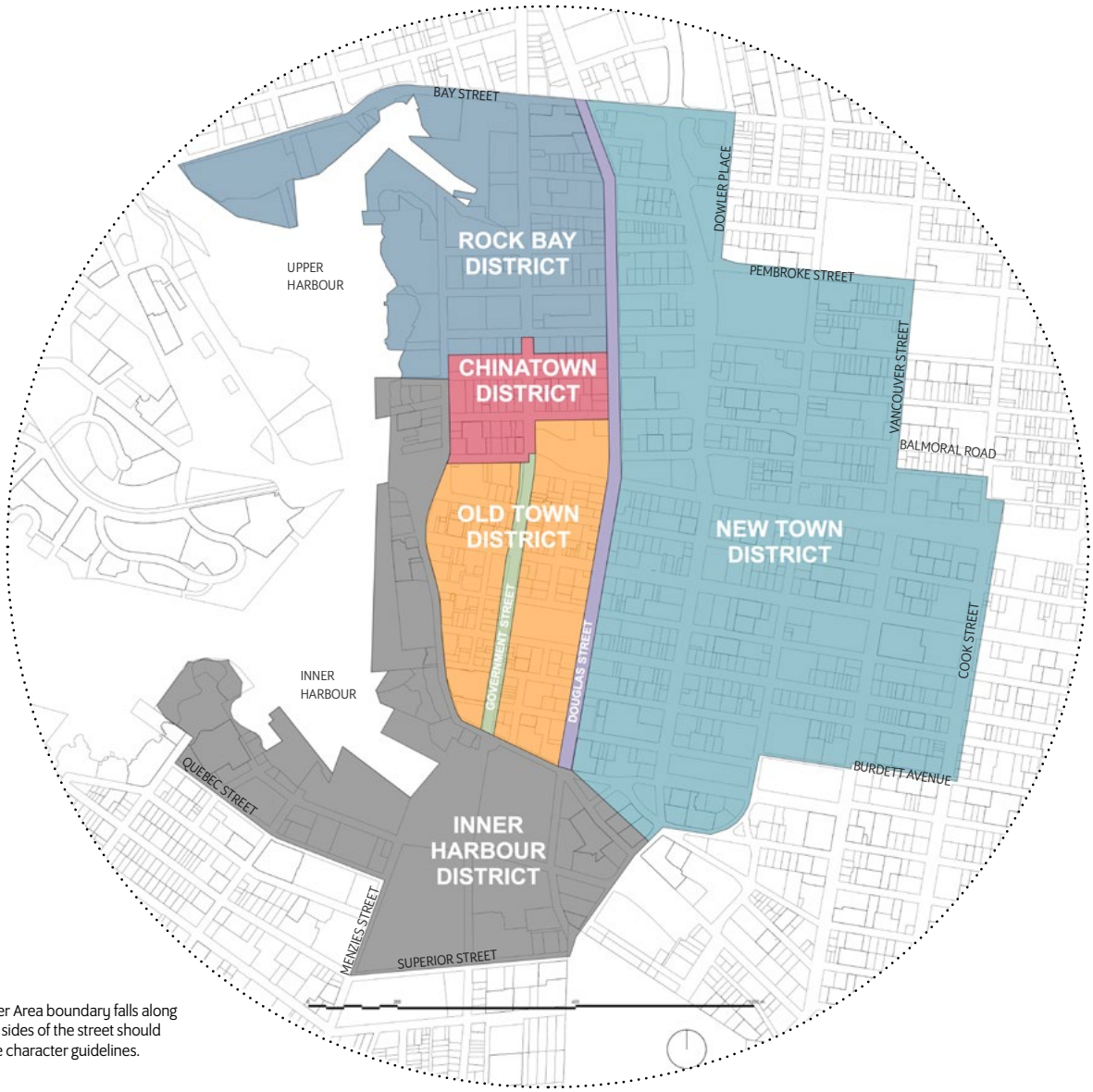
The Public Realm Plan builds on the established pattern and general intent of beautification districts, while reducing the number of character precincts and simplifying the overall downtown palette of materials and furnishing.

5.1 CHARACTER AREAS

There is a long history of identification of distinctive character areas in Downtown Victoria. Since the early twentieth century, precincts such as the Inner Harbour Causeway/ Provincial Legislative area, the Chinatown area, and the Old Town area have been recognized as diverse components of a compact, multi-faceted city core. The Downtown Core Area Plan advances this pattern, reconfirming locations for these long-recognized older districts and looks ahead to the evolution of more contemporary areas in the growing City Core, such as the Central Business District, the Rock Bay District, and the Residential Mixed Use District.

The Public Realm Plan builds on the established pattern and general intent of beautification districts, while reducing the number of character precincts and simplifying the overall downtown palette of materials and furnishing. This is to better emphasize and distinguish Old Town, the Inner Harbour and Chinatown districts, while creating a more unified and cohesive public realm overall.

Following section of this document focuses on detailed design of a unique character and typologies for each of the districts shown on the map below.



Note:
Where Character Area boundary falls along the street, both sides of the street should follow the same character guidelines.

Fig. 19 Character Areas Diagram

5.1.1 INNER HARBOUR

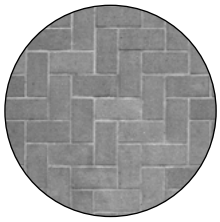
The Inner Harbour District encompasses areas fronting Victoria's Harbour, extending from the Johnson Street Bridge, to Laurel Point, and includes the Legislative Precinct. This district features a distinctive array of functions: maritime transportation, visitor services, cultural and entertainment activities, institutional and Provincial Capital government agencies, and seasonal community and visitor events.

INNER HARBOUR PAVING MATERIALS

1 TROWEL JOINT CONCRETE

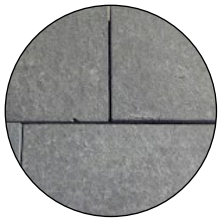
- Installation Method: Cast-in-place
- Application: Sidewalk fill and frame
- Colour: Natural
- Finish: Fine broom finish

2 GRANITE PAVERS



- Dimensions: 300mm x 100mm x 80mm
- Installation Method: Mortar set
- Application: Paving field
- Colours: Grey granite
- Finish: Flamed

3 BASALT PAVERS



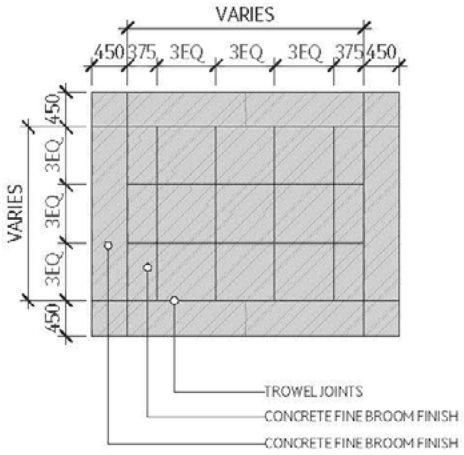
- Dimensions: 300mm x 450mm x 80mm
- Application: Entry banding
- Colour: Grey
- Finish: Flamed

Fig. 20 Inner Harbour Paving Strategy

INNER HARBOUR PAVING APPLICATIONS

1 SIDEWALK

- Pattern: Concrete frame with concrete fill with trowel joint grid pattern shown below
- Note: Equal spacing of banding takes priority over architectural coordination



2 STREET NAME INSERT

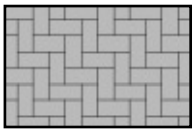
- Material: Streetname Sandblasted into basalt slabs
- Font: Tisa Pro Bold, all caps
- Note: Care should be taken to the letter spacing and kerning

3 BASALT ENTRY BANDING

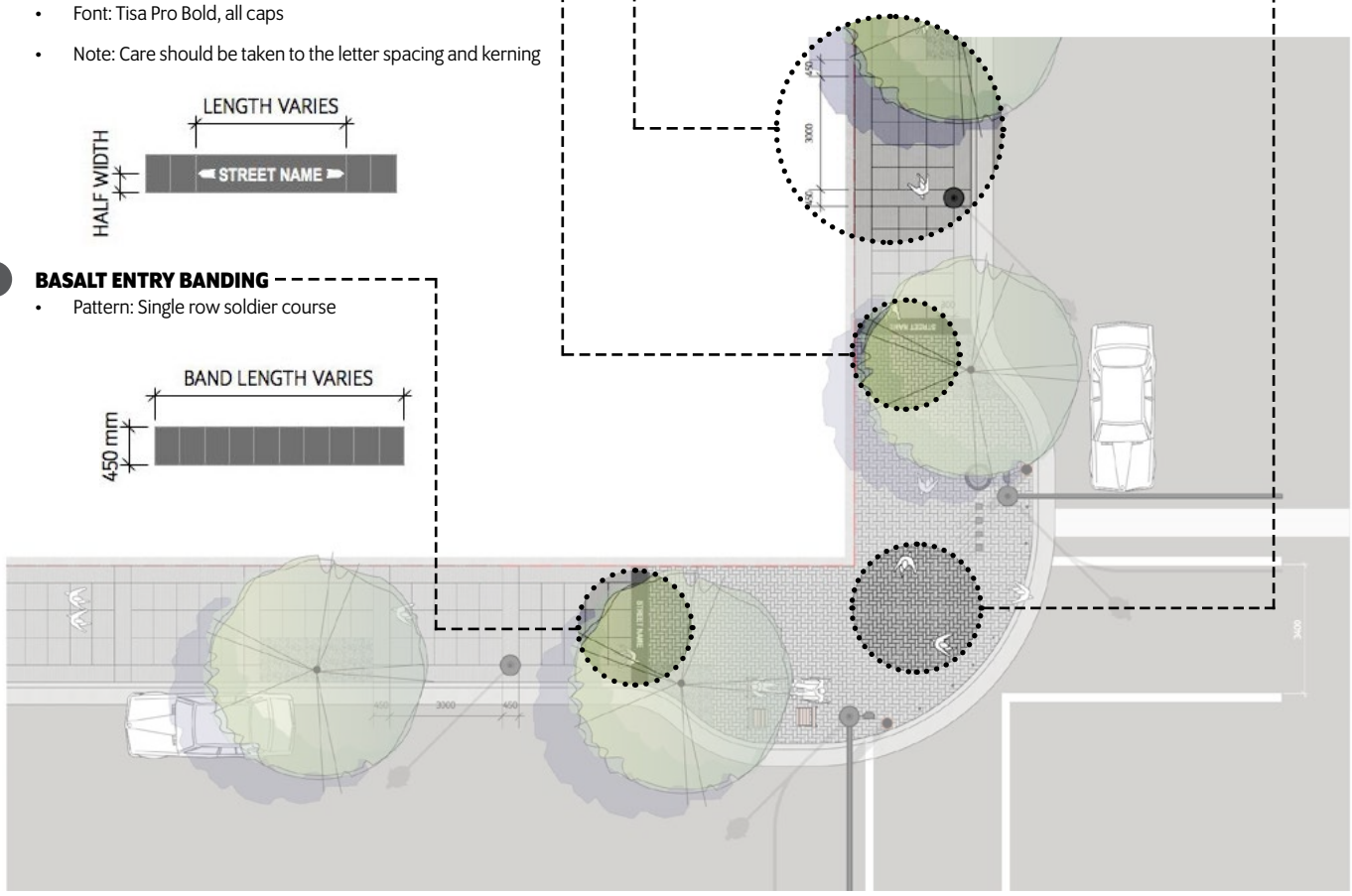
- Pattern: Single row soldier course

4 PAVING FIELD

- Pattern: 45° Herringbone
- Installation: Mortar set



- Note: provide single row soldier course border banding surrounding the field of herring bone pattern



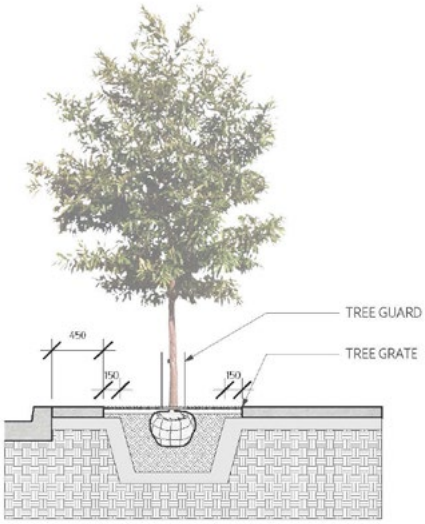
INNER HARBOUR PLANTING DETAILS

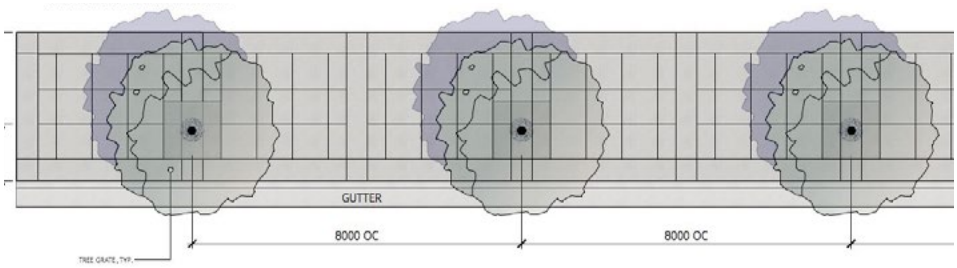
APPLICATION

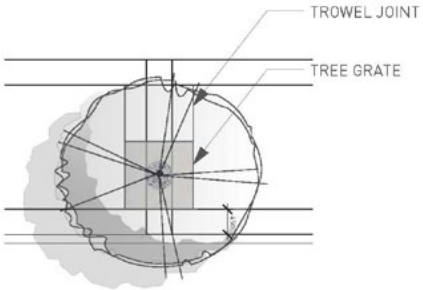
For all sidewalks in Inner Harbour area there are be two types of trees-in-sidewalk condition:

1. Adaptation of existing tree locations to sidewalk improvements:
   - Small modifications of proposed trowel joint pattern are recommended to best accommodate for existing tree locations. Detailed design and recommendations to be provided on case-by-case basis for each improvement area.
   - Use of proposed poured-in-place resin bound material instead of tree grates is highly recommended to best accommodate heaving and overgrown tree routes and large tree trunks.

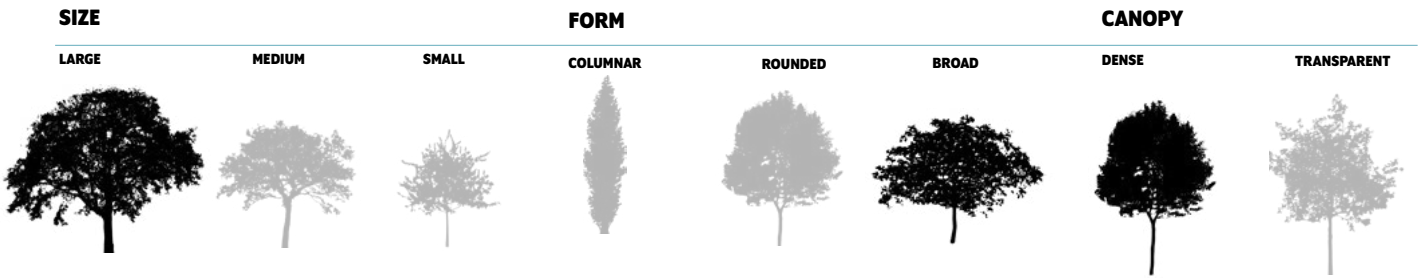
2. New development condition:
   - Trees to be planted closer to the curb to increase sidewalk area - please see section "tree placement" for details and dimensions for new tree placement dimensions.
   - Tree grates must be located in the centre of banding pattern proposed as illustrated on the diagram below.
   - Trowel joint patterning should align with tree grates when possible.
   - Tree placement and spacing should respond to sidewalk pattern whenever possible.







INNER HARBOUR RECOMMENDED TREE TYPOLOGIES



INNER HARBOUR FURNISHING

Inner Harbour's palette of site furnishing is currently black and is recommended to remain black. It complements the very formal legislative precinct of Downtown and allows for simplification and elevated elegance. Furniture suite in this area is proposed to stay within a heritage character to emphasize its unique surroundings.

BOLLARDS

TYPE A

TYPE B

Type A Bollard: Heritage style

- Application: All corners and plazas, feature areas

Type B Bollard: Modern style

- Application: case by case when needed

TRASH BINS

TYPE A

Type A: Modern Metal Bin

- Application: All Streets except corners, Government Street and Belleuve Street
- Multi-stream recycling receptacles are to be used when appropriate on a case by case basis

TYPE B

Type B: Heritage Bin

- Application: All corners and Government Street, Belleville Street and plazas
- Note: When possible, place at least 1 bin at corner bump out

BIKE RACK

Downtown Bike Rack

- Application: All areas
- Note: To be installed in boulevard zones of the sidewalk

BENCHES

TYPE A

Type A: Heritage style with back

- Application: plazas and feature locations

TYPE B

Type B: Heritage style without back

- Application: Corner bump outs, sidewalk boulevards and plazas

CHAIR

Chair seat: Heritage style with back

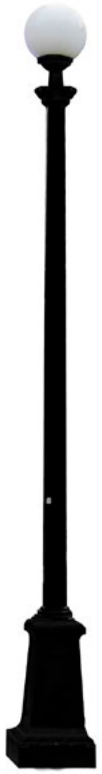
- Application: Corner bump outs at outdoor room zones, wider sidewalk boulevards and plazas
- Note: Minimum of 2 chairs shall be placed at each location

INNER HARBOUR LIGHTING

Inner Harbour area's lighting plays an important role for Downtown and for the Harbour. It is the most exposed and visible area for all arriving in Victoria by air, water and on ground. For that reason it is to retain its current globe cluster lighting as the feature lighting for all streets within this area.

PEDESTRIAN LIGHTS

SINGLE GLOBE LIGHT



Heritage Single Globe

- Application: Small Plazas (such as Belleville Plaza), residential streets

CLUSTER GLOBE LIGHT TYPE A

Heritage Cluster Globe Type A : Circular

- Application: All Major Streets and Larger Plazas, Fort Street, Yates Street
- Notes: Place lights perpendicular to the curb

CLUSTER GLOBE LIGHT TYPE B

Heritage Cluster Globe Type B : Aligned

- Application: All Major Streets and Larger Plazas
- Notes: Place lights perpendicular to the curb

5.1.2 OLD TOWN

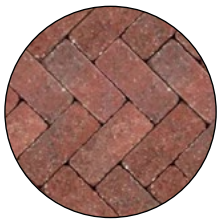
Old Town ambiance, unhurried pedestrian appeal, and picturesque continuous street-wall enclosure and irregular street character are all typical of the Old Town District. Rich and timeless brick in combination with black and simple furnishing will emphasize its distinct and sophisticated charm.

OLD TOWN PAVING MATERIALS

1 TROWEL JOINT CONCRETE

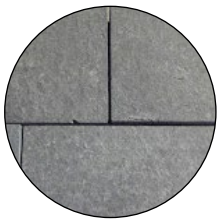
- Installation Method: Cast-in-place
- Application: Sidewalk fill and frame
- Colour: Natural
- Finish: Fine broom finish

2 BRICK PAVERS



- Dimensions: 94mm x 194mm x 25mm
- Application: Paving field
- Colours: Red brick
- Finish: Honed

3 BASALT PAVERS

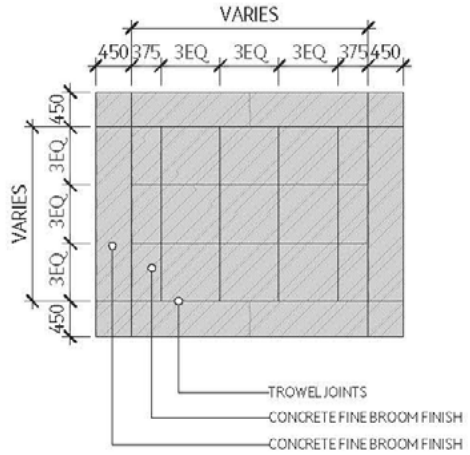


- Dimensions: 300mm x 450mm x 80mm
- Application: Entry banding
- Colour: Grey
- Finish: Flamed

OLD TOWN PAVING APPLICATIONS

1 SIDEWALK

- Pattern: Concrete frame with concrete fill with trowel joint grid pattern shown below
- Note: Equal spacing of banding takes priority over architectural coordination



2 STREET NAME INSERT

- Material: Streetname Sandblasted into basalt slabs
- Font: Tisa Pro Bold, all caps
- Note: Care should be taken to the letter spacing and kerning

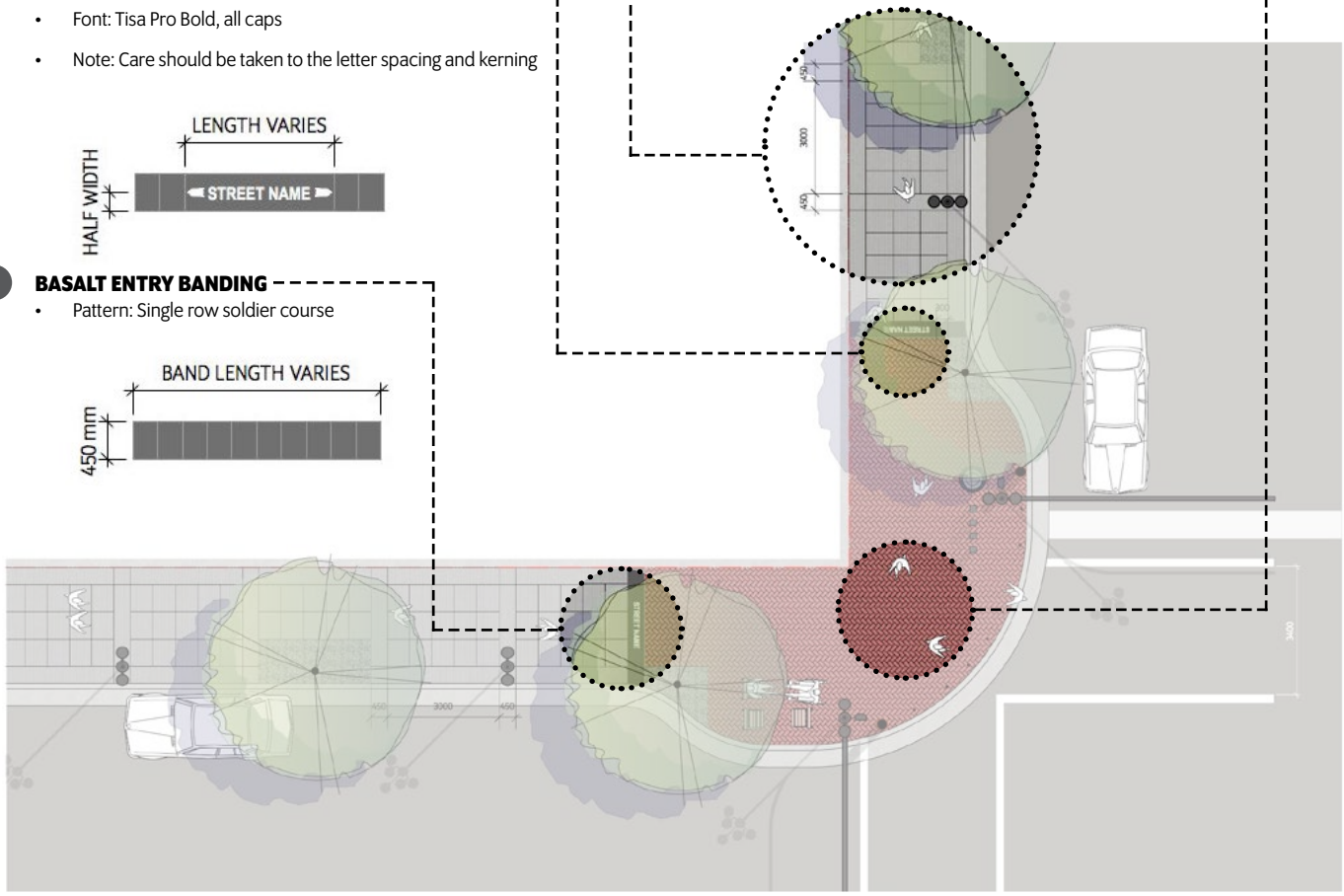
3 BASALT ENTRY BANDING

- Pattern: Single row soldier course

4 PAVING FIELD

- Pattern: 45° Herringbone
- Installation: Mortar set

- Note: provide single row soldier course border banding surrounding the field of herring bone pattern



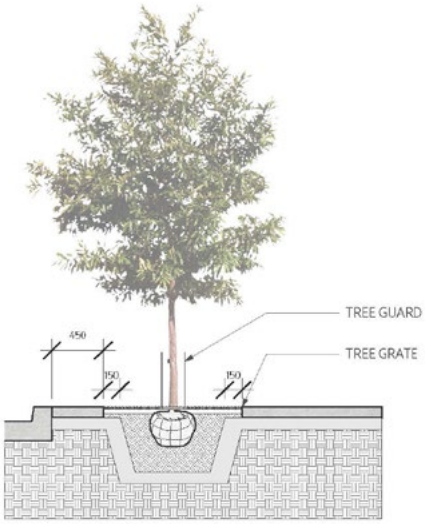
OLD TOWN PLANTING DETAILS

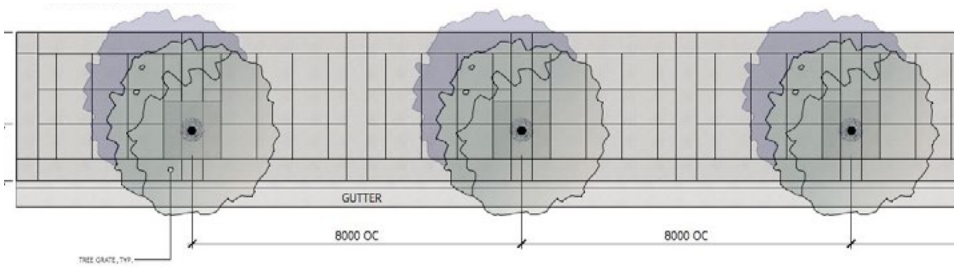
APPLICATION

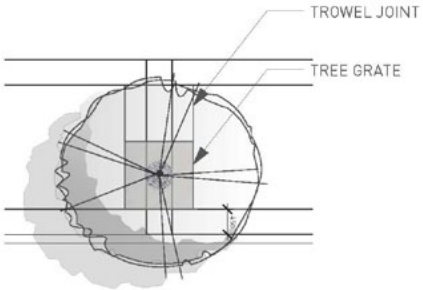
For all sidewalks in Old Town area there are be two types of trees-in-sidewalk condition:

1. Adaptation of existing tree locations to sidewalk improvements:
   - Small modifications of proposed trowel joint pattern are recommended to best accommodate for existing tree locations. Detailed design and recommendations to be provided on case-by-case basis for each improvement area.
   - Use of proposed poured-in-place resin bound material instead of tree grates is highly recommended to best accommodate heaving and overgrown tree routes and large tree trunks.

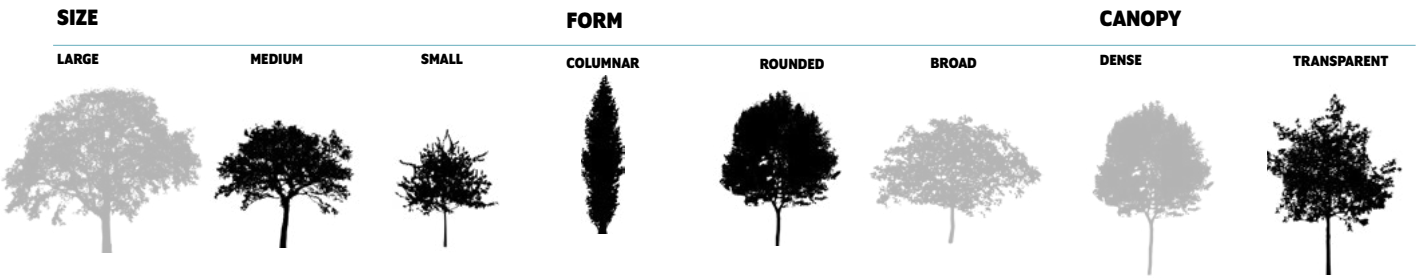
2. New development condition:
   - Trees to be planted closer to the curb to increase sidewalk area - please see section "tree placement" for details and dimensions for new tree placement dimensions.
   - Tree grates must be located in the centre of banding pattern proposed as illustrated on the diagram below.
   - Trowel joint patterning should align with tree grates when possible.
   - Tree placement and spacing should respond to sidewalk pattern whenever possible.







OLD TOWN RECOMMENDED TREE TYPOLOGIES



OLD TOWN FURNISHING

Old Town is characterized by a rich urban fabric and clear definition of street walls. It is the district with the strongest heritage presence and shall be maintained in the same way. Use of iconic globe lights, heritage trash bins and heritage bollards add to the overall character and richness. The glossy black palette will help simplify and elevate the elegance in the area.

BOLLARDS

TYPE A

TYPE B

Type A Bollard: Heritage style

Application: Feature plazas and other special public spaces such as Waddington Alley and Bastion Square

Type B Bollard: Modern style

- Application: Corner bump outs and all other locations where vertical separation is needed

TRASH BINS

TYPE A

Type A: Modern Metal Bin

- Application: All Streets except corners and Government Street
- Multi-stream recycling receptacles are to be used when appropriate on a case by case basis

TYPE B

Type B: Heritage Bin

- Application: All corners, Government Street and plazas
- Note: When possible place at least 1 bin at corner bump out

BIKE RACK

Downtown Bike Rack

- Application: All areas Downtown, except Chinatown

BENCHES

TYPE A

Type A: Heritage style with back

- Application: plazas and feature locations

TYPE B

Type B: Heritage style without back

- Application: Corner bump outs, sidewalk boulevards and plazas

CHAIR

Chair seat: Heritage style with back

- Application: Corner bump outs at outdoor room zones and plazas
- Note: minimum of 2 chairs shall be placed at each location

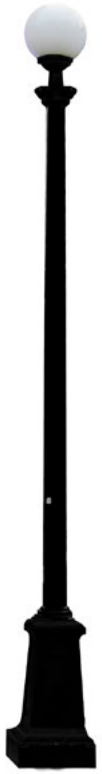
OLD TOWN LIGHTING

Pedestrian lights play an important role in the public realm. They bring and elevate the character of the street and can become an icon, such as globe cluster lights in the Downtown area.

Cluster Lights are proposed to be kept in all locations in the Old Town district as they gracefully add to the richness of its streets.

PEDESTRIAN LIGHTS

SINGLE GLOBE LIGHT



Heritage Single Globe

- Application: Small plazas (such as Homecoming Plaza), residential streets

CLUSTER GLOBE LIGHT TYPE A

Heritage Cluster Globe Type A : Circular

- Application: All major streets and larger plazas, Fort Street, Yates Street
- Notes: Place lights perpendicular to the curb

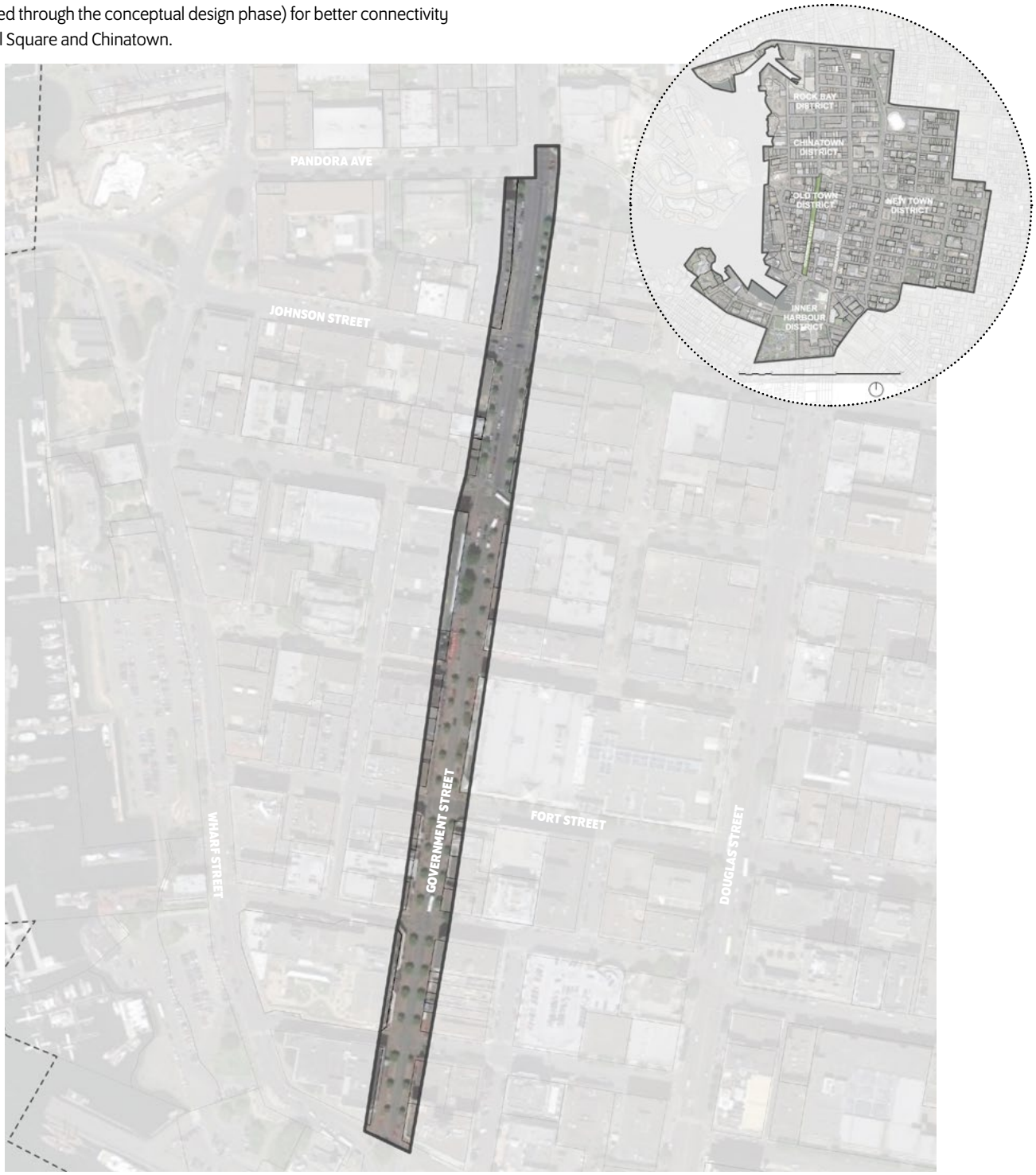
CLUSTER GLOBE LIGHT TYPE B

Heritage Cluster Globe Type B : Aligned

- Application: All major streets and larger plazas, Government Street Mall
- Notes: Place lights perpendicular to the curb

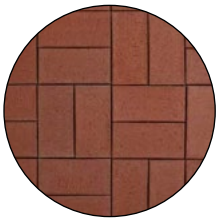
5.1.3 GOVERNMENT STREET MALL

Government Street's character as a shopping mall has been established decades ago. With its current roll curb environment and brick paving, it became a distinctive street in Downtown Core. The street is visited frequently by tourists and locals. This successful treatment is proposed to continue further and be extended to Pandora street , Fisgard or Pembroke Street (to be determined through the conceptual design phase) for better connectivity to Centennial Square and Chinatown.



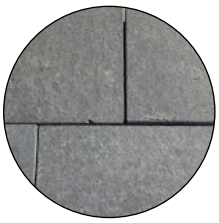
GOVERNMENT STREET PAVING MATERIALS

1 BRICK PAVER TYPE A



- Dimensions: 94mm x 194mm x 25mm
- Installation Method: Mortar set
- Application: Main paving field, boulevard band

2 BASALT BAND



- Dimensions: 300mm x 450mm x 80mm
- Installation Method: Mortar set
- Application: Basalt entry banding

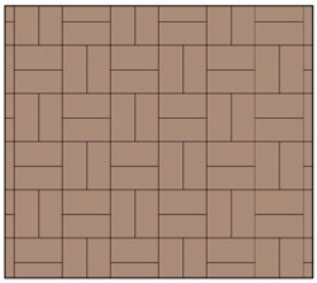
GOVERNMENT STREET PAVING APPLICATIONS

Government Street paving pattern with it's mall character extends between Wharf Street and Pandora St. This treatment is characterized by:

- Roll curb or no curb environment.
- Wide boulevard zone for furnishing.
- Brick paving throughout from building face to curb and across intersection areas.
- Brick paving at pedestrian crossings.
- Basalt entry bands with street names are introduced to match the standard bump out strategy in the rest of Downtown.

1 SIDEWALK

- Pattern: Basket weave (continuation of existing pattern)
- Note: Equal spacing for pattern consistency takes priority over architectural coordination

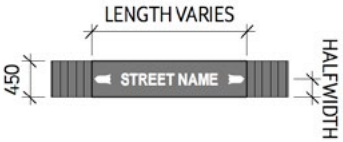


2 BRICK BOULEVARD BANDING

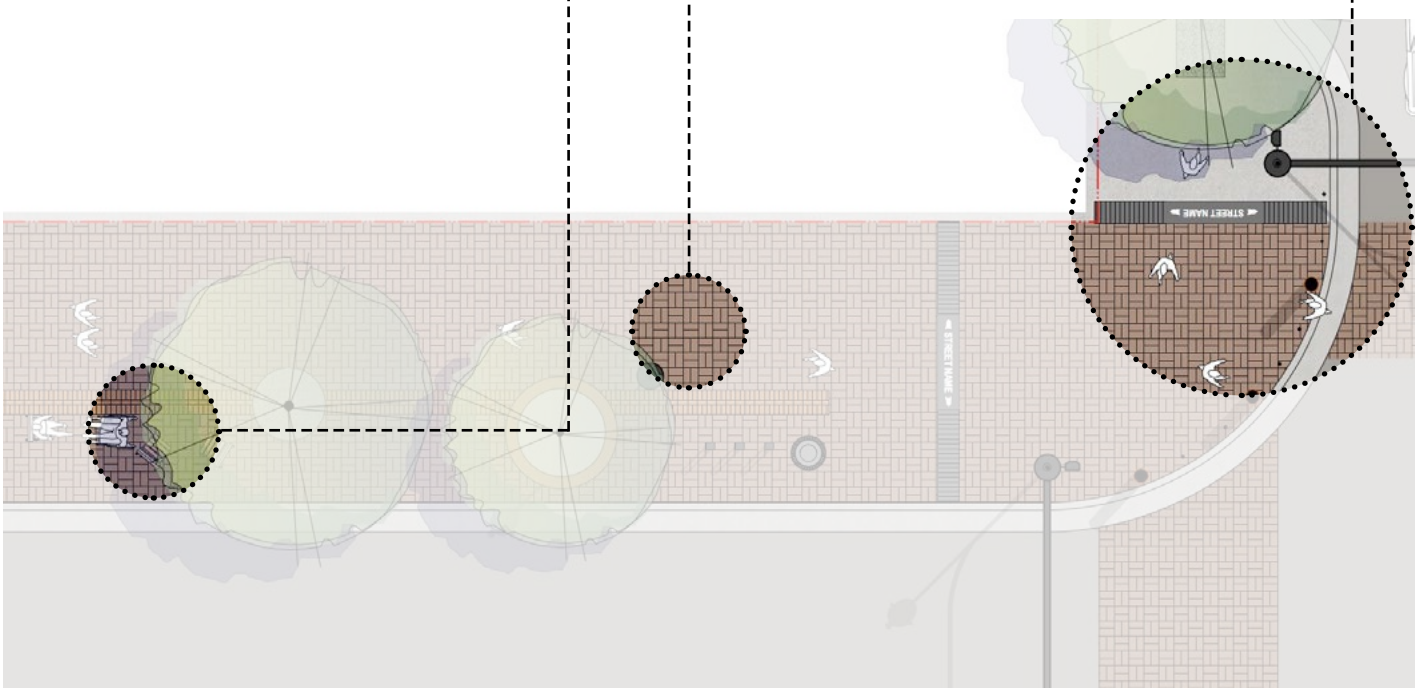
- Material: Brick Paver Type A
- Pattern: As per illustration bellow (continuation of existing pattern)

3 STREET NAME INSERT

- Material: Streetname Sandblasted into basalt slabs
- Font: Match existing
- Size: single granite slab



- Special note: Upon further reasearch, if possible, maintain and restore all existing ceramic tile names along Government St. Explore reintroduction of the tiles as part of Government St. Mall extention.



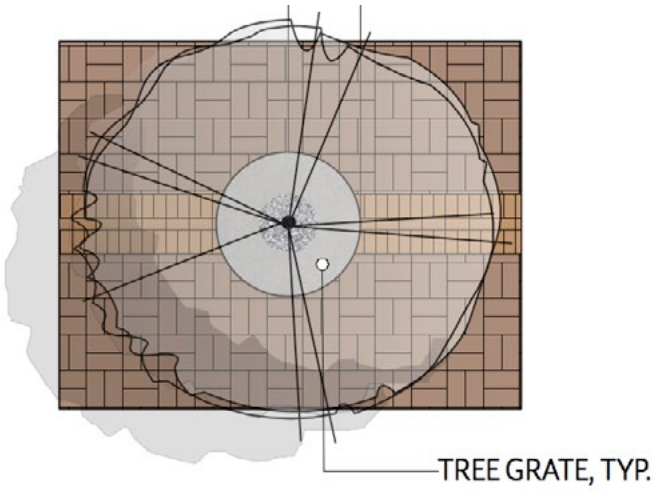
GOVERNMENT STREET FEATURE ELEMENTS

Government Street Mall is a key street in Old Town District and takes on the same furnishing suite with few feature elements added as shown below.

ROUND SEATING PLANTER

- Modern metal planter with wood seating
- Application: Boulevard zone of the street
- Notes: Replace all existing concrete planters with new metal planter
- Product: Green circular benches by StreeLife
- (See specifications in Appendix for details)

TREE PLANTING RECOMMENDATIONS



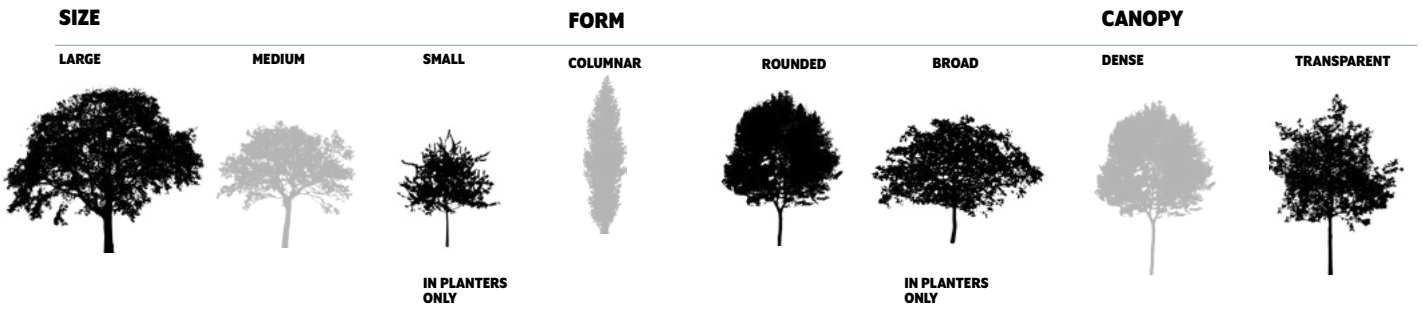
Recommendations:

Planters:

- Light and transparent canopy.
- Adaptable to planters conditions.
- Tall volume for better pedestrian circulation and car circulation.
- Low maintenance.
- Note: Please refer to City of Victoria Urban Forest Master Plan for tree planting strategies.

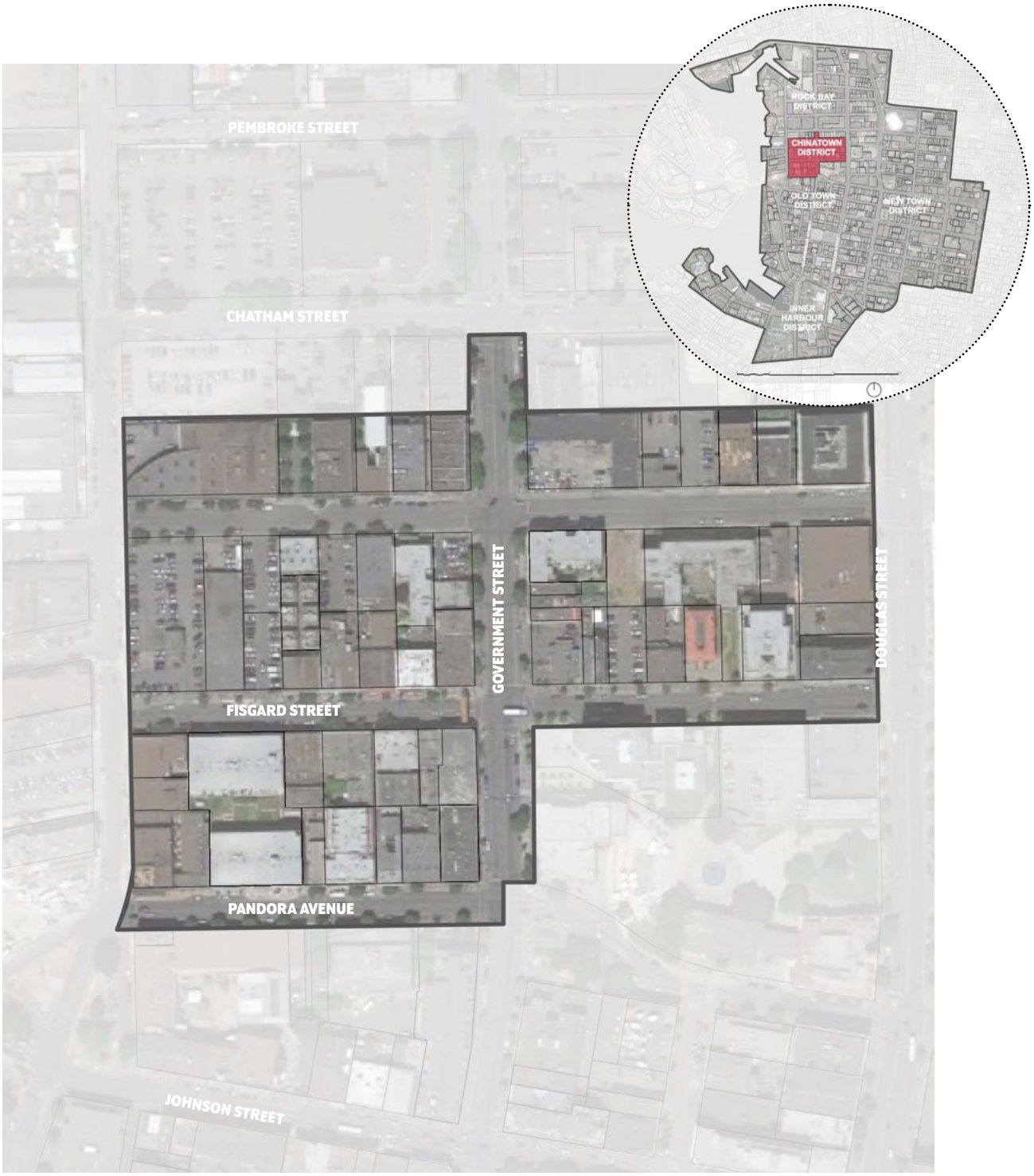
Streets

- Light and transparent canopy.
- Large and tall canopy.



5.1.4 CHINATOWN

Chinatown is one of Downtown Victoria's most distinctive historical districts. The 500 block of Fisgard Street is its primary block, but surrounding blocks are also integral to this precinct. A number of common features have been established and will be retained for the entire area.

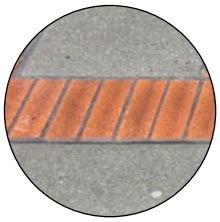


CHINATOWN PAVING MATERIALS

1 TROWEL JOINT CONCRETE

- Installation Method: Cast-in-place
- Application: Sidewalk fill and frame
- Colour: Natural
- Finish: Fine broom finish

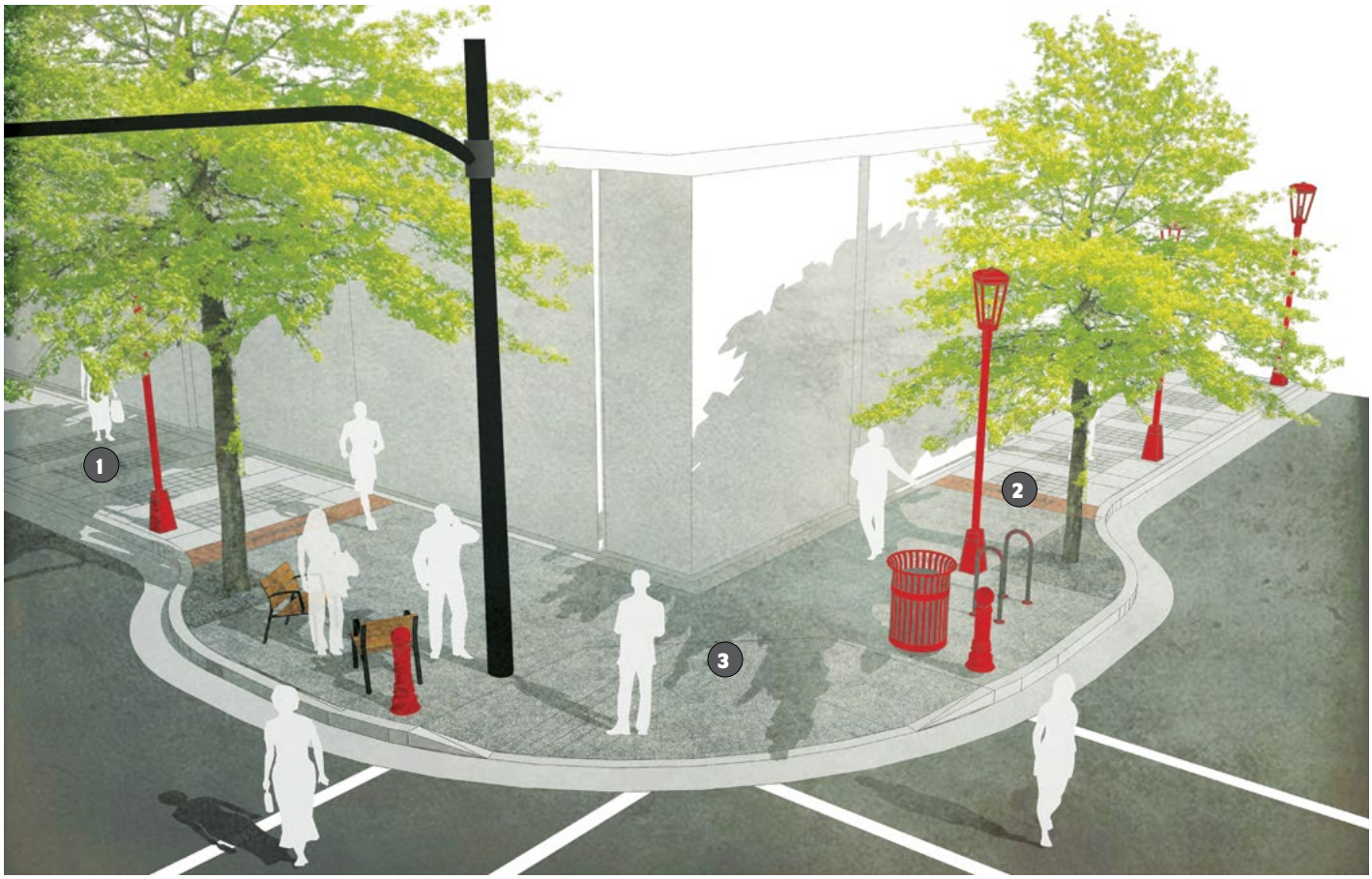
2 BRICK PAVER TYPE B



- Smooth Red Brick
- Dimensions: 94mm x 194mm x 57mm
- Application: Entry banding
- Colour: Orange red

3 EXPOSED AGGREGATE

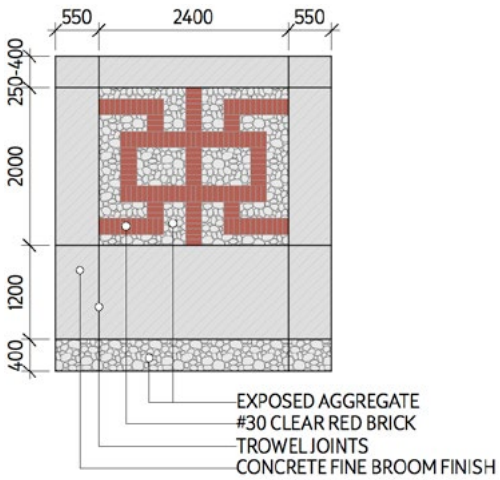
- Installation Method: Cast-in-place
  Dimensions: Fit to size
- Application: Main paving field at corners
- Colour: Dark Grey



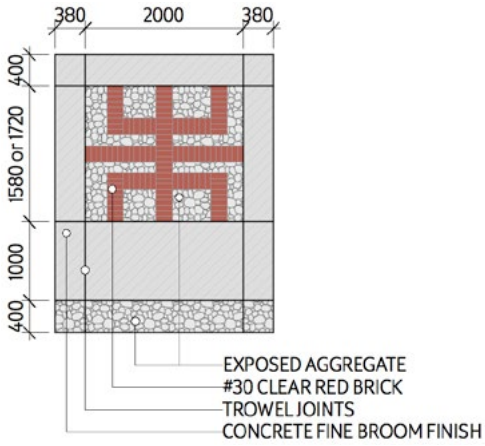
CHINATOWN PAVING APPLICATIONS

3 SIDEWALK

- Pattern: Two different Chinatown paving pattern with broomed concrete frame, exposed aggregate fill with brick pattern
- Pattern 1: Linked

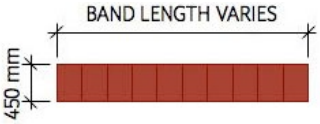


- Pattern 2: Longevity in wide (1720) and narrow (1680) applications



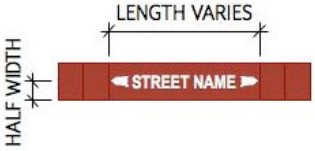
1 BRICK ENTRY BANDING

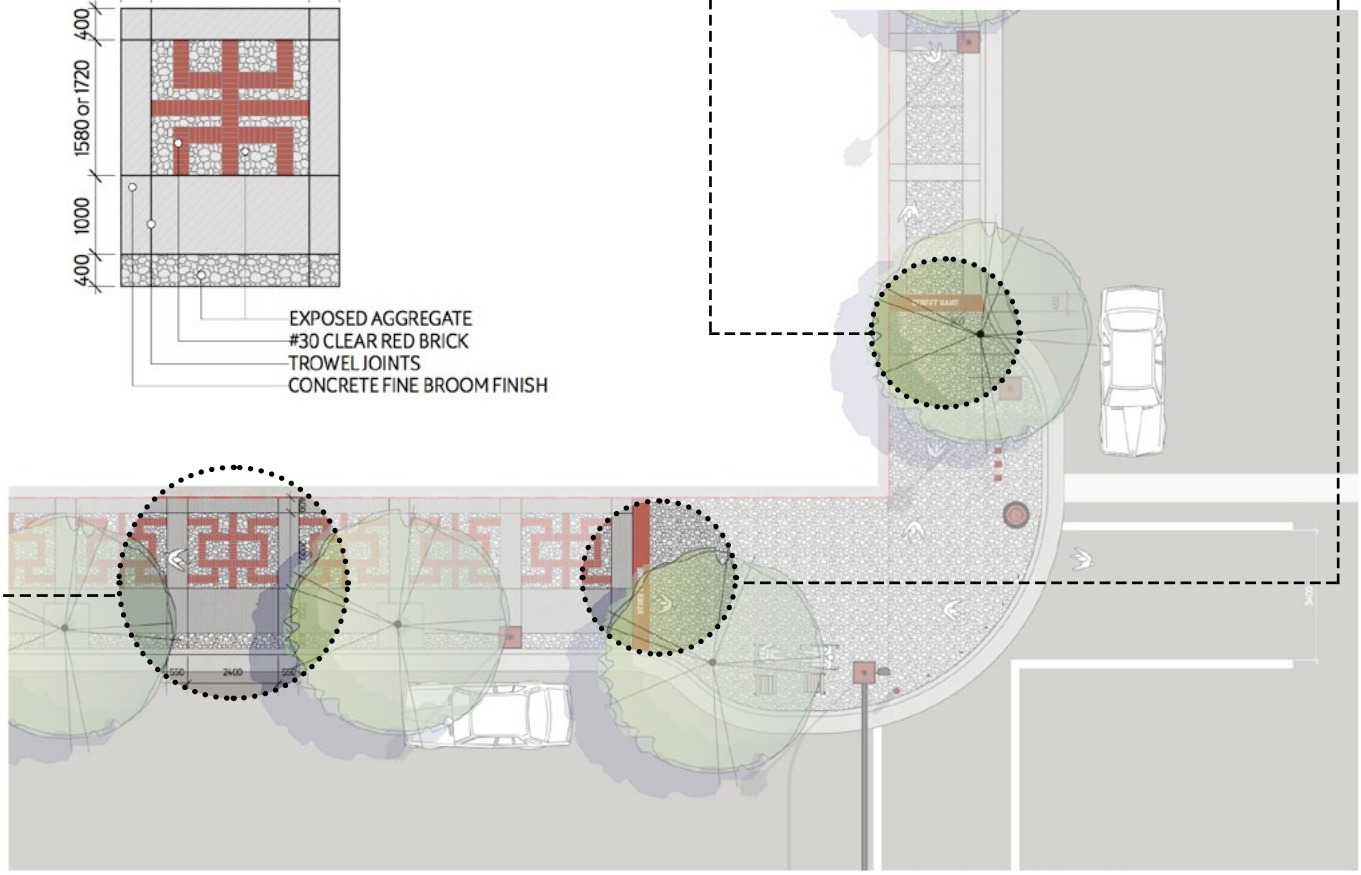
- Pattern: Single row soldier course



2 STREET NAME INSERT

- Material: Streetname Sandblasted into basalt slabs
- Font: Tisa Pro Bold, all caps
- Note: Care should be taken to the letter spacing and kerning

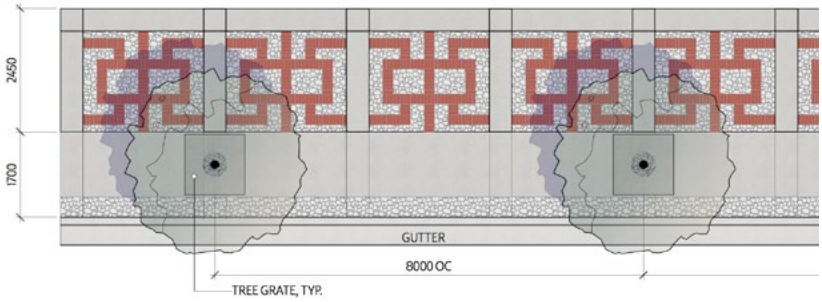




CHINATOWN PLANTING DETAILS

APPLICATION

For all sidewalks in China Town area there are be two types of trees-in-sidewalk condition:



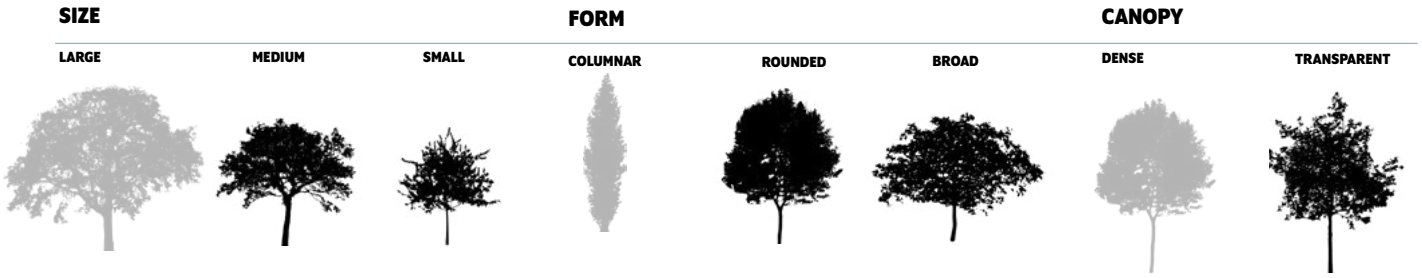
1. Adaptation of existing tree locations to sidewalk Improvements:
   - Small modifications of proposed trowel joint pattern are recommended to best accommodate for existing tree locations. Detailed design and recommendations to be provided on case-by-case basis for each improvement area.
   - Use of proposed poured-in-place resin bound material instead of tree grates is highly recommended to best accommodate heaving and overgrown tree routes and large tree trunks.
2. New development condition:
   - Trees to be planted closer to the curb to increase sidewalk area - please see section "tree placement" for details and dimensions for new tree placement dimensions.
   - Tree grates must be located in the centre of banding pattern proposed as illustrated on the diagram below.
   - Tree placement and spacing should respond to sidewalk pattern whenever possible.

CHINATOWN RECOMMENDED TREE SPECIES & TYPOLOGIES

Chinatown is a relatively small area within the overall Downtown core. Spanning only few streets with a strong character and thematic presence, it is recommended to focus on planting only 2 different street tree species to provide a stronger and more coherent character.

It is recommended that Fisgard Street continue to plant the same type of Pine Tree as existing trees.

Existing Pine Tree



CHINATOWN FURNISHING AND LIGHTING

The Chinatown furnishing palette is proposed to maintain its traditional look and feel using traditional Chinese red for all streetscape furniture. Custom Chinatown lantern style lights are kept as a feature element for this area.

PEDESTRIAN LIGHT

Chinatown Pagoda Lantern

- Application: All streets in Chinatown

BOLLARDS

TYPE B

Type B Bollard: Modern style

- Application: Corner bump outs and all other locations where vertical separation is needed

TRASH BIN

Chinatown Bin

- Application: All areas of Chinatown
- Note: When possible place at least 1 bin at corner bump out

BIKE RACK

Chinatown Bike Rack

- Application: All areas in Chinatown

BENCHES

TYPE C

Type C: Metal modern bench

- Application: All sidewalks
- Note: This bench should not be used at corners

TYPE D

Type D: Heritage style with back

- Application: Plazas and feature locations

TYPE E

Type E: Heritage style without back

- Application: Corner bump outs, sidewalk boulevards

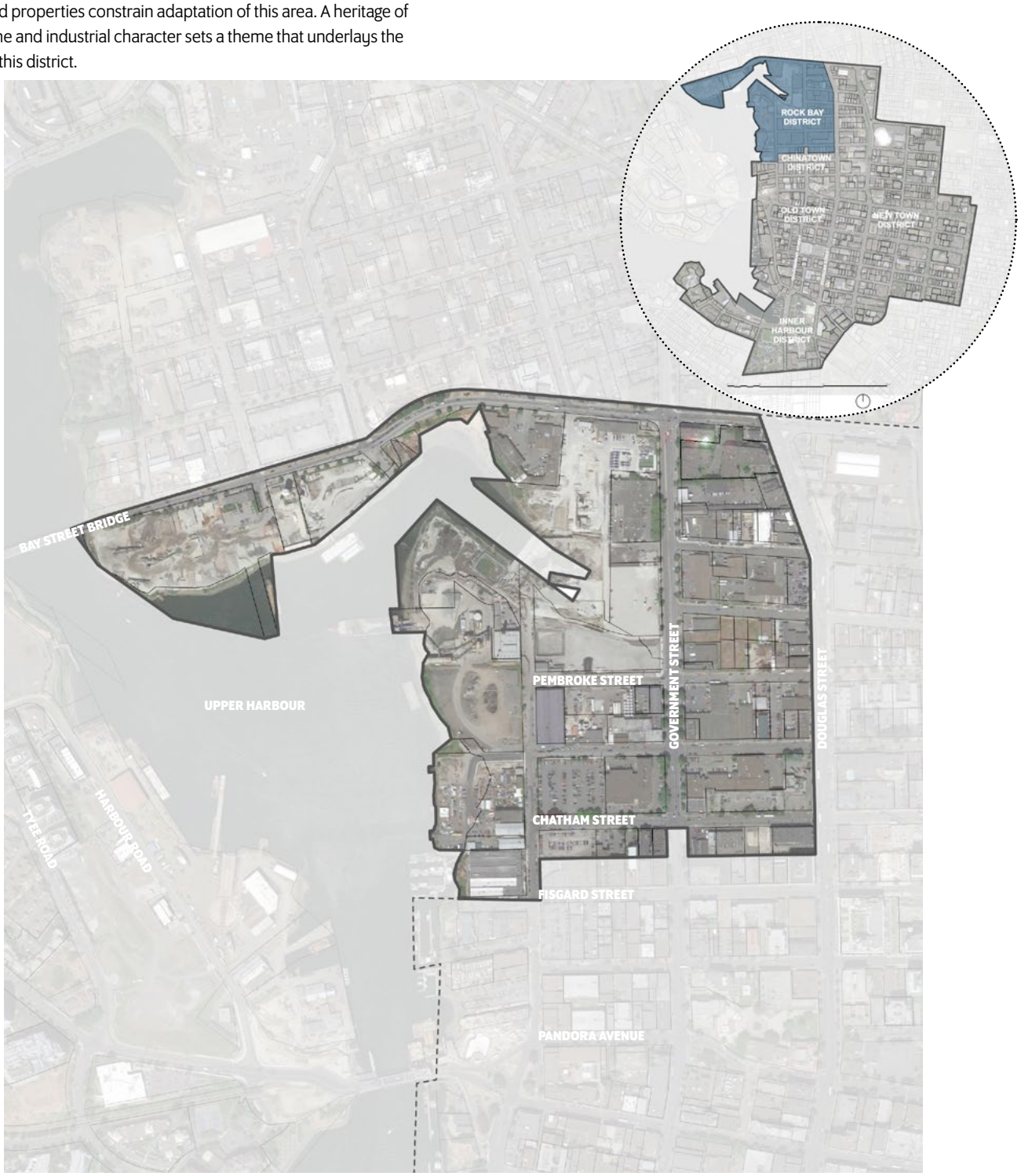
CHAIR

Type D: Heritage style with back

- Application: Corner bump outs at outdoor room zones
- Note: Minimum of 2 chairs shall be placed at each location

5.1.5 ROCK BAY

Rock Bay is the historic northern industrial service area which flanks Downtown Victoria. The area is largely under-used, with few remaining active service businesses or industries. Some harbourside shipping and industrial uses continue to be active. Issues of outdated civil services / contaminated properties constrain adaptation of this area. A heritage of rugged marine and industrial character sets a theme that underlays the character of this district.



ROCK BAY PAVING MATERIALS

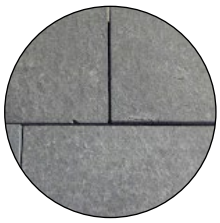
1 TROWEL JOINT CONCRETE

- Installation Method: Cast-in-place
- Application: Sidewalk fill and frame
- Colour: Natural
- Finish: Fine broom finish

2 SAWCUT CONCRETE

- Installation Method: Cast-in-place
- Application: Sidewalk fill
- Colour: Natural
- Finish: Light sandblasting

3 BASALT PAVERS

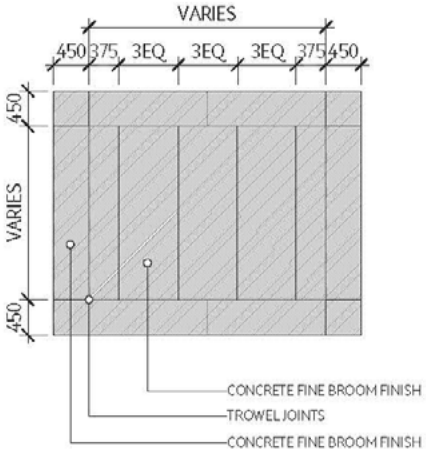


- Dimensions: 300mm x 450mm x 80mm
- Installation Method: Mortar set
- Application: Entry banding
- Colour: Charcoal grey
- Finish: Flamed

ROCK BAY PAVING APPLICATIONS

1 SIDEWALK

- Pattern: Concrete frame with concrete fill with trowel joint grid pattern shown below
- Note: Equal spacing of banding takes priority over architectural coordination



2 STREET NAME INSERT

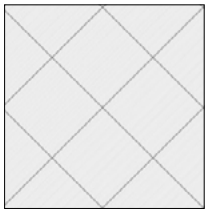
- Material: Streetname Sandblasted into basalt slabs
- Font: Tisa Pro Bold, all caps
- Note: Care should be taken to the letter spacing and kerning

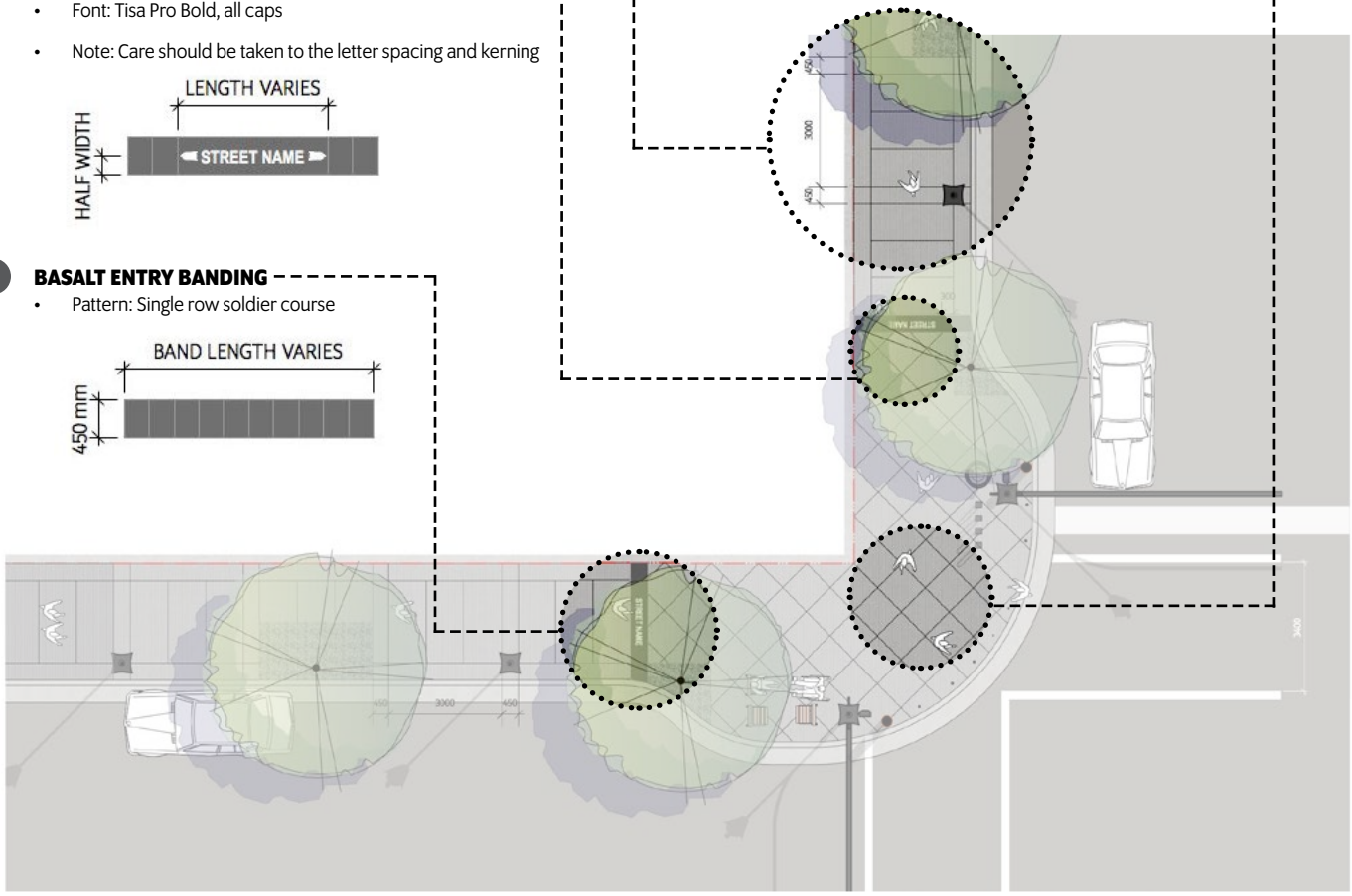
3 BASALT ENTRY BANDING

- Pattern: Single row soldier course

4 PAVING FIELD

- Pattern: Diamond sawcut
- Installation: Cast-in-place concrete





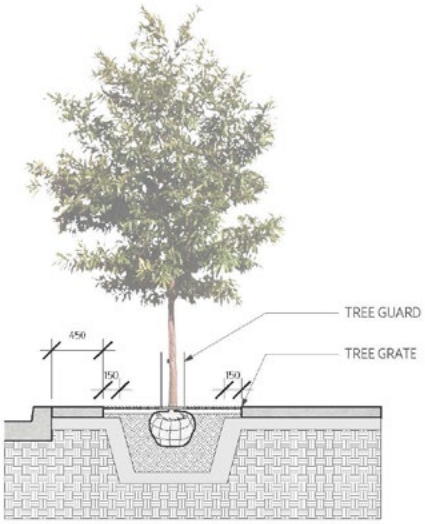
ROCK BAY PLANTING DETAILS

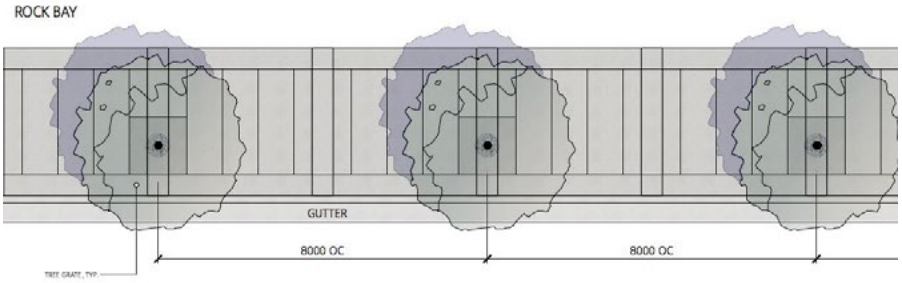
APPLICATION

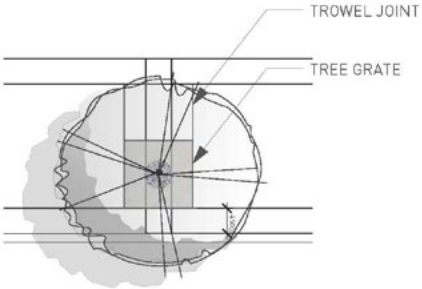
For all sidewalks in Rock Bay area there are be two types of trees-in-sidewalk condition:

1. Adaptation of existing tree locations to sidewalk improvements:
   - Small modifications of proposed trowel joint pattern are recommended to best accommodate for existing tree locations. Detailed design and recommendations to be provided on case-by-case basis for each improvement area.
   - Use of proposed poured-in-place resin bound material instead of tree grates is highly recommended to best accommodate heaving and overgrown tree routes and large tree trunks.

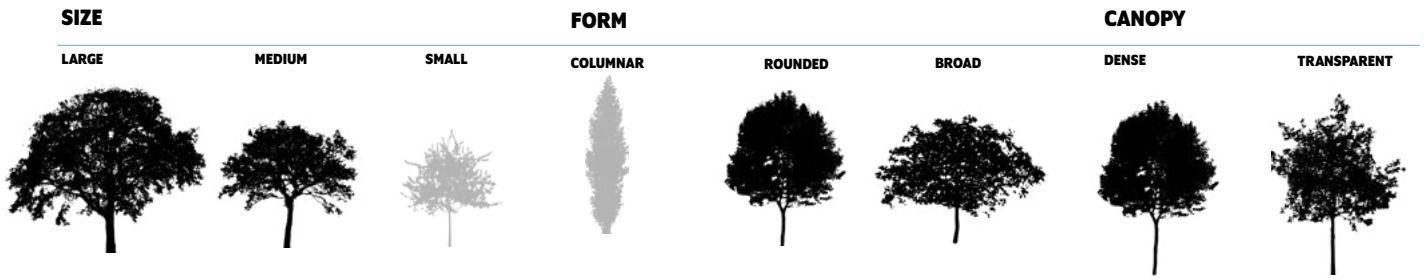
2. New development condition:
   - Trees to be planted closer to the curb to increase sidewalk area - please see section "tree placement" for details and dimensions for new tree placement dimensions.
   - Tree grates must be located in the centre of banding pattern proposed as illustrated on the diagram below.
   - Trowel joint patterning should align with tree grates when possible.
   - Tree placement and spacing should respond to sidewalk pattern whenever possible.







ROCK BAY RECOMMENDED TREE TYPOLOGIES



ROCK BAY FURNISHING AND LIGHTING

Rock Bay area has a distinctive industrial character. With its proximity to the water and working harbour, the style is proposed to be kept modern and simple. The furnishing and lighting suite is kept to a minimum and takes on a more modern feel. However, more ornamental and heritage style elements are used at key locations to provide coherency with the rest of Downtown. The black metal materials highlight the industrial character.

Lighting is simplified to only one pedestrian standard that demonstrates a modern heritage character, connecting the modern and heritage characteristics of the district.

PEDESTRIAN LIGHT

Modern Heritage Style Light

- Application: All areas of Rock Bay

BOLLARDS

TYPE B

Type B Bollard: Modern style

- Application: Corner bump outs and all other locations where vertical separation is needed

TRASH BINS

TYPE A

Type A: Modern Metal Bin

- Application: All streets except corners and Government Street
- Multi-stream recycling receptacles are to be used when appropriate on a case by case basis

BIKE RACK

Downtown Bike Rack

- Application: All areas Downtown, except Chinatown

FEATURE BENCHES

TYPE D

Type D: Industrial heritage style with back

- Application: Plazas and feature locations
- Corner bump outs

TYPE E

Type E: Industrial heritage style without back

- Application: Plazas and feature locations
- Corner bump outs

CHAIR

Chair Seat: Industrial heritage style with back

- Application: Corner bump outs at outdoor room zones
- Note: Minimum of 2 chairs shall be placed at each location

TYPICAL BENCHES

TYPE C

Type C: Metal modern bench

- Application: Sidewalks
- Note: This bench should not be used at corners

TYPE F

Type F: Metal modern bench with back

- Application: Sidewalks
- Note: this bench should not be used at corners

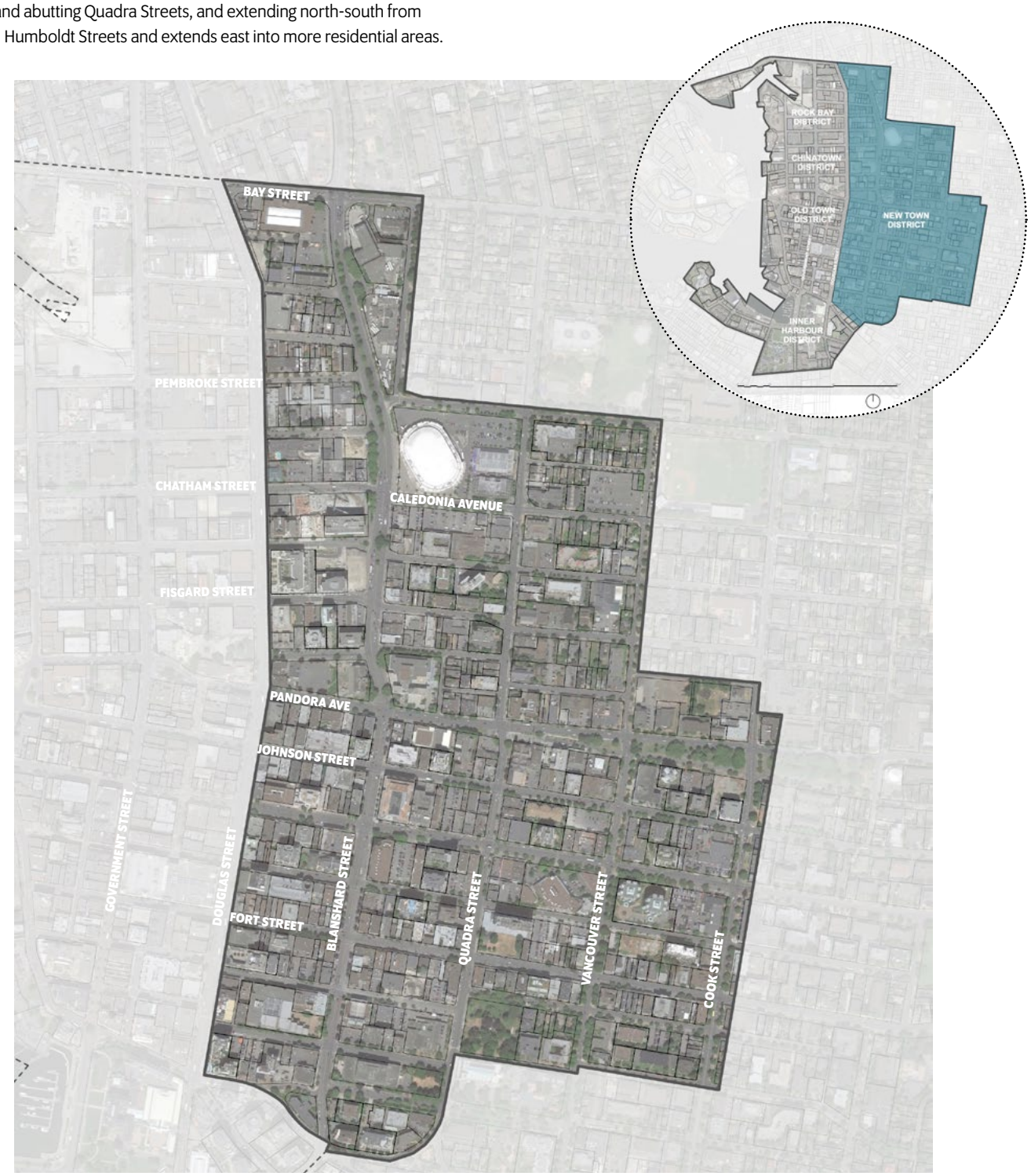
TYPE G

Type G: Metal modern bench without back

- Application: Sidewalks
- Note: this bench should not be used at corners

5.1.6 NEW TOWN

The New Town District is Downtown Victoria's evolving nucleus for commerce and urban interaction as well as key transit access zone. Focused on one side at the intersection of Victoria's two traditional main streets at Douglas and Yates, the district reaches east to developing areas surrounding Blanshard and abutting Quadra Streets, and extending north-south from Chatham to Humboldt Streets and extends east into more residential areas.

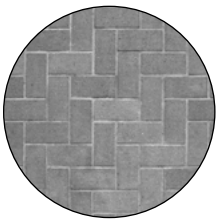


NEW TOWN PAVING MATERIALS

1 TROWEL JOINT CONCRETE

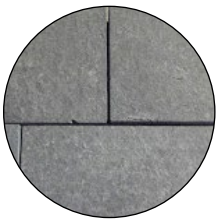
- Installation Method: Cast-in-place
- Application: Sidewalk fill and frame
- Colour: Natural
- Finish: Fine broom finish

2 CONCRETE UNIT PAVERS



- Dimensions: 225mm x 75mm x 60
- Installation Method: Sand bed
- Application: Paving field
- Colours: Natural grey
- Finish: Unsealed

3 BASALT PAVERS

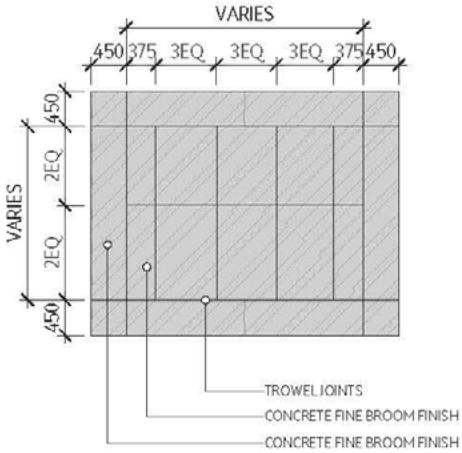


- Dimensions: 300mm x 450mm x 80mm
- Installation Method: Mortar set
- Application: Entry banding
- Colour: Charcoal grey
- Finish: Flamed

NEW TOWN PAVING APPLICATIONS

1 SIDEWALK

- Pattern: Concrete frame with concrete fill with trowel joint grid pattern shown below
- Note: Equal spacing of banding takes priority over architectural coordination



2 STREET NAME INSERT

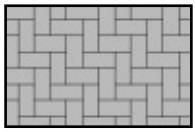
- Material: Streetname Sandblasted into basalt slabs
- Font: Tisa Pro Bold, all caps
- Note: Care should be taken to the letter spacing and kerning

3 BASALT ENTRY BANDING

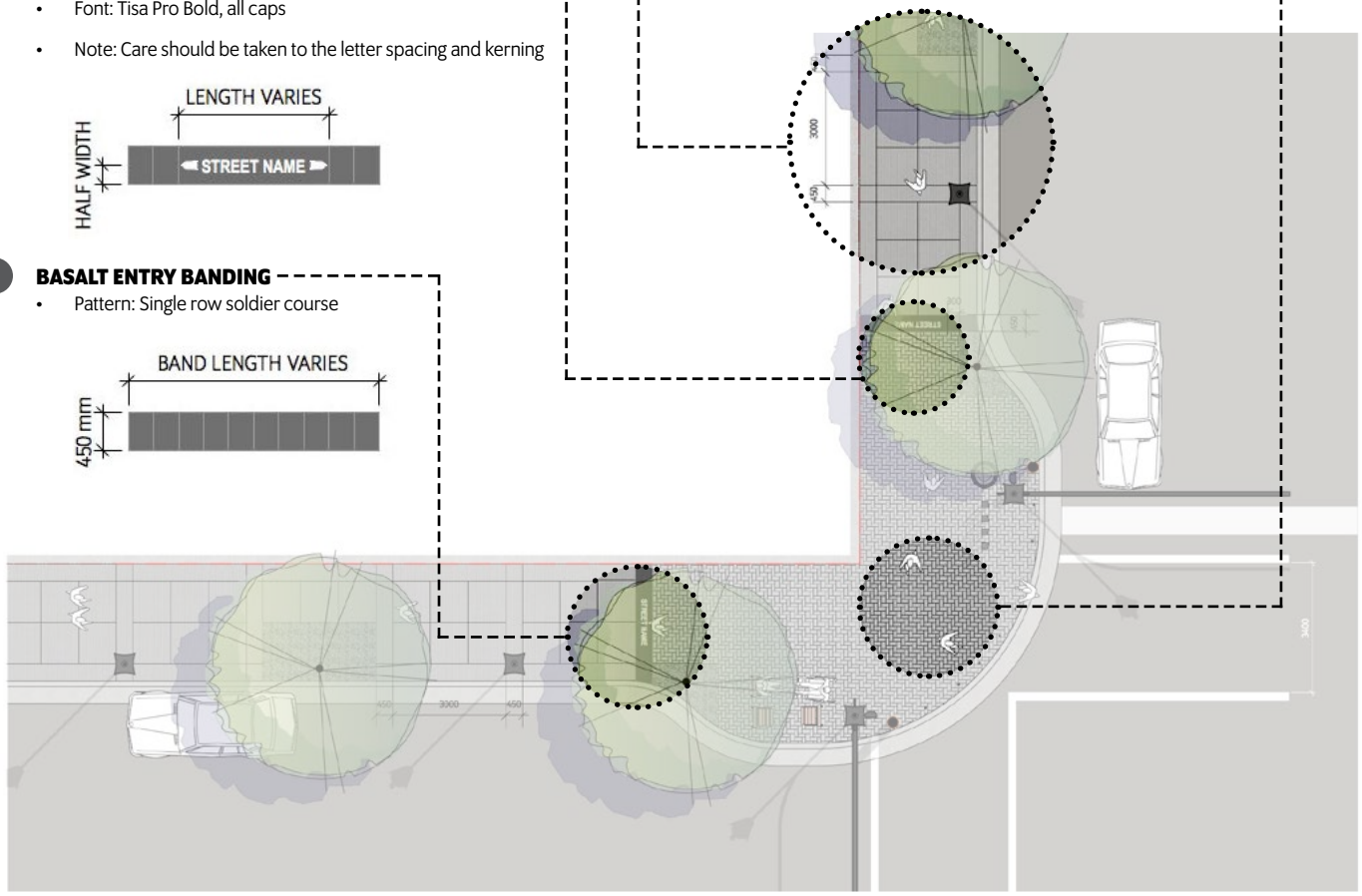
- Pattern: Single row soldier course

4 PAVING FIELD

- Pattern: 90° Herringbone
- Installation: Mortar set



- Note: provide single row soldier course border banding surrounding the field of herring bone pattern



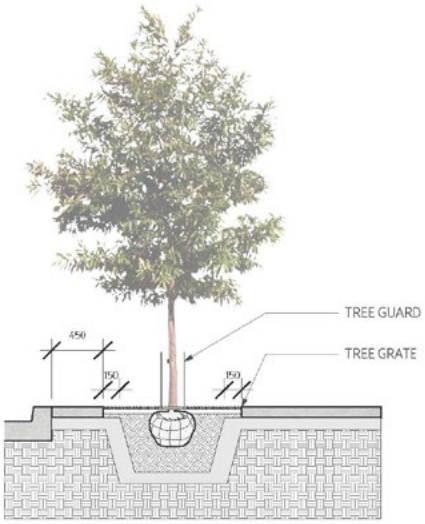
NEW TOWN PLANTING DETAILS

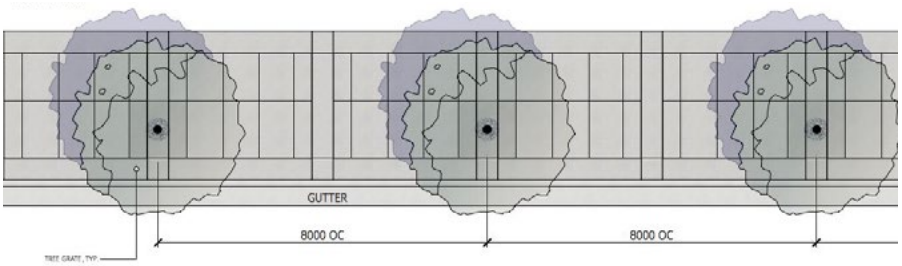
APPLICATION

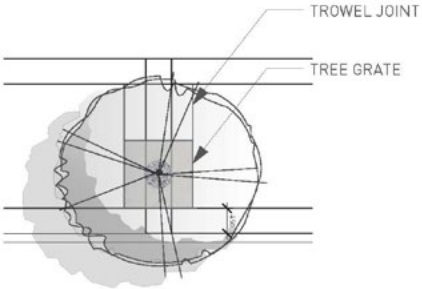
For all sidewalks in New Town area there are be two types of trees-in-sidewalk condition:

1. Adaptation of existing tree locations to sidewalk improvements:
   - Small modifications of proposed trowel joint pattern are recommended to best accommodate for existing tree locations. Detailed design and recommendations to be provided on case-by-case basis for each improvement area.
   - Use of proposed poured-in-place resin bound material instead of tree grates is highly recommended to best accommodate heaving and overgrown tree routes and large tree trunks.

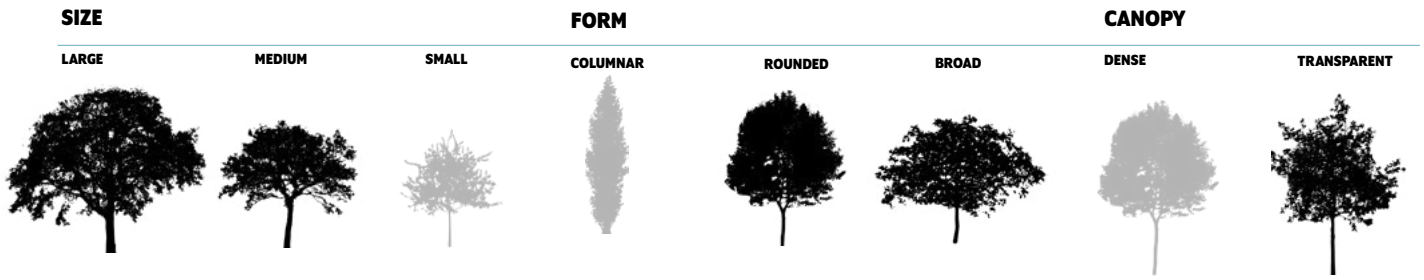
2. New development condition:
   - Trees to be planted closer to the curb to increase sidewalk area - please see section "tree placement" for details and dimensions for new tree placement dimensions.
   - Tree grates must be located in the centre of banding pattern proposed as illustrated on the diagram below.
   - Trowel joint patterning should align with tree grates when possible.
   - Tree placement and spacing should respond to sidewalk pattern whenever possible.







NEW TOWN RECOMMENDED TREE TYPOLOGIES



NEW TOWN FURNISHING AND LIGHTING

New Town furnishing suite is a modern heritage style. It has the most diversity in streets characters from busy Douglas Street and Blanshard Street to quiet residential marrow streets with planted boulevards. Proposed elements can accommodate for both conditions giving flexibility to how and where to use them.

BOLLARDS

TYPE B

Type B Bollard: Modern style

- Application: Corner bump outs and all other locations where vertical separation is needed

TRASH BINS

TYPE A

Type A: Modern Metal Bin

- Application: All locations
- Multi-stream recycling receptacles are to be used when appropriate on a case by case basis

BIKE RACK

Downtown Bike Rack

- Application: All locations

PEDESTRIAN LIGHT

Modern Heritage Style Light

- Application: All Locations

FEATURE BENCHES

TYPE H

Type H: Wooden modern bench with back

- Application: Plazas and feature locations
- Corner bump outs

TYPE I

Type I: Wooden modern bench without back

- Application: Plazas and feature locations
- Corner bump outs

CHAIR

Chair seat: Modern style with back

- Application: Corner bump outs at outdoor room zones
- Note: Minimum of 2 chairs shall be placed at each location

TYPICAL BENCHES

TYPE C

Type C: Metal modern bench

- Application: Sidewalks
- Note: this bench should not be used at corners

TYPE F

Type F: Metal modern bench with back

- Application: Sidewalks
- Note: this bench should not be used at corners

TYPE G

Type G: Metal modern bench without back

- Application: Sidewalks
- Note: this bench should not be used at corners

5.1.7 DOUGLAS STREET

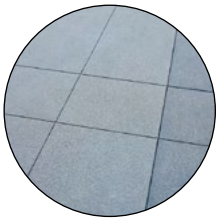
Douglas Street is Downtown Victoria's traditional primary main street. As the planned regional transit trunk spine, with growth over time, all the 600-2400 frontages will function as anchoring urban blocks for the Downtown Core Area.

Douglas Street has a strong established sidewalk treatment that should be continued.

Character: objective of an energetic, lively commercial main street, with a focus for regional traffic, transit and pedestrian activity, framed by imposing architectural street walls. Main Street and regional transit character to be emphasized, with upgrades of public realm materials, finishes, and furnishing.

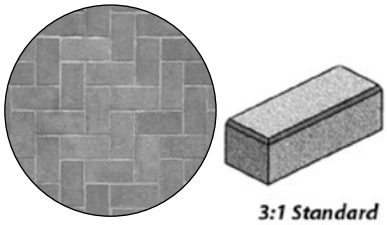
DOUGLAS STREET PAVING MATERIALS

1 CONCRETE BANDING



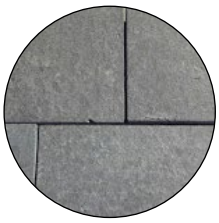
- Dimensions: 450mm wide
- Installation Method: Cast-in-place
- Application: sidewalk patterning
- Spacing: 3m min. or to match architectural elements when possible

2 CONCRETE UNIT PAVERS



- Dimensions: 225mm x 75mm x 60mm Installation Method: Mortar set
- Application: Main sidewalk paving between concrete banding + corner bump outs
- Colour: Charcoal grey

3 BASALT BAND

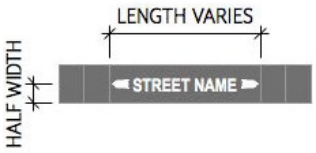


- Dimensions: 300mm wide stack bond soldier course basalt paver band
- Installation Method: Mortar set
- Application: Entry Banding, Boulevard Bending

DOUGLAS STREET PAVING APPLICATIONS

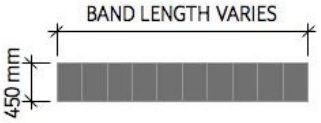
1 STREET NAME INSERT

- Material: Streetname Sandblasted into basalt slabs
- Font: Tisa Pro Bold, all caps
- Note: Care should be taken to the letter spacing and kerning



2 BASALT ENTRY BANDING AND BOULEVARD BANDING

- Pattern: Single row soldier course

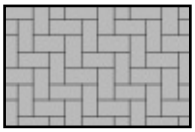


3 SIDEWALK

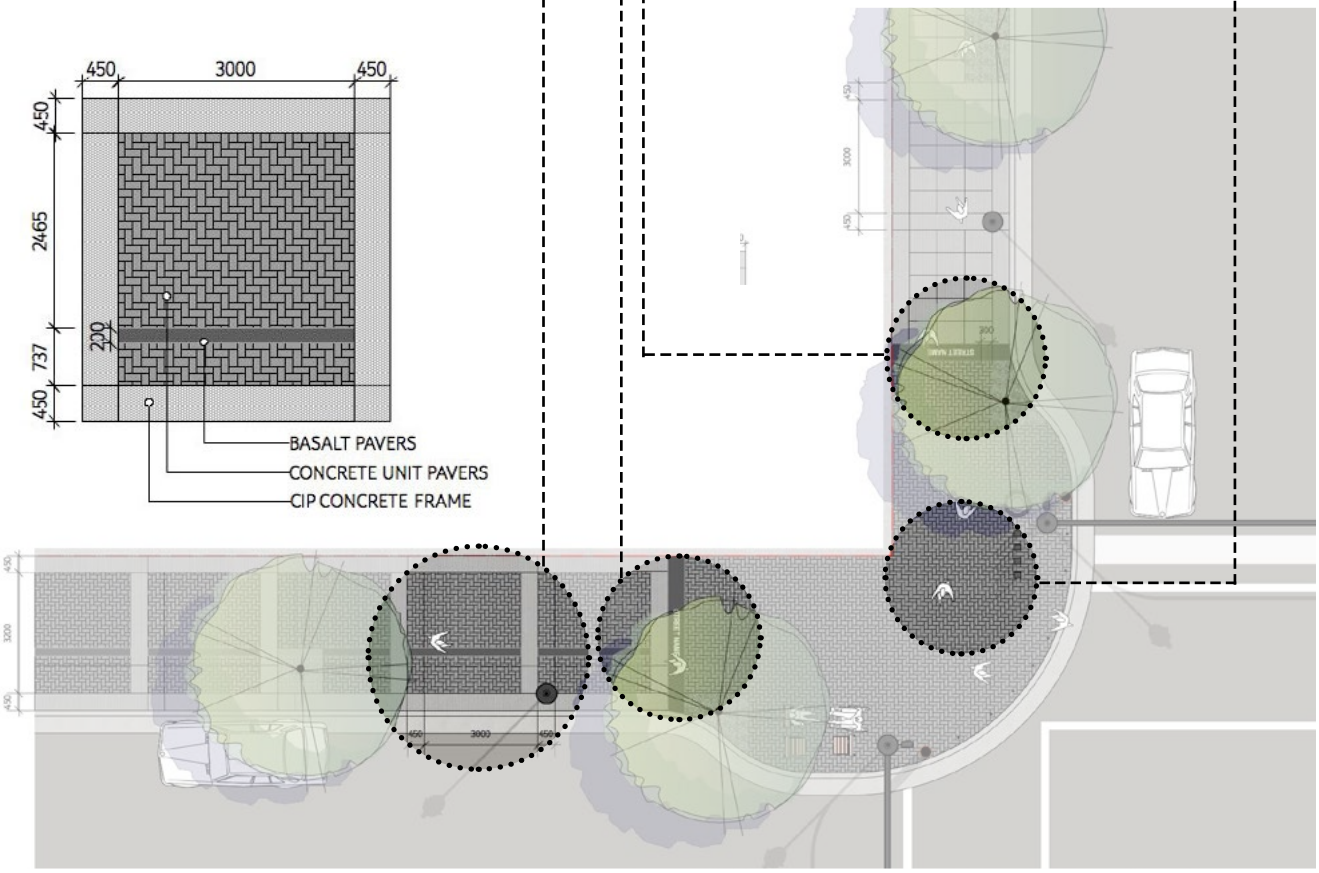
- Pattern: Concrete frame with concrete unit pavers fill and basalt band at boulevard edge
- Note: Architectural coordination takes priority over equal spacing of banding

4 PAVING FIELD

- Pattern: 90° Herringbone
- Installation: Mortar set



- Note: provide single row soldier course border banding surrounding the field of herring bone pattern



DOUGLAS STREET FURNISHING

Douglas Street is a divider between old heritage style and new Town more modern style furniture. By it's nature of transit oriented corridor it taken on more modern look with larger number of metal benches and bins and offers those more ornamental elements at feature locations and corners.
There is also few feature elements proposed for Douglas Street to infill larger sidewalk areas as well as create safer and more secluded pedestrian environment competing with busy traffic.

PEDESTRIAN LIGHT

Modern Heritage Style Light

- Application: All Locations
- Note: See lighting strategy for more details

BOLLARDS

TYPE B

Type B Bollard: Modern style

- Application: All locations

TRASH BINS

TYPE A

Type A: Modern Metal Bin

- Application: All locations
- Multi-stream recycling receptacles are to be used when appropriate on a case by case basis

BIKE RACK

Downtown Bike Rack

- Application: All locations

BENCHES

TYPE C

Type C: Metal modern bench

- Application: Sidewalks
- Note: This bench should not be used at corners

TYPE D

Type D: Industrial heritage style with back

- Application: Feature locations
- Corner bump outs

TYPE E

Type E: Industrial heritage style without back

- Application: Feature locations
- Corner bump outs

CHAIR

Chair Seat: Industrial heritage style with back

- Application: Corner bump outs at outdoor room zones
- Note: Minimum of 2 chairs shall be placed at each location

DOUGLAS STREET FEATURE ELEMENTS

Government Street Mall is a key Street in Old Town District and takes on the same furnishing suite with few feature elements added shown below.

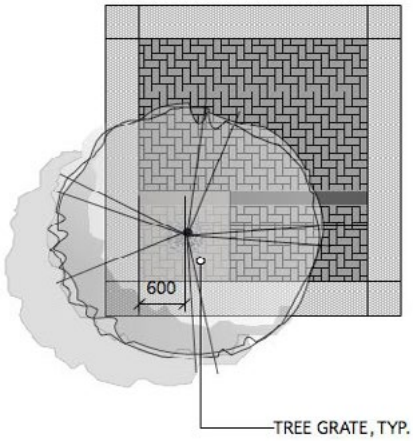
PLANTER RECOMMENDATIONS

Existing planters on Douglas Street should be considered for replacement and new planters should be added whenever possible to provide softer edge and separation from traffic along busy street.

The character of the new planters should adhere to the following set of recommendations:

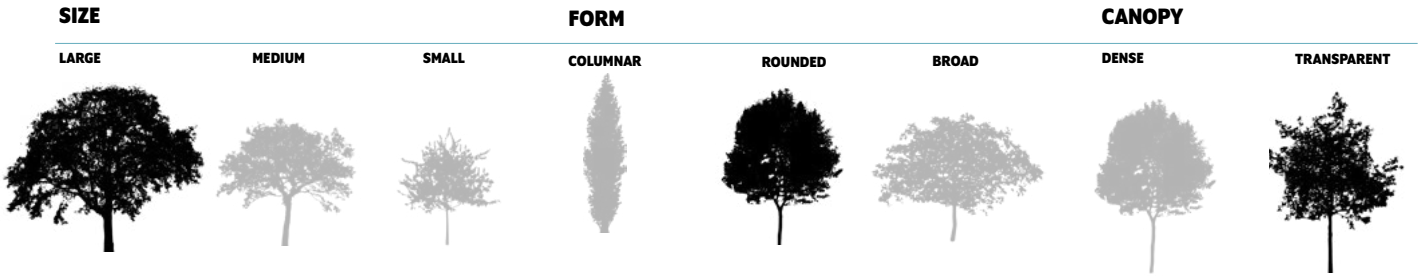
- Modern rectangular metal planters with or without wood seating options.
- Recommended application: Boulevard zone of the street.

TREE PLANTING RECOMMENDATIONS



Recommendations:

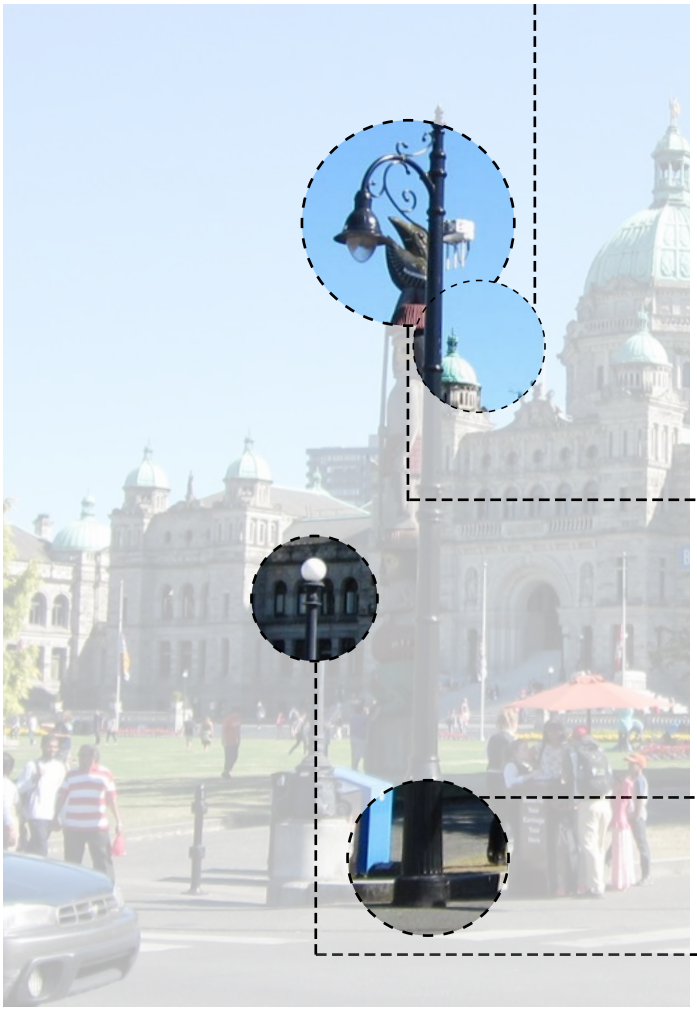
- Grand character.
- Large scale trees to establish and/or strengthen a street wall.
- High and large canopy to allow for truck ,bus and car circulation.
- Low maintenance.
- All new tree planted in tree grates with tree guards.
- Use of soil cell is highly recommended where possible.



DOUGLAS STREET LIGHTING STRATEGY

As discussed in Section 2.4 of this document, Douglas Street has the potential to become a Downtown Promenade and key transit corridor with slower traffic and priority given to transit and pedestrians. Over the long term, a substantial reconfiguration of Douglas Street should be undertaken to enable it to be the major rapid transit corridor and pedestrian promenade that it is envisioned to be.

New pedestrian and street light program for Douglas will improve the pedestrian environment while establishing a unique character and identity for this key downtown corridor.

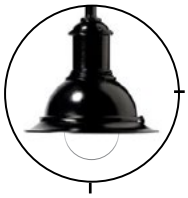


Unique banner strategy

- Unique design to Douglas Street.
- Banners to provide strong visual recognition to the corridor.
- Flexibility to promote seasonal events.

Street light strategy

- Replace all street lights with new design.
- Uniform street light design.



Street lights design guidelines

- Modern heritage style with visible light source.
- Ornamental decorative post arms to complement ornamental heritage bench. Could use similar motif.
- All street lights should be painted glossy black.
- Simple base.

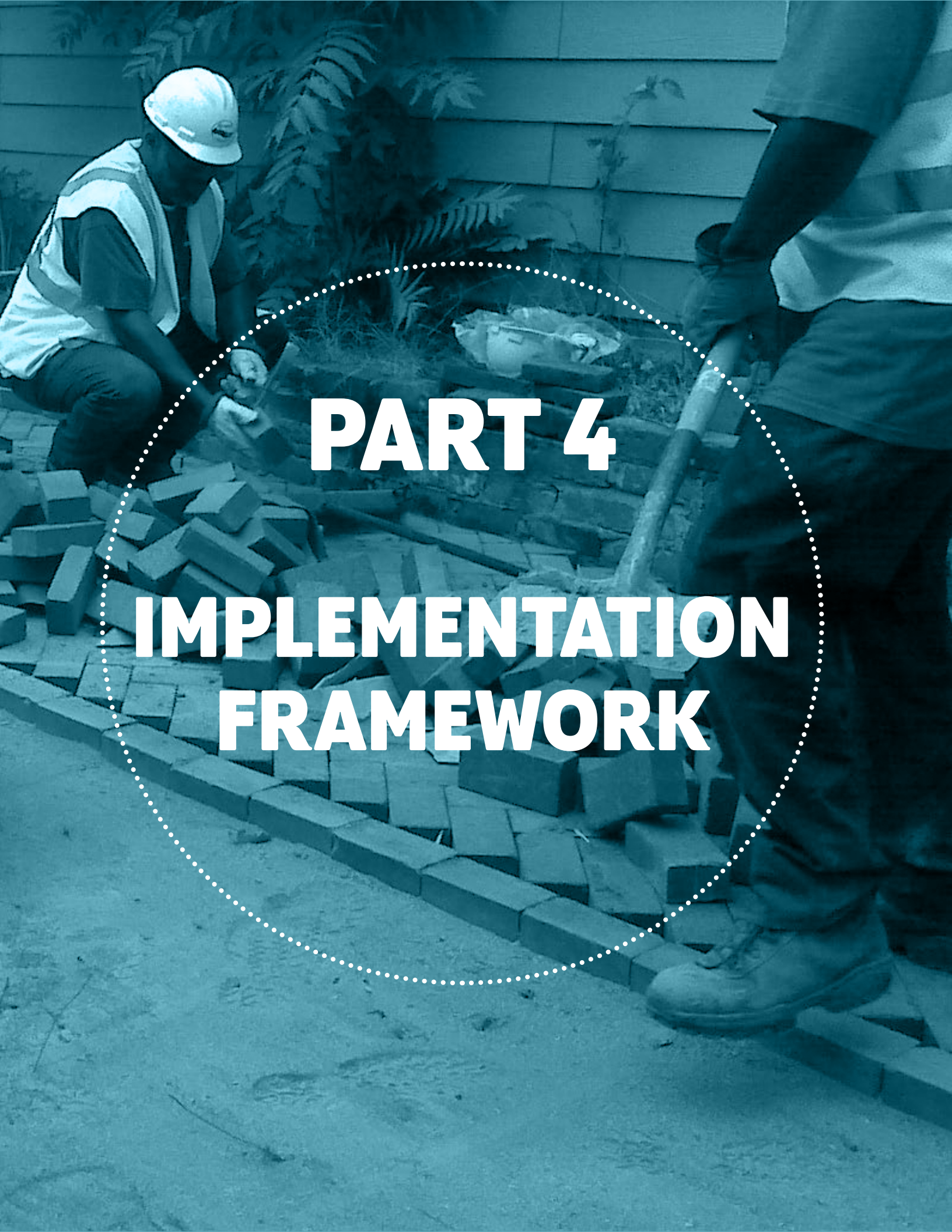
Use existing light bases

- Repaint all posts black to match all other street furnishing Downtown.

Pedestrian light strategy

- Replace all pedestrian lights with new design (to be detailed).
- Use a double standard and larger format of a standard light proposed for Rock Bay and New Town as a Pedestrian Light standard for Douglas Street.
- Mount as many pedestrian light to street light posts as possible.

this page was left blank intentionally



PART 4

IMPLEMENTATION FRAMEWORK

6 IMPLEMENTATION FRAMEWORK

The DPRP includes an updated catalogue of streetscape standards and identifies priority public realm improvements. The following is an implementation framework including identification of short medium and long term actions.

6.1 UPDATED STREETSCAPE STANDARDS

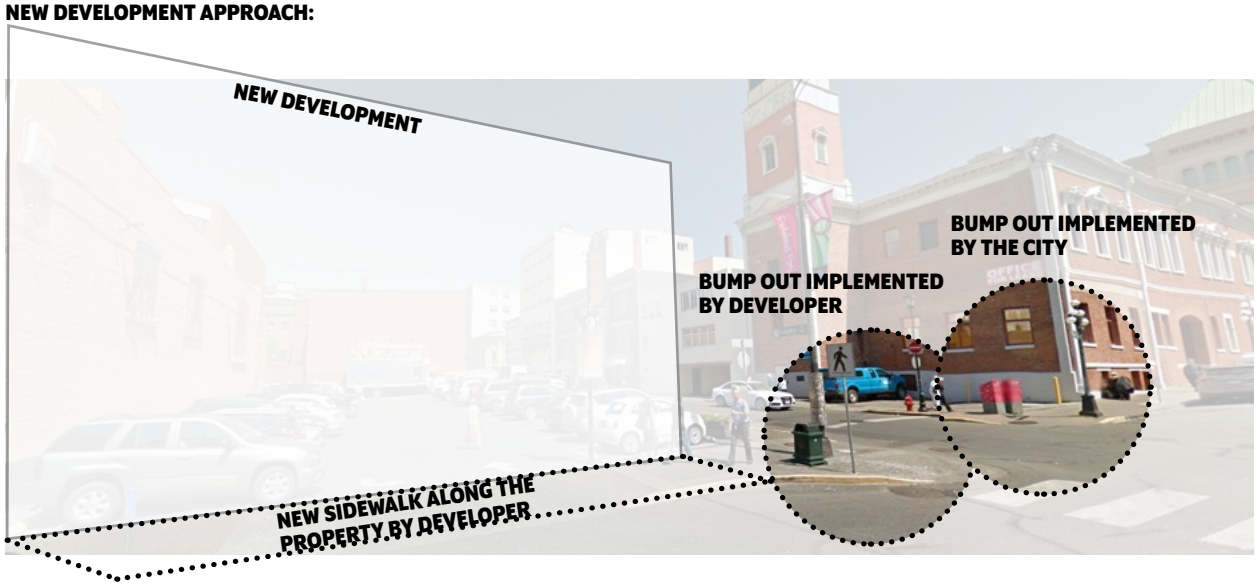
Implementation of the updated streetscape furnishing, materials and repainting will occur gradually overtime through a combination of the following three mechanisms:

6.1.1 DEVELOPER INITIATED IMPROVEMENTS

New streetscape standards will be implemented as part of improvements undertaken as part of new development in the downtown either through required frontage improvements or through negotiated public realm investments.

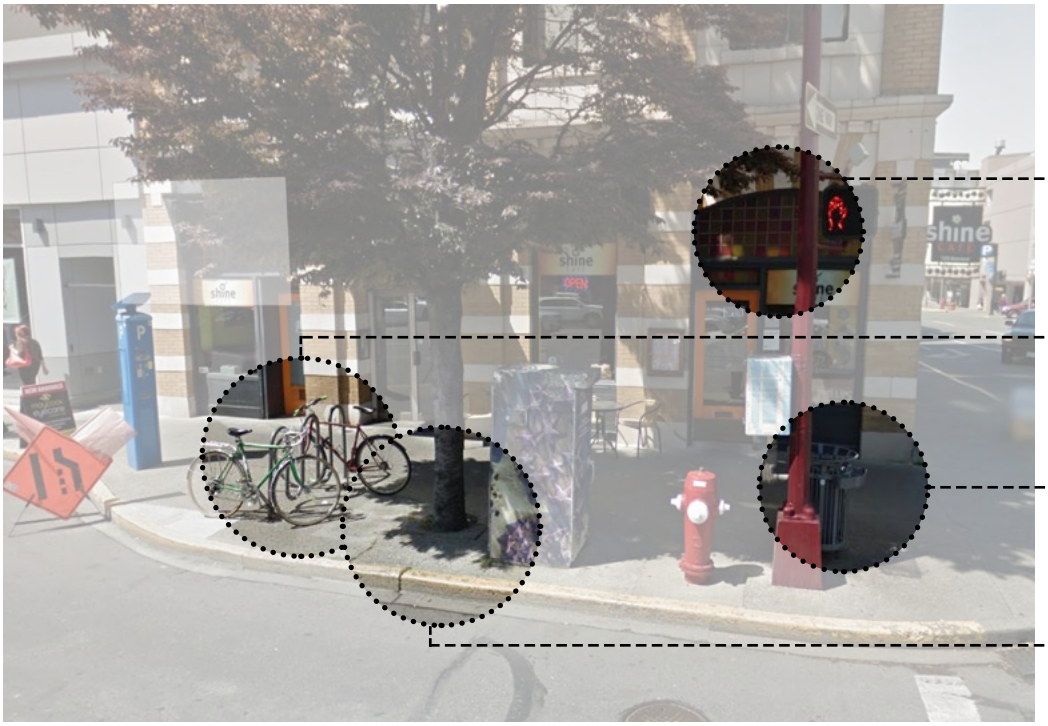
SIDEWALK REPAIR APPROACH:

NEW DEVELOPMENT APPROACH:



6.1.2 OPERATIONS AND MAINTENANCE PROGRAM

New Streetscape furnishing and materials specified in this plan will be implemented over time as part of the City's regular program of maintenance and replacement. This will include identification of priority streetscape improvement areas.



REPAINT

- Paint glossy black
- Add chairs

REMOVE

- Remove and replace old bike racks
- Add chairs

RELOCATE

- Move bin to furnishing zone
- Repaint black
- Add chairs

UPDATE

- Apply resin bound tree grate

6.1.3 CAPITAL PLAN AND PROJECTS

Priority public realm improvements identified in the Plan such as streetscape improvements to Government Streets and Douglas Street, updates to Centennial Square, and phased re-development of Ship Point, will be planned and implemented on a case-by-case basis through the financial planning process with funding sources and timing balanced with consideration of available resources and other City priorities based on Council Direction.

Listed below and cross referenced on the map to the right are some of the capital project areas.

1. **Centennial Square**
2. **Bastion Square**
3. **Reeson Park**
4. **Laurel Point**
5. **Belleville Plaza**
6. **Ship Point**
7. **Government Street**
8. **Douglas Street**

6.2 PRIORITY IMPROVEMENT PROJECTS

Major capital projects such as implementation of separated bike lanes and the Harbour Pathway will include implementation of the new streetscape standards where appropriate. Additionally, priority capital improvements may also be undertaken either on a stand alone basis or concurrently with other works (either public or private) to meet key strategic plan goals of the City. Once approved, these projects need to be incorporated into the work plans of effected departments if not already incorporated, and additional resources and budgets allocated.

6.2.1 SHORT TERM (0-5 YEARS)

	ACTION	DESCRIPTION	RESPONSIBILITY	PARTNERSHIPS	IN CURRENT WORKPLAN	PRIORITY LEVEL
1	Centennial Square Master Plan	» Undertake a Master Plan process for Centennial Square and adjacent buildings addressing short medium and long term objectives and site program directions established by this plan.	**Planning**	**DVBA**	**Yes**	**High**
2	Downtown Pedestrian Light Strategy	» Identify and specify new pedestrian light and implementation program as directed by this plan.	**Engineering and PW**	**-**	**No**	**Medium**
3	Conceptual Design for Douglas Street Corridor	» Undertake conceptual design to reconfigure Douglas Street within the downtown study area as a Transit Oriented Corridor and major pedestrian promenade as directed by this plan.	**Planning**	**DVBA**	**No**	**Medium**
4	Ship Point Master Plan Phase 1 Implementation	» Undertake a Master Plan based on the site and program objectives established by the harbour Vitality Principles and implement Phase 1.	**Planning**	**GVHA**	**Yes**	**High**
5	Conceptual And Detailed Design For Government Street Mall Extention (Yates To Herald Street) And Replacement of existing streetscape elements	» Undertake Conceptual and Detailed Design for Government Street from Yates to Herald Street based on objectives and design directions established by this plan, and in the context of the larger Government Street Corridor including incorporation of bike facilities, and reconfiguring the intersection of Wharf and Government Street as a major Downtown Gateway. » Based on detailed design and results of Action 8, Government Street will undergo a series of improvements from Yates Street to Herald Street. » Confirm design and location of new furnishing, planters, and street trees, as directed by this plan.	**Planning, Engineering, PW**	**DVBA**	**No**	**High**
6	Undertake a Waterfront Public Art Strategy	» The Arts Culture and Events department to spearhead a Waterfront Public Strategy.	**Arts and Culture**	**DVBA**	**No**	**Low**

6.2.2 MEDIUM TERM (5-10 YEARS)

	ACTION	DESCRIPTION	RESPONSIBILITY	PARTNERSHIPS	IN CURRENT WORKPLAN	PRIORITY LEVEL
9	Douglas Street Detailed Design	» Based on Conceptual design and results of Action 5, Douglas Street will undergo a series of improvements.	**Planning**	**DVBA, BC Transit**	**No**	**Medium**

6.2.3 LONG TERM (10+ YEARS)

	ACTION	DESCRIPTION	RESPONSIBILITY	PARTNERSHIPS	IN CURRENT WORKPLAN	PRIORITY LEVEL
10	Douglas Street Construction	» Construction of Douglas Street improvements based on detailed design and results of Action 12.	**Engineering and PW**	**DVBA, BC Transit**	**No**	**High**

6.2.4 DOWNTOWN PUBLIC REALM COMMITTEE

An interdepartmental Staff Working Group will be formed to monitor and identify implementation opportunities and provide guidance to capital projects related to public spaces in the downtown. The committee will be coordinated by the Planning Department and meet quarterly and more frequently as needed, and be made up of representation from the Arts and Culture, Engineering/Street Operations, Public Works, Parks, Planning and Engagement.

this page was left blank intentionally

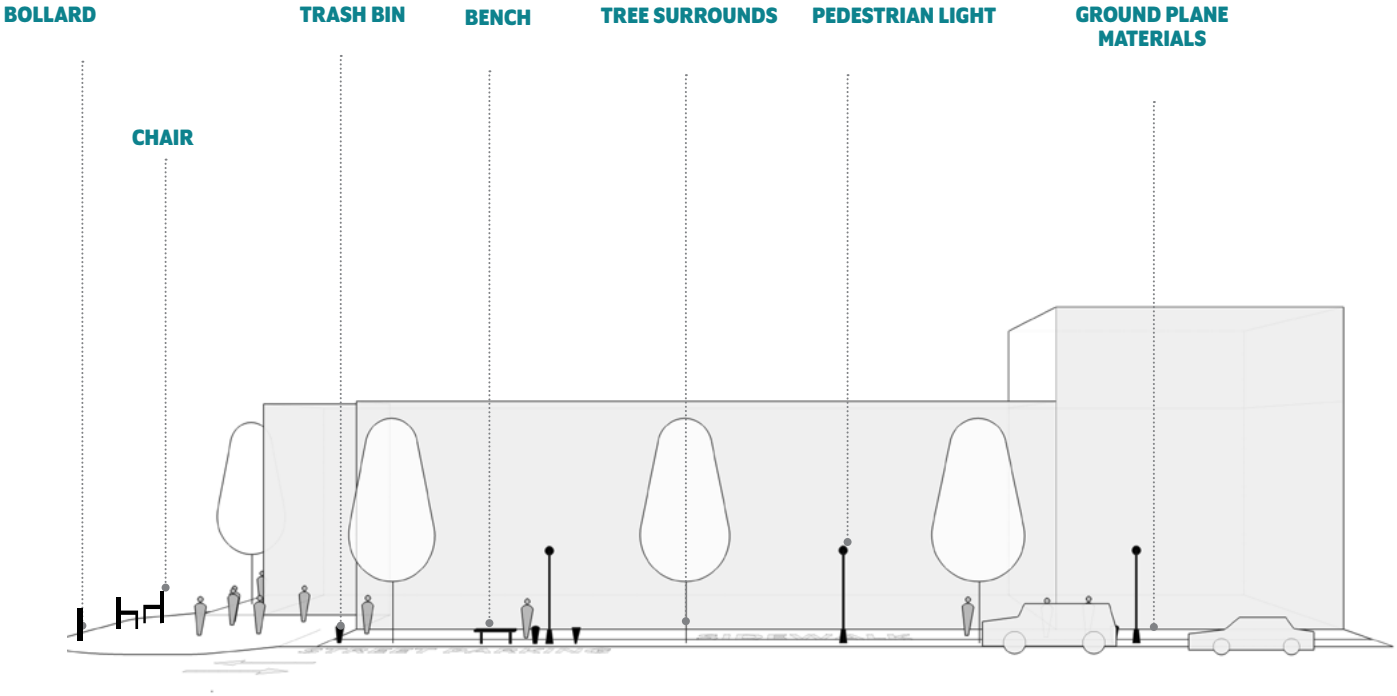
PART 5

STREETSCAPE ELEMENTS CATALOG

7 STREETSCAPE ELEMENTS CATALOG

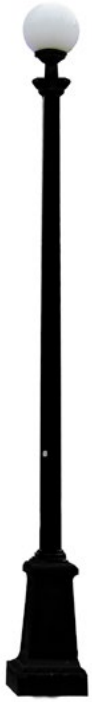
This Streetscape Elements Catalog Section replaces the Downtown Beautification "Kit of Parts" Manual first published in 1992.

This Streetscape Elements represent a catalog of all standard elements and paving materials for Downtown Victoria. Products and suppliers should match those specified within this document, or be equivalent (as approved by the City of Victoria).



SINGLE GLOBE LIGHT

PRODUCT TYPE: Pedestrian Light
PRODUCT NAME: Single Globe Light
DESIGN STYLE: Heritage Pre 1913
MATERIALS: Cast Iron with Opal Glass Globe
COLOUR/ FINISH: Glossy Black (RAL 9017) Enamel
DIMENSIONS: 17.5” Base, 14.3” Height
LIGHT SOURCE: LED
DISTRIBUTION: Inner Harbour, Old Town
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.



CLUSTER GLOBE LIGHT TYPE A

PRODUCT TYPE: Pedestrian Light
PRODUCT NAME: Cluster Globe Light Type A
DESIGN STYLE: Circular Heritage Cluster Pre1913
MATERIALS: Cast Iron with Opal Glass Globes
COLOUR/ FINISH: Glossy Black (RAL 9017) Enamel
DIMENSIONS: 17.5” Base, 14.3” Height
LIGHT SOURCE: LED
DISTRIBUTION: Inner Harbour, Old Town
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

CLUSTER GLOBE LIGHT TYPE B

PRODUCT TYPE: Pedestrian Light
PRODUCT NAME: Cluster Globe Light Type B
DESIGN STYLE: Aligned Heritage Cluster Pre1913
MATERIALS: Cast Iron with Opal Glass Globes
COLOUR/ FINISH: Glossy Black (RAL 9017) Enamel
DIMENSIONS: 17.5" Base, 14.3" Height
LIGHT SOURCE: LED
DISTRIBUTION: Inner Harbour, Old Town
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

SINGLE GLOBE WALL LIGHT

PRODUCT TYPE: Wall Light
PRODUCT NAME: Single Globe Wall Light
DESIGN STYLE: Heritage Pre 1913
MATERIALS: Cast Iron with Opal Glass Globe
COLOUR/ FINISH: Glossy Black (RAL 9017) Enamel
DIMENSIONS: Wall mounted
LIGHT SOURCE: LED
DISTRIBUTION: Inner Harbour, Old Town
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

BASTION SQUARE STREET LANTERN (DP1)

PRODUCT TYPE: Pedestrian Light
PRODUCT NAME: Bastion Square Street Lantern (DP1)
DESIGN STYLE: Heritage
MATERIALS: N/A
COLOUR/ FINISH: Glossy Black (RAL 9017) Enamel
DIMENSIONS: N/A
LIGHT SOURCE: LED
DISTRIBUTION: Bastion Square
MANUFACTURER: City of Victoria
SPECIAL NOTES: All existing lights should be maintained and be repainted black; All new lights shall be installed to match existing distribution.

CHINATOWN PAGODA LANTERN

PRODUCT TYPE: Pedestrian Light
PRODUCT NAME: Chinatown Pagoda Lantern
DESIGN STYLE: Chinatown Heritage
MATERIALS: Spun Aluminum Post with Molded Aluminum Lantern
COLOUR/ FINISH: Glossy Red (RAL 3002) and Yellow Accent Baked on Enamel
DIMENSIONS: N/A
LIGHT SOURCE: LED
DISTRIBUTION: Chinatown
MANUFACTURER: Modelcast Inc.
SPECIAL NOTES: All existing lights should be maintained; All new lights shall be installed to match existing distribution.

this page was left blank intentionally

MODERN HERITAGE SINGLE LIGHT

PRODUCT TYPE: Pedestrian Light
PRODUCT NAME: Modern Heritage Single Light
DESIGN STYLE: Modern Heritage
MATERIALS: Glossy Black (RAL 9017) Enamel
COLOUR/ FINISH: 12', 14', 16' Height
DIMENSIONS: Rock Bay, New Town
LIGHT SOURCE: LED
DISTRIBUTION:
MANUFACTURER: City of Victoria / Landscape Forms as alternative
SPECIAL NOTES: Detailed design to be provided by the City of Victoria. Image to the left shows the Ashbery Light from Landscape Forms as alternative option.

MODERN HERITAGE SINGLE LIGHT

PRODUCT TYPE: Wall Light
PRODUCT NAME: Modern Heritage Single Light
DESIGN STYLE: Modern Heritage
MATERIALS: Glossy Black (RAL 9017) Enamel
COLOUR/ FINISH: Wall Mounted
DIMENSIONS: Rock Bay, New Town, Douglas Street
LIGHT SOURCE: LED
DISTRIBUTION:
MANUFACTURER: City of Victoria / Landscape Forms as alternative
SPECIAL NOTES: Detailed design to be provided by the City of Victoria. Image to the left shows the Ashbery Light from Landscape Forms as alternative option.

MODERN HERITAGE DOUBLE LIGHT

PRODUCT TYPE:	Pedestrian Light
PRODUCT NAME:	Modern Heritage Double Light
DESIGN STYLE:	Modern Heritage
MATERIALS:	Glossy Black (RAL 9017) Enamel
COLOUR/ FINISH:	16' Height
DIMENSIONS:	Rock Bay, New Town, Douglas Street
LIGHT SOURCE:	LED
DISTRIBUTION:	
MANUFACTURER:	City of Victoria / Landscape Forms as alternative
SPECIAL NOTES:	Detailed design to be provided by the City of Victoria. Image to the left shows the Ashbery Light from Landscape Forms as alternative option.

HERITAGE BENCH

PRODUCT TYPE: Type A Wood Bench with Backrest
PRODUCT NAME: Heritage Bench
DESIGN STYLE: Heritage
MATERIALS: Cast Aluminum Frame with Oak Slats
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat Frame, Varnished Slats
DIMENSIONS: 6' Length, 18" Height
DISTRIBUTION: Inner Harbour, Old Town, Douglas Street, New Town
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

HERITAGE BENCH

PRODUCT TYPE: Type B Wood Bench Backless
PRODUCT NAME: Heritage Bench
DESIGN STYLE: Heritage
MATERIALS: Cast Aluminum Frame with Oak Slats
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat Frame, Varnished Slats
DIMENSIONS: 6' Length, 18" Height
DISTRIBUTION: Inner Harbour, Old Town, Douglas Street, New Town
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

HERITAGE CHAIR

PRODUCT TYPE:	Wood Chair with Backrest
PRODUCT NAME:	Heritage Chair
DESIGN STYLE:	Heritage
MATERIALS:	Cast Aluminum Frame with Oak Slats
COLOUR/ FINISH:	Glossy Black (RAL 9017) Baked-on Powder Coat Frame, Varnished Slats
DIMENSIONS:	2' Length, 18" Height
DISTRIBUTION:	Inner Harbour, Old Town, Douglas Street, New Town
MANUFACTURER:	City of Victoria
SPECIAL NOTES:	Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

INDUSTRIAL HER$ITAGE BENCH

PRODUCT TYPE: Type D Metal Bench with Back
PRODUCT NAME: Industrial Heritage Bench
DESIGN STYLE: Industrial Heritage
MATERIALS: Steel Fame + Steel Rod Seat
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 14' Width
DISTRIBUTION: Rock Bay, Douglas Street
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

INDUSTRIAL HERITAGE CHAIR

PRODUCT TYPE: Metal Chair
PRODUCT NAME: Industrial Heritage Chair
DESIGN STYLE: Industrial Heritage
MATERIALS: Steel Fame + Steel Rod Seat
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 2' Width
DISTRIBUTION: Rock Bay, Douglas Street
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

METAL MODERN BENCH

PRODUCT TYPE: Type C Metal Backless Bench Arms Removed
PRODUCT NAME: Metal Modern Bench
DESIGN STYLE: Modern
MATERIALS: Steel Bar and Round Rod
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 6' Length, 17" Height
DISTRIBUTION: Inner Harbour, Old Town, New Town, Rock Bay, Douglas Street
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

STANDARD BENCH

PRODUCT TYPE: Type E Metal Bench Backless
PRODUCT NAME: Standard Bench
DESIGN STYLE: Industrial Heritage
MATERIALS: Steel Fame + Steel Rod Seat
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 14' Width
DISTRIBUTION: Rock Bay, Douglas Street
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

CHINATOWN HER$ITAGE BENCH

PRODUCT TYPE: Type D Metal Bench with Back
PRODUCT NAME: Industrial Heritage Bench
DESIGN STYLE: Industrial Heritage
MATERIALS: Steel Fame + Steel Rod Seat
COLOUR/ FINISH: Glossy Red (RAL 3002) Baked-on Powder Coat
DIMENSIONS: 14' Width
DISTRIBUTION: Chinatown
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

CHINATOWN HERITAGE BENCH

PRODUCT TYPE: Type E Metal Bench Backless
PRODUCT NAME: Standard Bench
DESIGN STYLE: Industrial Heritage
MATERIALS: Steel Fame + Steel Rod Seat
COLOUR/ FINISH: Glossy Red (RAL 3002) Baked-on Powder Coat
DIMENSIONS: 14' Width
DISTRIBUTION: Chinatown
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

CHINATOWN HERITAGE CHAIR

PRODUCT TYPE: Metal Chair
PRODUCT NAME: Industrial Heritage Chair
DESIGN STYLE: Industrial Heritage
MATERIALS: Steel Fame + Steel Rod Seat
COLOUR/ FINISH: Glossy Red (RAL 3002) Baked-on Powder Coat
DIMENSIONS: 2' Width
DISTRIBUTION: Chinatown
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

STANDARD BENCH

PRODUCT TYPE: Type C Metal Bench Backless
PRODUCT NAME: Standard Bench
DESIGN STYLE: Industrial Heritage
MATERIALS: Steel Fame and Steel Rod Seat
COLOUR/ FINISH: Glossy Red (RAL 3002) Baked-on Powder Coat Frame and Slats
DIMENSIONS: 6' Length, 18" Height
DISTRIBUTION: Chinatown
MANUFACTURER: City of Victoria
SPECIAL NOTES: Detailed design to be provided by the City of Victoria; see Character area section of Streetscape Standards for specific location guidelines.

MODERN METAL BENCH

PRODUCT TYPE: Type F Metal Bench with Backrest
PRODUCT NAME: Modern Metal Bench
DESIGN STYLE: Modern
MATERIALS: Steel Frame and Slats
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat Frame
DIMENSIONS: 5’11.25’ Length,2’7.19” Height
DISTRIBUTION: Rock Bay, New Town
MANUFACTURER: Maglin Site Furniture
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

MODERN METAL BENCH

PRODUCT TYPE: Type G Metal Bench Backless
PRODUCT NAME: Modern Metal Bench
DESIGN STYLE: Modern
MATERIALS: Steel Frame and Slats
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 5’10’ Length, 1’11.24” Height
DISTRIBUTION: Rock Bay, New Town
MANUFACTURER: Maglin Site Furniture
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

MODERN WOOD BENCH

PRODUCT TYPE: Type H Wood Bench with Backrest
PRODUCT NAME: Modern Wood Bench
DESIGN STYLE: Modern
MATERIALS: Steel Frame and Ipe Wood Slats
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat Frame, Varnished Slats
DIMENSIONS: 5'11.25' Length,2'7.19" Height
DISTRIBUTION: Rock Bay, New Town
MANUFACTURER: Maglin Site Furniture
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

MODERN WOOD BENCH

PRODUCT TYPE: Type I Wood Bench Backless
PRODUCT NAME: Modern Wood Bench
DESIGN STYLE: Modern
MATERIALS: Steel Frame and Ipe Wood Slats
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat Frame, Varnished Slats
DIMENSIONS: 5'10' Length, 1'11.24" Height
DISTRIBUTION: Rock Bay, New Town
MANUFACTURER: Maglin Site Furniture
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

CAUSEWAY HERITAGE BOLLARD

PRODUCT TYPE: Type A Bollard
PRODUCT NAME: Causeway Heritage Bollard
DESIGN STYLE: Heritage
MATERIALS: Cast Aluminum
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 11" Square Base, 38" Height
DISTRIBUTION: Inner Harbour, Old Town
MOUNTING: Surface Mount, Bolted to Concrete
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

RELIANCE FOUNDRY BOLLARD

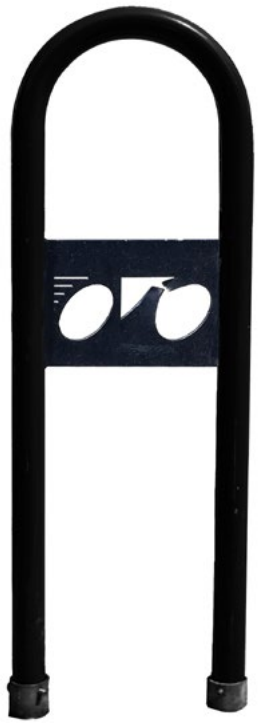
PRODUCT TYPE: Type B Bollard
PRODUCT NAME: Reliance Foundry Bollard
DESIGN STYLE: Standard
MATERIALS: Ductile Iron
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 35" Height
DISTRIBUTION: Inner Harbour, Old Town, Rock Bay, New Town, Government Street, Douglas Street
MOUNTING: Surface Mount, Bolted to Concrete
MANUFACTURER: Reliance Foundry
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

RELIANCE FOUNDRY BOLLARD

PRODUCT TYPE:	Type B Bollard
PRODUCT NAME:	Reliance Foundry Bollard
DESIGN STYLE:	Standard
MATERIALS:	Ductile Iron
COLOUR/ FINISH:	Glossy Red (RAL 3002) Baked-on Powder Coat
DIMENSIONS:	35” Height
DISTRIBUTION:	Chinatown
MOUNTING:	Surface Mount, Bolted to Concrete
MANUFACTURER:	Reliance Foundry
SPECIAL NOTES:	See Character area section of Streetscape Standards for specific location guidelines.

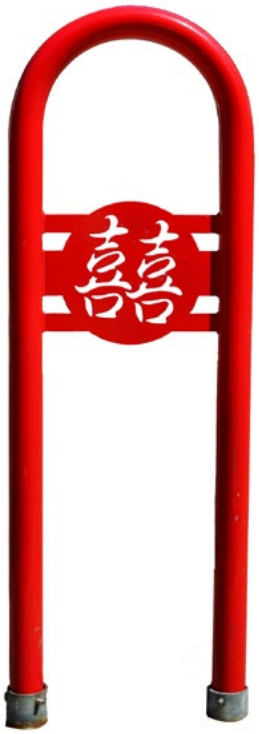
STANDARD BIKE RACK

PRODUCT TYPE: 2 Capacity Bike Rack
PRODUCT NAME: Standard Bike Rack
DESIGN STYLE: Standard
MATERIALS: 1.5” Galvanized Steel Pipe
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 12” Length, 3’ Height
DISTRIBUTION: Inner Harbour, Old Town, Rock Bay, New Town, Government Street, Douglas Street
MOUNTING: Sleeve Mount
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.



CHINATOWN BIKE RACK

PRODUCT TYPE: 2 Capacity Bike Rack
PRODUCT NAME: Chinatown Bike Rack
DESIGN STYLE: Chinatown Heritage
MATERIALS: 1.5” Galvanized Steel Pipe and Steel Bar
COLOUR/ FINISH: Glossy Red (RAL 3002) Baked-on Powder Coat
DIMENSIONS: 12” Length, 3’ Height
DISTRIBUTION: Chinatown
MOUNTING: Sleeve Mount
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.



MODERN METAL BIN

PRODUCT TYPE: Type A Litter Bin with Recycling Component
PRODUCT NAME: Modern Metal Bin
DESIGN STYLE: Modern
MATERIALS: Metal Frame
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 42" Height
DISTRIBUTION: Inner Harbour, Old Town, Rock Bay, New Town, Government Street, Douglas Street
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

HERITAGE BIN

PRODUCT TYPE: Type B Litter Bin
PRODUCT NAME: Heritage Bin
DESIGN STYLE: Heritage
MATERIALS: Cast Aluminum with Polyethylene Liner
COLOUR/ FINISH: Two toned- Glossy Black (RAL 9017) and Light Grey Enamel
DIMENSIONS: 36" Height, 22" Square
DISTRIBUTION: Inner Harbour, Old Town
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

MULTI-STREAM RECEPTACLE

PRODUCT TYPE: Multi-stream Receptacle
PRODUCT NAME: Modern Multi-stream Receptacle
DESIGN STYLE: Modern
MATERIALS: Metal Frame
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS: 32.5" Height
DISTRIBUTION: Inner Harbour, Old Town, Rock Bay, New Town, Government Street, Douglas Street
MANUFACTURER: City of Victoria
SPECIAL NOTES: These receptacles are available for use as appropriate when approved by the City of Victoria.

CHINATOWN CLASSIC LITTER BIN

PRODUCT TYPE: Litter Bin with Recycling Component
PRODUCT NAME: Chinatown Classic Litter Bin
DESIGN STYLE: Chinatown Standard
MATERIALS: Metal Frame
COLOUR/ FINISH: Glossy Red (RAL 3002) Baked-on Powder Coat
DIMENSIONS: 42" Height
DISTRIBUTION: Chinatown
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

GREEN CIRCULAR PLANTER AND BENCH

PRODUCT TYPE: Planter and Bench
PRODUCT NAME: Green Circular Planter and Bench
DESIGN STYLE: Contemporary
MATERIALS: Aluminum and Cumaru Hardwood
COLOUR/ FINISH: Powder Coated Aluminum and Untreated FSC Hardwood
DIMENSIONS: 48" D
DISTRIBUTION: Government Street,
MANUFACTURER: Street Life
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

METAL TREE GUARD

PRODUCT TYPE: Tree Guard
PRODUCT NAME: Metal Tree Guard
DESIGN STYLE: Contemporary
MATERIALS: Metal
COLOUR/ FINISH: Glossy Black (RAL 9017) Baked-on Powder Coat
DIMENSIONS:
DISTRIBUTION: Inner Harbour, Old Town, Rock Bay, New Town, Government Street, Douglas Street
MANUFACTURER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

ROUND TREE GRATE

PRODUCT TYPE: Tree Grate
PRODUCT NAME: Round Tree Grate
DESIGN STYLE: Contemporary
MATERIALS: Metal
COLOUR/ FINISH:
DIMENSIONS: min. 48” D
DISTRIBUTION:
MANUFACTURER: Dobney Foundry Ltd.
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

SQUARE TREE GRATE

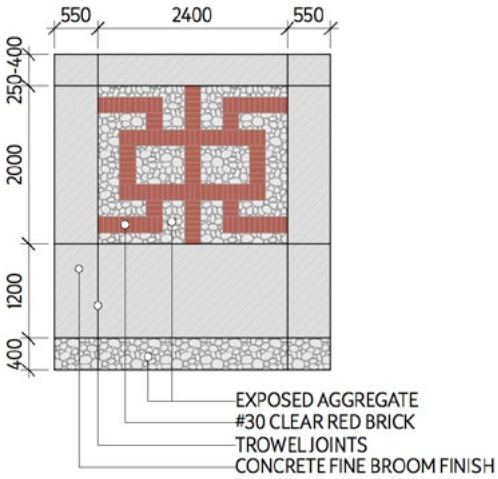
PRODUCT TYPE: Tree Grate
PRODUCT NAME: Square Tree Grate
DESIGN STYLE: Contemporary
MATERIALS: Metal
COLOUR/ FINISH:
DIMENSIONS: 48” W
DISTRIBUTION:
MANUFACTURER: Dobney Foundry Ltd.
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

TACTILE DOMER

PRODUCT TYPE:	Tactile Buttons
PRODUCT NAME:	Tactile Dome
DESIGN STYLE:	Carborundum- Non-slip
MATERIALS:	Stainless Steel 316, Marine Grade
COLOUR/ FINISH:	Stainless Steel
DIMENSIONS:	0.9” Diameter
DISTRIBUTION:	Inner Harbour, Old Town, Chinatown, Rock Bay, New Town, Goverment Street, Douglas Street
MANUFACTURER:	Advantage Tactile Systems
SPECIAL NOTES:	See Character area section of Streetscape Standards for specific location guidelines.

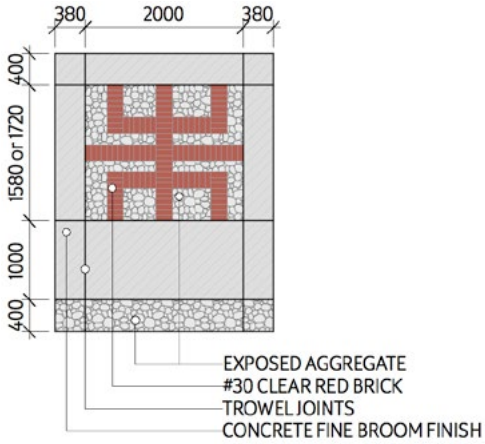
CHINATOWN CHARACTER PAVING - LINKED

PATTERN TYPE: Chinatown Character Paving Pattern
PATTERN NAME: Character Paving Pattern- Linked
INSTALLATION METHOD: Cast-in-place
COLOUR/ FINISH: See drawing
DIMENSIONS: See drawing
APPLICATION: Sidewalk Patterning
SPACING: See drawing
DISTRIBUTION: Chinatown
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.



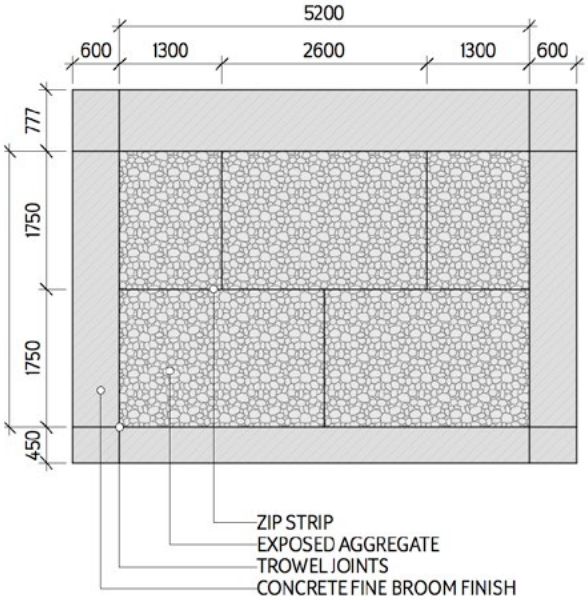
CHINATOWN CHARACTER PAVING - LONGEVITY

PATTERN TYPE: Chinatown Character Paving
PATTERN NAME: Character Paving Pattern- Longevity
INSTALLATION METHOD: Cast-in-place
COLOUR/ FINISH: See drawing
DIMENSIONS: See drawing
APPLICATION: Sidewalk Patterning
SPACING: See drawing
DISTRIBUTION: Chinatown
SPECIAL NOTES: 2 different pattern sizes (1580 or 1720); See Character area section of Streetscape Standards for specific location guidelines.



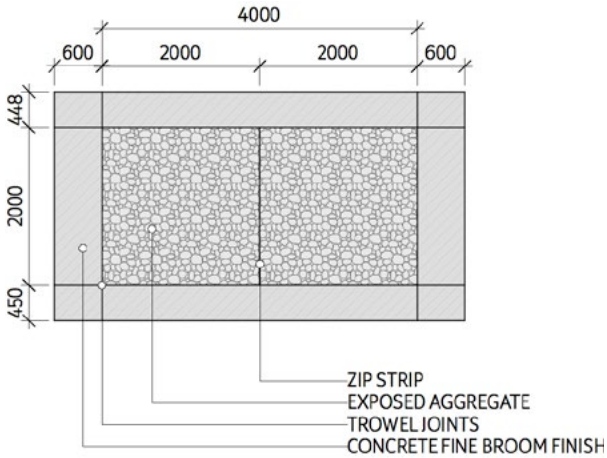
CHINATOWN PAVING PATTERN TYPE A

PATTERN TYPE: Chinatown Paving Pattern
PATTERN NAME: Paving Pattern Type A
INSTALLATION METHOD: Cast-in-place
COLOUR/ FINISH: See drawing
DIMENSIONS: See drawing
APPLICATION: Sidewalk Patterning
SPACING: See drawing
DISTRIBUTION: Chinatown
SPECIAL NOTES: For sidewalk areas where character pavings cannot be accommodated only.



CHINATOWN PAVING PATTERN TYPE B

PATTERN TYPE: Chinatown Paving Pattern
PATTERN NAME: Paving Pattern Type B
INSTALLATION METHOD: Cast-in-place
COLOUR/ FINISH: See drawing
DIMENSIONS: See drawing
APPLICATION: Sidewalk Patterning
SPACING: See drawing
DISTRIBUTION: Chinatown
SPECIAL NOTES: For sidewalk areas where character pavings cannot be accommodated only.



CONCRETE BAND

PRODUCT TYPE: Concrete Banding
PRODUCT NAME: Concrete Band
INSTALLATION METHOD: Cast-in-place
COLOUR/ FINISH: Natural
DIMENSIONS: 450mm Wide
APPLICATION: Sidewalk Patterning
SPACING: 3m Min. or to Match Architectural Elements When Possible
DISTRIBUTION:
SUPPLIER:
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

CONCRETE BROOM FINISH

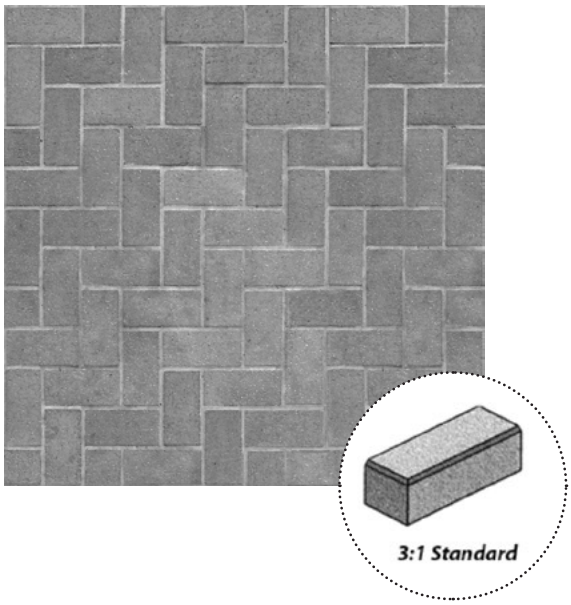
PRODUCT TYPE: Concrete Paving
PRODUCT NAME: Concrete Broom Finish
INSTALLATION METHOD: Cast-in-place
COLOUR/ FINISH: Natural Broom Finish
DIMENSIONS: 450mm Wide
APPLICATION: Sidewalk Frame
DISTRIBUTION:
SUPPLIER:
SPECIAL NOTES: See sidewalk finishing tools section in of the catalog for details on finish and tools; see Character area section of Streetscape Standards for specific location guidelines.

TROWEL JOINT CONCRETE

PRODUCT TYPE: Concrete Paving
PRODUCT NAME: Trowel Joint Concrete
INSTALLATION METHOD: Cast-in-place
INSTALLATION NOTE: Prior to broom finish application, trowel out shoulder to leave only a score line.
COLOUR/ FINISH: Fine Broom Brush
DIMENSIONS: Plan Specific
APPLICATION: Sidewalk Fill
DISTRIBUTION:
SUPPLIER:
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

CONCRETE UNIT PAVER

PRODUCT TYPE: Concrete Paving
PRODUCT NAME: Concrete Unit Paver
INSTALLATION METHOD: Sand Bed
COLOUR/ FINISH: Natural Grey Unsealed
DIMENSIONS: 225mm Width x 75mm Depth x 60mm Thick
APPLICATION: Paving Field
DISTRIBUTION:
SUPPLIER: Abbotsford Concrete Products Ltd.
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.



CONCRETE UNIT PAVER

PRODUCT TYPE: Concrete Unit Paving
PRODUCT NAME: Concrete Unit Paver
INSTALLATION METHOD: Mortar Set
COLOUR/ FINISH: Charcoal Grey
DIMENSIONS: 225mm Width x 75mm Depth x 60mm Thick
APPLICATION: Main Sidewalk Paving Between Concrete Banding and Corner Bump Outs
DISTRIBUTION:
SUPPLIER: Abbotsford Concrete Products Ltd.
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

BASALT BAND

PRODUCT TYPE: Basalt Banding
PRODUCT NAME: Basalt Band
INSTALLATION METHOD: Mortar Set
COLOUR/ FINISH: Natural Broom Finish
DIMENSIONS: 300mm Wide Stack Bond Soldier Course
APPLICATION: Entry Banding, Boulevard Band
DISTRIBUTION:
SUPPLIER: Bedrock Natural Stone
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

BASALT PAVER

PRODUCT TYPE: Type A Basalt Paving
PRODUCT NAME: Basalt Paver
INSTALLATION METHOD: Mortar Set
COLOUR/ FINISH: Charcoal Grey, Flame Finish
DIMENSIONS: 300mm Wdith x 150mm Depth x 80mm Thick
APPLICATION: Feature Banding
DISTRIBUTION:
SUPPLIER: Bedrock Natural Stone
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

BASALT PAVER

PRODUCT TYPE: Type A Basalt Paving
PRODUCT NAME: Basalt Paver
INSTALLATION METHOD: Mortar Set
COLOUR/ FINISH: Charcoal Grey, Flame Finish
DIMENSIONS: 300mm Wdith x 450mm Depth x 80mm Thick
APPLICATION: Entry Banding
DISTRIBUTION:
SUPPLIER: Bedrock Natural Stone
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

GRANITE PAVERS

PRODUCT TYPE: Granite Paving
PRODUCT NAME: Granite Pavers
INSTALLATION METHOD: Mortar Set
COLOUR/ FINISH: Grey, Flame Finish
DIMENSIONS: 300mm Width x 100mm Depth x 80mm Thick
APPLICATION: Paving Field
DISTRIBUTION:
SUPPLIER: Abbotsford Concrete Products Ltd.
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

EXPOSED AGGREGATE

PRODUCT TYPE: Exposed Aggregate Paving
PRODUCT NAME: Exposed Aggregate
INSTALLATION METHOD: Cast-in-place
COLOUR/ FINISH: Dark Grey
DIMENSIONS: Fit to Size
APPLICATION: Main Paving Field at Corners
DISTRIBUTION: Chinatown
SUPPLIER: Bedrock Natural Stone
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

RESIN BOUND POROUS SURFACING

PRODUCT TYPE: Resin Bound Surfacing
PRODUCT NAME: Resin Bound Porous Surfacing
INSTALLATION METHOD: Pour-in-place
COLOUR/ FINISH: Natural Grey, Smooth Finish
DIMENSIONS: Varies to Fit the Paving Grid
APPLICATION: Tree Grates
DISTRIBUTION: Inner Harbour, Old Town, Chinatown, Rock Bay, New Town, Goverment Street, Douglas Street
SUPPLIER: Romex Canada West
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

HERITAGE WOOD PAVER

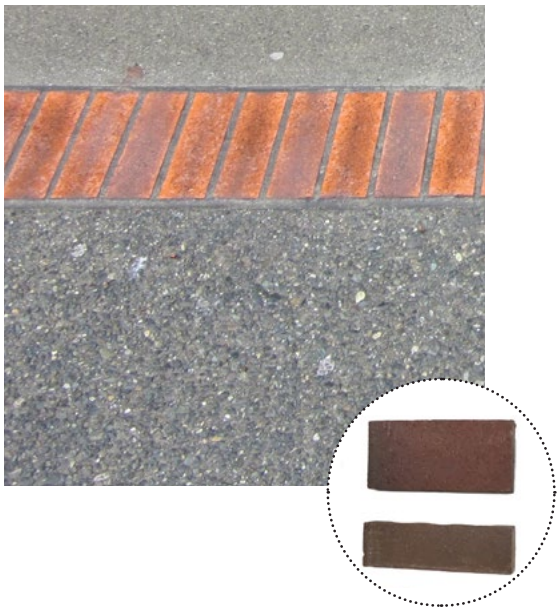
PRODUCT TYPE: Wood Paving
PRODUCT NAME: Heritage Wood Paver
INSTALLATION METHOD:
COLOUR/ FINISH: Wood
DIMENSIONS: 7.75inch Lenth x 2.75” Width
APPLICATION: Main Alley Paving
DISTRIBUTION: Waddington Alley
SUPPLIER: City of Victoria
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

BRICK PAVER

PRODUCT TYPE: Brick Paving Type A
PRODUCT NAME: Brick Paver
INSTALLATION METHOD: Mortar Set
COLOUR/ FINISH:
DIMENSIONS: 94mm Width x 194mm Depth x 25mm Thick
APPLICATION: Main Paving Field, Boulevard Band
DISTRIBUTION:
SUPPLIER: Interstate Brick
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

BRICK PAVER

PRODUCT TYPE: Brick Paving Type B
PRODUCT NAME: Brick Paver
INSTALLATION METHOD: Mortar Set
COLOUR/ FINISH: Orange Red, Smooth Finish
DIMENSIONS: 94mm Width x 194mm Depth x 57mm Thick
APPLICATION: Feature Banding
DISTRIBUTION:
SUPPLIER: Interstate Brick
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

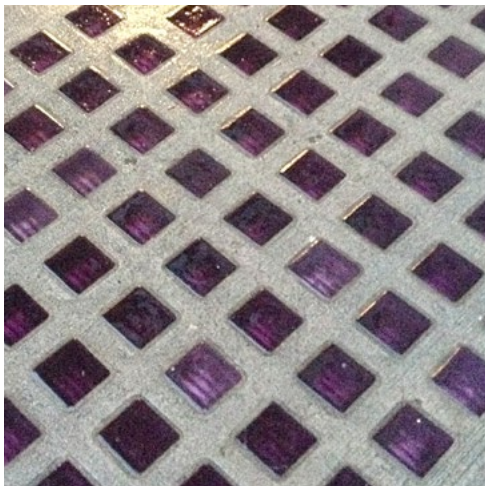


BRICK PAVER

PRODUCT TYPE: Brick Paving Type C
PRODUCT NAME: Brick Paver
INSTALLATION METHOD: Mortar Set
COLOUR/ FINISH: Clear Red, Honed Finish
DIMENSIONS: 94mm Width x 194mm Depth x 25mm Thick
APPLICATION: Paving Field
DISTRIBUTION:
SUPPLIER: Interstate Brick
SPECIAL NOTES: See Character area section of Streetscape Standards for specific location guidelines.

HERITAGE PAVING PRISM

PRODUCT TYPE: Paving Prism
PRODUCT NAME: Heritage Paving Prism
DESIGN STYLE:
MATERIALS: Glass
COLOUR/ FINISH:
DIMENSIONS:
DISTRIBUTION:
MANUFACTURER:
SPECIAL NOTES: All existing prisms to be maintained and paved around.



TROWEL TOOL

16" x 4" Carbon Steel Cement Trowel with ProForm® Soft Grip Handle

- OR EQUIVALENT

Kraft Tool Co.® Carbon Steel Finishing Trowel
Professional Quality, Precision Balanced, and Ready to Use. High quality carbon steel finishing trowel is precision balanced and ready-to-use. Each blade is cross ground to just the right dimension for that perfect feel. A high-strength, lightweight aluminum mounting stands up to the rigors of concrete work. Compression fit stainless steel rivets attach the mounting to the 16" x 4" blade. An oversized toe rivet provides extra strength when applying pressure during finish work. Guaranteed No-Turn handle design locks the handle to mounting. Kraft Tool's signature flat trowel with patented ProForm® soft grip handle (US Patent #6,247,204 B1) provides a comfortable grip. The bright orange handle is easy to spot on a jobsite even after use. The contoured shape and enhanced texture ribbing of the handle reduces fatigue and provides a great grip even when wet. Proudly made in the USA.

- Cross ground carbon steel blade for perfect feel
- Guaranteed "NO TURN" handle design locks handle to high-strength mounting
- Compression fit stainless steel rivets
- Texture ribbing on handle provides a great grip and reduces fatigue

Item ID	CF222PF
Weight	1.00 LB (0.45 kg)
Length	16 in. (40.64 cm)
Width	4 in. (10.16 cm)
Height	3.625 in. (9.20750 cm)
Thickness	0.026 in. (0.06604 cm)
Shank	Aluminum
Material	Carbon Steel Blade; Aluminum Mounting; ProForm® Handle
Finish	Cross Ground
Package Contents	Trowel
Blade Material	Carbon Steel
Blade Length	16 in. (40.64 cm)
Blade Type	Carbon Steel
Handle	ProForm® (U.S. Patent #6,247,204 B1) (
Handle Material	ProForm® Soft Grip
Handle Length	5 in. (12.70 cm)
Accessories	Trowel Sharpener (CF200)

CONCRETE FINISHING BROOM

- OR EQUIVALENT

24" Green Nylex® Soft Finish Broom with Handle

Green Nylex Soft Finish Broom

- Soft concrete finish broom with 5' wood handle
- Memory resistant soft green Nylex bristles

Item ID	CC454
Weight	1.50 LB (0.68 kg)
Material	Nylex™
Handle	Threaded (CC163)
Handle Material	Wood
Handle Length	60 in. (152.40 cm)
Trim Material	Soft Green Nylex®

PRODUCT CUT SHEETS

landscapeforms®

ASHBERY PEDESTRIAN

Product Data Sheet

Ashbery is a trio of lights that brings together advanced LED technology and optics with an homage to traditional-style lights that have a special place in the American lexicon. The pedestrian light is offered in 12', 14' and 16' heights and is ideal for campuses, parks and plazas, helping to create public spaces that are usable 24 hours a day. Options include single luminaires or a double-mount option for dual luminaires, one on either side of the pole. Patent-pending glare control requires less eye adaptation, enabling lower light levels and lower energy use with excellent visual acuity, while tenon-mounted luminaires can be retrofitted in the field. Cast aluminum parts in a full color palette are finished with Landscape Forms proprietary Pangard II® HAPS, VOC, lead-free polyester powdercoat.

Lighting Facts®

Landscape Forms is committed to the development of energy efficient lighting. We participate in the Department of Energy Lighting Facts® label program. This activity is voluntary but helps consumers evaluate the multitude of products on the market today. The Lighting Facts® label provides a quick but comprehensive summary of luminaire performance as measured by the IESNA LM-79 photometric test standard for solid state lighting.

Electrical

Surge protected 100V-277V 50/60 Hz, Class 2 LED dimmable driver. LED cartridge with weatherproof quick disconnect provides ease of installation and serviceability. Ashbery Pedestrian ships prewired.

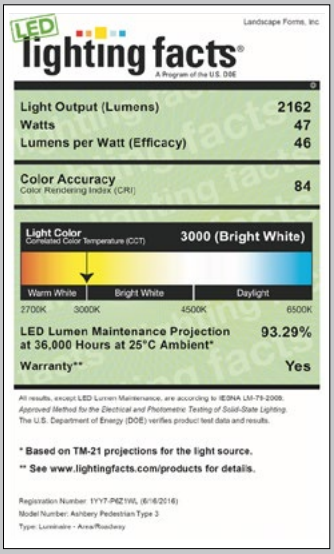
Pedestrian Type 3

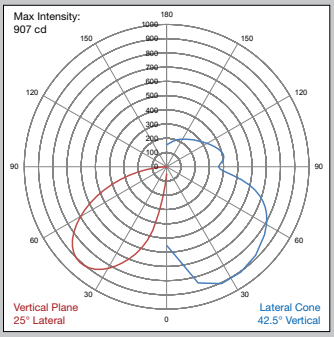
Type 3 Distribution
Lamp: 6 Cree XHP50 LEDs
CCT: 3000K, 3500K, 4000K
L70: >100,000 hrs
Drive Current: 1000mA
Optic: Carclo Optics
Lens: Diffused Acrylite®
Power Supply: 100V-277V
LED Driver: TRP PLED-50W
Dimmable: 0-10V
BUG Rating: B1 U1 G1
IP Rating: IP66 for LED Cartridge

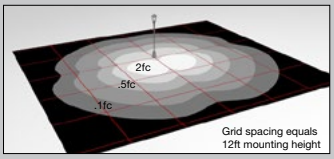
Pedestrian Type 5

Type 5 Distribution
Lamp: 12 Cree XHP50 LEDs
CCT: 3000K, 3500K, 4000K
L70: >100,000 hrs
Drive Current: 1000mA
Optic: Carclo Optics
Lens: Diffused Acrylite®
Power Supply: 100V-277V
LED Driver: TRP PLED-96W
Dimmable: 0-10V
BUG Rating: B2 U1 G1
IP Rating: IP66 for LED Cartridge

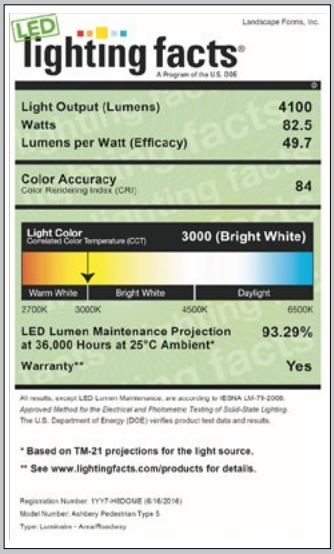
Ashbery Pedestrian Type 3

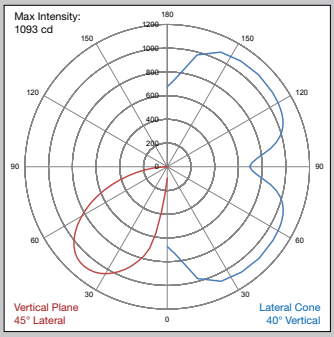


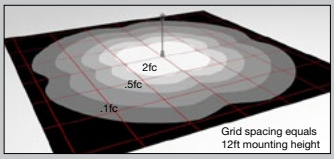




Ashbery Pedestrian Type 5







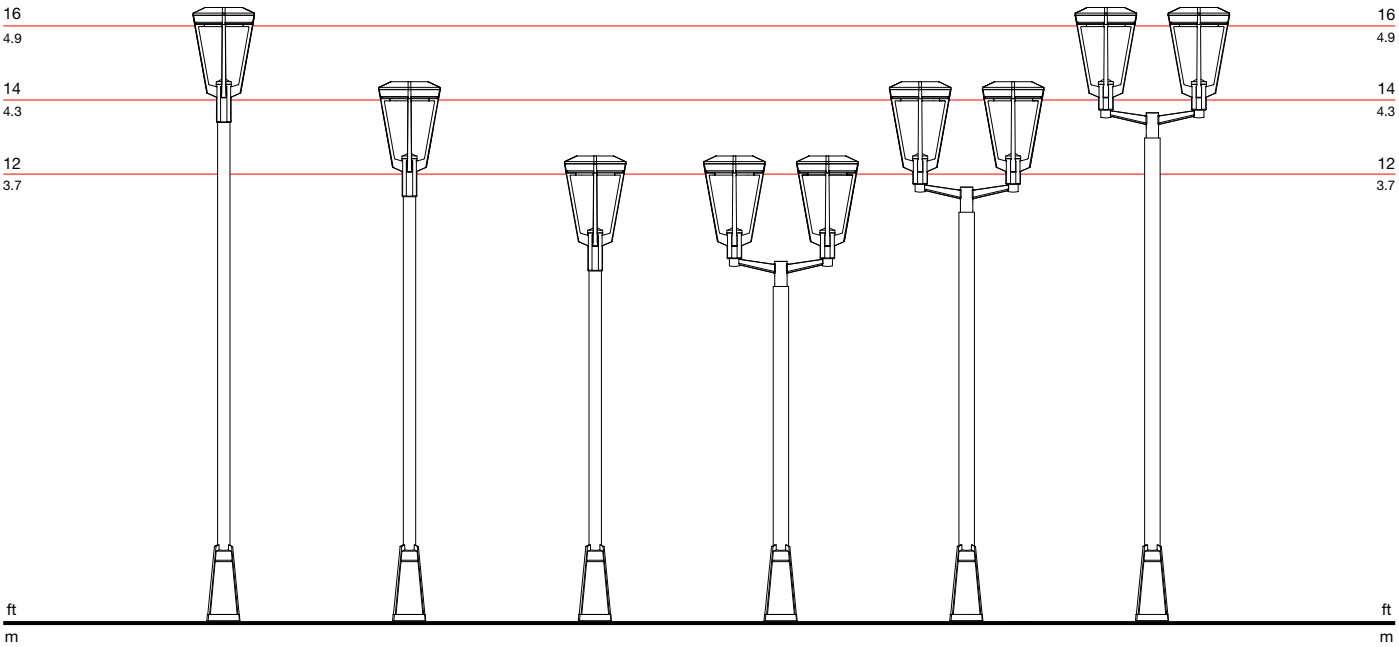
landscapeforms®

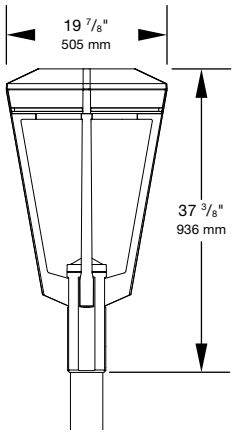
LIGHTING

- CUT SHEET -

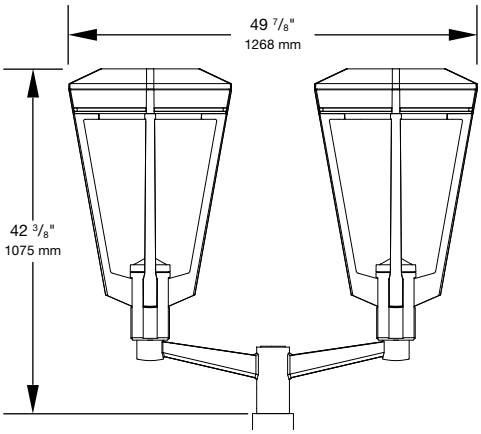
ASHBERY PEDESTRIAN LIGHT

Product Data Sheet

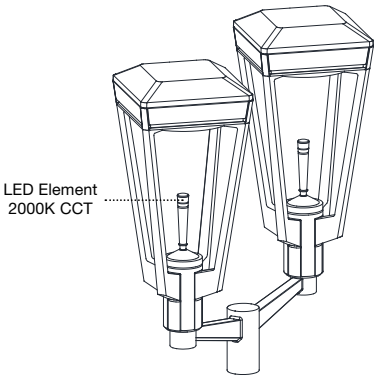




Weight: 55 lbs
EPA: 2.57 ft²



Weight: 115 lbs
EPA: 5.45 ft²



landscapeforms®

ASHBERY PEDESTRIAN LIGHT

Product Data Sheet

To Order Ashbery Pedestrian Luminaire

Specify in order: Product, Lamp, Drive Current, Color Temperature, Input Voltage, Center Element, Connection, Optional Twist Lock Receptacle and Powdercoat Color.

Product	Lamp	Drive Current	Color Temp.	Input Voltage	Center Element	Connection	Twist Lock*
AP ASHBERY	206L3 (6 LED Type 3) 212L5 (12 LED Type 5)	100F (1000 mA)	40K (4000K) 35K (3500K) 30K (3000K)	UV1 (100-277VAC)	20K (2000K)	P2 (Single Tenon) CC1 (Arm Mount)	NTW (No Twist Lock) TW1 (Twist Lock)

EXAMPLE: AP – 206L3 – 100F – 35K / UV1 – 20K – P2 – TW1 – Powdercoat Color

*If luminaire is specified with CC1 (Arm Mount), specify optional Twist Lock Receptacle with pole.

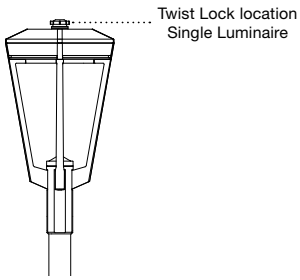
To Order Ashbery Pedestrian Aluminum Pole

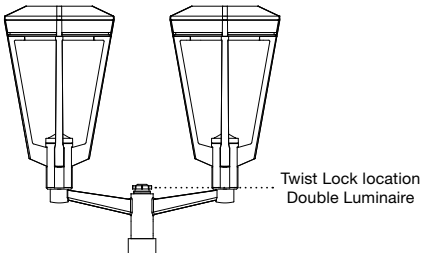
Specify in order: Product, Height, Connection, Pole Diameter, Base Cover, optional Twist Lock Receptacle and Powerdoat Color.

	Product	Height	Connection	Pole Diameter	Base	Twist Lock
Single Luminaire	AP ASHBERY	12 (144in) 14 (168in) 16 (192in)	P2 (Single Tenon)	4 (4 inches)	NUT (Nut Covers) CVR (Cover Plate)	To be specified with luminaire.

	Product	Height	Connection	Pole Diameter	Base	Twist Lock
Double Luminaire	AP ASHBERY	12 (144in) 14 (168in) 16 (192in)	2CC1 (Dual Arm)	5 (5 inches)	NUT (Nut Covers) CVR (Cover Plate)	NTW (No Twist Lock) TW1 (Twist Lock)

EXAMPLE: AP – 14 – P2 – 4 – CVR – Powdercoat Color





landscapeforms®

LIGHTING

- CUT SHEET -

ASHBERY PEDESTRIAN LIGHT

Product Data Sheet

Finish

Pangard® II, offered exclusively by Landscape Forms, is a 19 step program of cleaning, priming, and powdercoating that produces the finest metal finish available for site furniture. In addition, Pangard® II contains no heavy metals and is free of Hazardous Air Pollutants.

Warranty

LED lighting products are warranted for six years.

Other

UL Listed, RoHS Compliant
U.S. Patent Pending

Ashbery is designed by Robert A.M. Stern Architects

Visit our landscapeforms.com for more information. Specifications are subject to change without notice.
Landscape Forms supports the Landscape Architecture Foundation at the Second Century level.
©2016 Landscape Forms, Inc. Printed in U.S.A.

landscapeforms®

ASHBERY WALL MOUNT

Product Data Sheet

Ashbery is a trio of lights that brings together advanced LED technology and optics with an homage to traditional-style lights that have a special place in the American lexicon. The wall mounted light is designed to provide soft lighting adjacent to buildings to extend the safe use of outdoor areas. Cast aluminum parts in a full color palette are finished with Landscape Forms proprietary Pangard II® HAPS, VOC, lead-free polyester powdercoat.

Lighting Facts®

Landscape Forms is committed to the development of energy efficient lighting. We participate in the Department of Energy Lighting Facts® label program. This activity is voluntary but helps consumers evaluate the multitude of products on the market today. The Lighting Facts® label provides a quick but comprehensive summary of luminaire performance as measured by the IESNA LM-79 photometric test standard for solid state lighting.

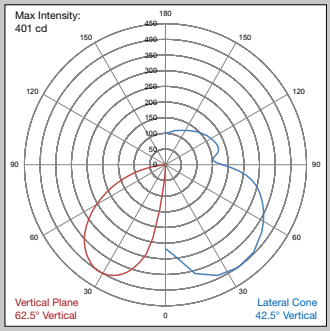
Electrical

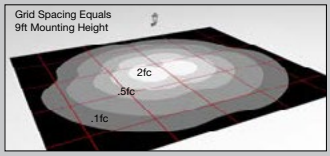
Surge protected 100V-277V 50/60 Hz, Class 2 LED dimmable driver. Ashbery Wall Mount ships prewired. LED cartridge with weatherproof quick disconnect provides ease of installation and serviceability.

Ashbery Wall Mount

Type 3 Distribution
Lamp: 8 Cree XP-G2 LEDs
CCT: 3000K, 3500K, 4000K
L70: >100,000 hrs
Drive Current: 700mA
Optic: Khatod Collimators
Lens: Diffused Acrylite®
Power Supply: 100V-277V
LED Driver: TRP LED-20W
Dimmable: 0-10V
BUG Rating: B0 U1 G1
IP Rating: IP66 for LED Cartridge
Weight: 28 lbs

Ashbery Wall Mount





landscapeforms®

LIGHTING

- CUT SHEET -

ASHBERY WALL MOUNT

Product Data Sheet

Finish

Pangard II® polyester powdercoat finish, offered exclusively by Landscape Forms, is a 19 step program of cleaning, priming, and powdercoating that resists rusting, chipping, peeling and fading. Pangard II® contains no heavy metals, is HAPs-free and has extremely low VOCs.

To Order

Specify in order: Product, Lamp, Drive Current, Color Temperature, Input Voltage, Center Element, Mounting, optional Twist Lock receptacle and Powdercoat Color.

Product	Lamp	Drive Current	Color Temp.	Input Voltage	Center Element	Mounting	Twist Lock
AP ASHBERY	108L3 (8 LED Type 3)	070F (700 mA)	40K (4000K) 35K (3500K) 30K (3000K)	UV1 (100-277VAC)	20K (2000K)	MW1 (Wall Mount)	NTW (No Twist Lock) TW1 (Twist Lock)

EXAMPLE: AP – 108L3 – 070F – 35K / UV1 – 20K – CC1W – NTW – Powdercoat Color

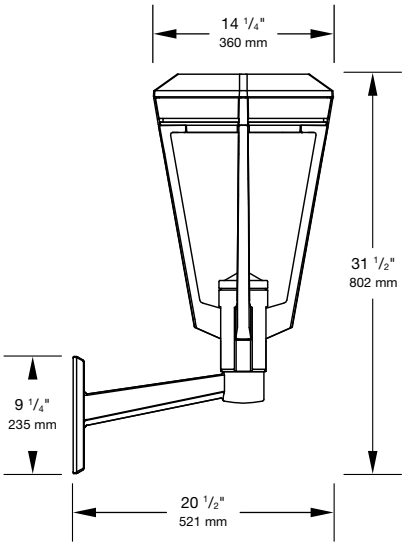
Warranty

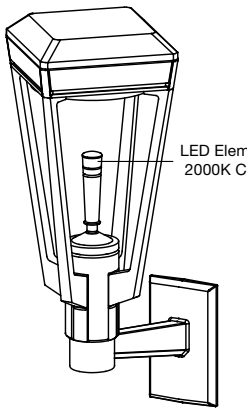
LED lighting products are warranted for six years.

Other

UL Listed, RoHS Compliant
U.S. Patent Pending

Ashbery is designed by Robert A.M. Stern Architects





Isometric View

Visit our landscapeforms.com for more information. Specifications are subject to change without notice.
Landscape Forms supports the Landscape Architecture Foundation at the Second Century level.
©2016 Landscape Forms, Inc. Printed in U.S.A.

Landscape Forms, Inc. | 800.521.2546 | F 269.381.3455 | 7800 E. Michigan Ave., Kalamazoo, MI 49048

300 SERIES

MLB300-M

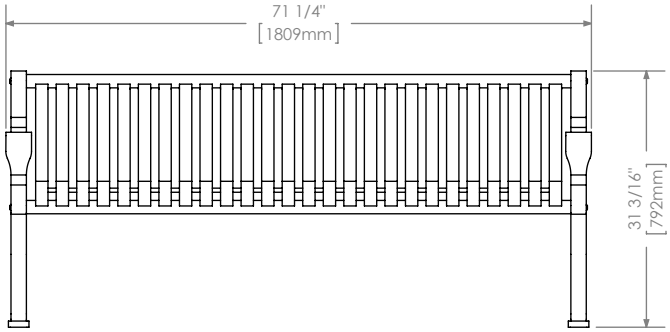
MATERIALS: Bench ends are made from solid cast aluminum. The seat employs flat bar straps and H.S. steel tube.

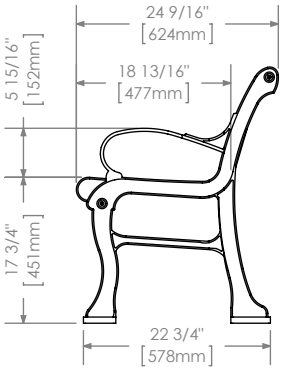
FINISH: All steel components are protected with E-Coat rust proofing.
The Maglin Powdercoat System provides a durable finish on all metal surfaces.

INSTALLATION: The bench is delivered pre-assembled. Holes (0.5") are provided in each foot for securing to base.

TO SPECIFY: Select MLB300-M
Choose:
- Powdercoat Color

OPTIONS:
- Center Arm
- Plaque
- Skate Deterrent
- Personalization





DIMENSIONS:

Height:	31.19" (79.2cm)
Length:	71.25" (180.9cm)
Depth:	24.56" (62.4cm)
Weight:	130.3lbs (59.1kg)

MAGLIN

T 800-716-5506
F 877-260-9393
WWW.MAGLIN.COM
SALES@MAGLIN.COM

- All drawings, specifications, design and details on this page remain the property of Maglin Site Furniture Inc. and may not be used without Maglin authorization.
- Details and specifications may vary due to continuing improvements of our products.

MAGLIN™*

T 800-716-5506
F 877-260-9393
WWW.MAGLIN.COM
SALES@MAGLIN.COM

MLB300-W

MATERIALS: Bench ends are made from solid cast aluminum. The seat employs 1.00" x 2.75" (2.5 cm x 7.0 cm) Ipe wood slats.

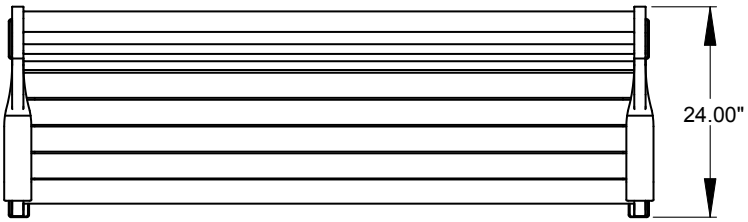
FINISH: All steel components are protected with E-Coat rust proofing. The Maglin Powdercoat System provides a durable finish on all metal surfaces. Wood slats are finished with penetrating sealers.

INSTALLATION: The bench is delivered pre-assembled. Holes (0.5") are provided in each foot for securing to base.

TO SPECIFY: Select MLB300-W
Choose:
- Powdercoat Color

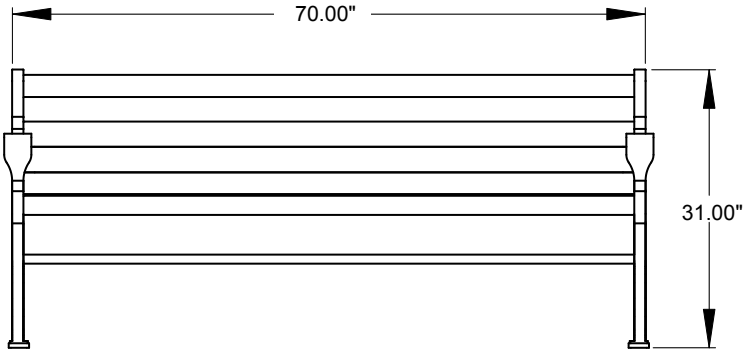
OPTIONS:
- Center Arm
- Plaque
- Skate Deterrent
- Personalization

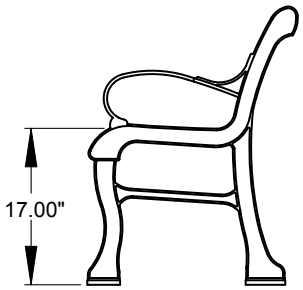
COMPLEMENTARY PRODUCTS:
- MLWR550-32
- MTB200 Series



DIMENSIONS:

Height:	31.00" (78.7 cm)
Length:	70.00" (177.8 cm)
Depth:	24.00" (60.9 cm)
Seat:	17.00" (43.2 cm)
Weight:	95lbs (43kg)





-All drawings, specifications, design and details on this page remain the property of Maglin Site Furniture Inc. and may not be used without Maglin authorization.
-Details and specifications may vary due to continuing improvements of our products.

* MAGLIN is a registered trade mark of Maglin Site Furniture Inc.

MAGLIN™*

T 800-716-5506
F 877-260-9393
WWW.MAGLIN.COM
SALES@MAGLIN.COM

MLB300B-M

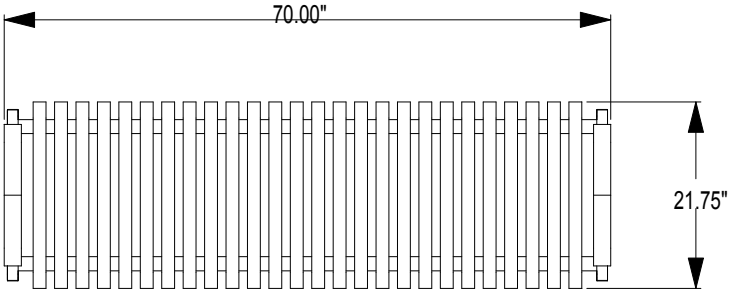
MATERIALS: Bench ends are made from solid cast aluminum. The seat employs H.S. steel tube and flat bar straps or Ipe wood slats.

FINISH: All steel components are protected with E-Coat rust proofing. The Maglin Powdercoat System provides a durable finish on all metal surfaces.

INSTALLATION: The bench is delivered pre-assembled. Holes (0.5") are provided in each foot for securing to base.

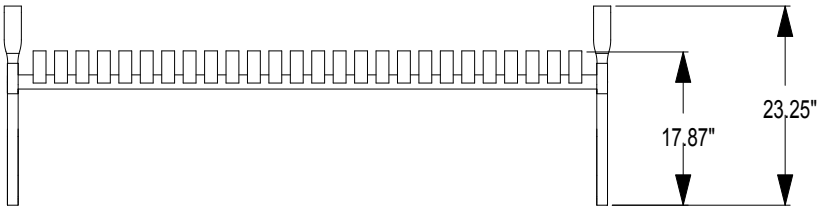
TO SPECIFY: Select MLB300B-M
Choose:
- Powdercoat Color

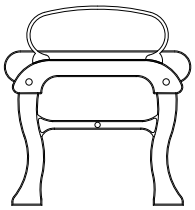
COMPLEMENTARY PRODUCTS:
- MLB300-M
- MLWR550-32
- MBR200 Series



DIMENSIONS:

Height:	23.25" (59.1 cm)
Length:	70.00" (177.8 cm)
Depth:	21.75" (55.2 cm)
Seat:	17.87" (45.4 cm)
Weight:	100lbs (44kg)



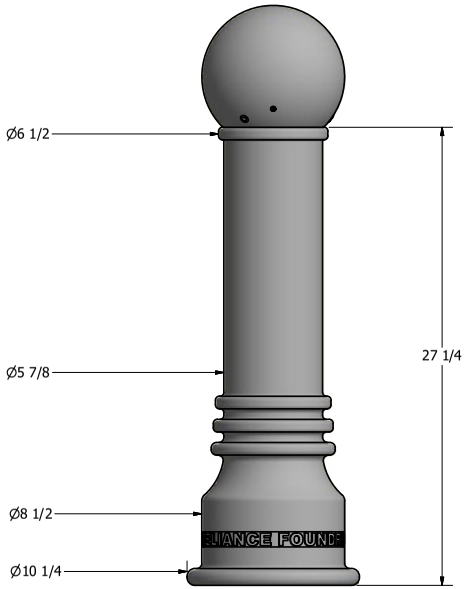


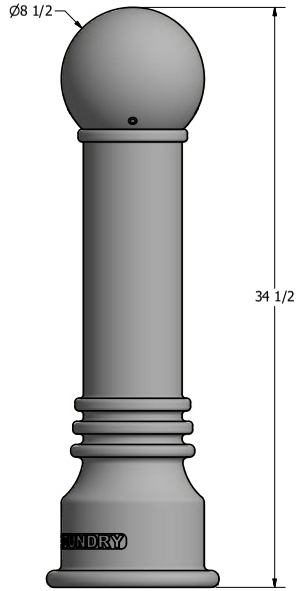
-All drawings, specifications, design and details on this page remain the property of Maglin Site Furniture Inc. and may not be used without Maglin authorization.
-Details and specifications may vary due to continuing improvements of our products.

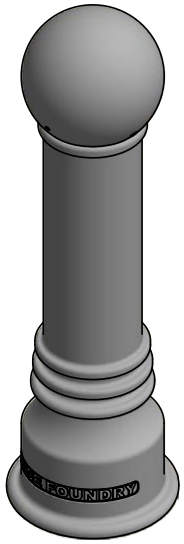
* MAGLIN is a registered trade mark of Maglin Site Furniture Inc.

this page was left blank intentionally

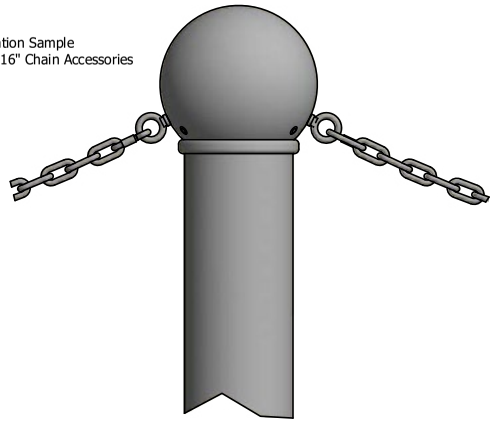
Bollard R-7555







Installation Sample
with 5/16" Chain Accessories



Bollard Chain Eye 3/8"
(Powder Coated)

Quick Link Connector 5/16"
(Powder Coated)

Bollard Chain 5/16"
(Powder Coated)

General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

- ⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

- ○ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
- ○ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
- ○ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
- ○ Post Cover - New Post in New Concrete (see sheet 5 of 9)
- ○ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
- ○ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
- ○ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
- ○ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

Optional Accessories:

- ○ Chain Eye
- ○ Quick link
- ○ Chain (5/16")
- ○ Padlock, Brass (1 3/4")
- ○ Padlock, Stainless Steel (2")

See Reliance Foundry's optional accessories at:
www.reliance-foundry.com/bollard/accessories-bollards

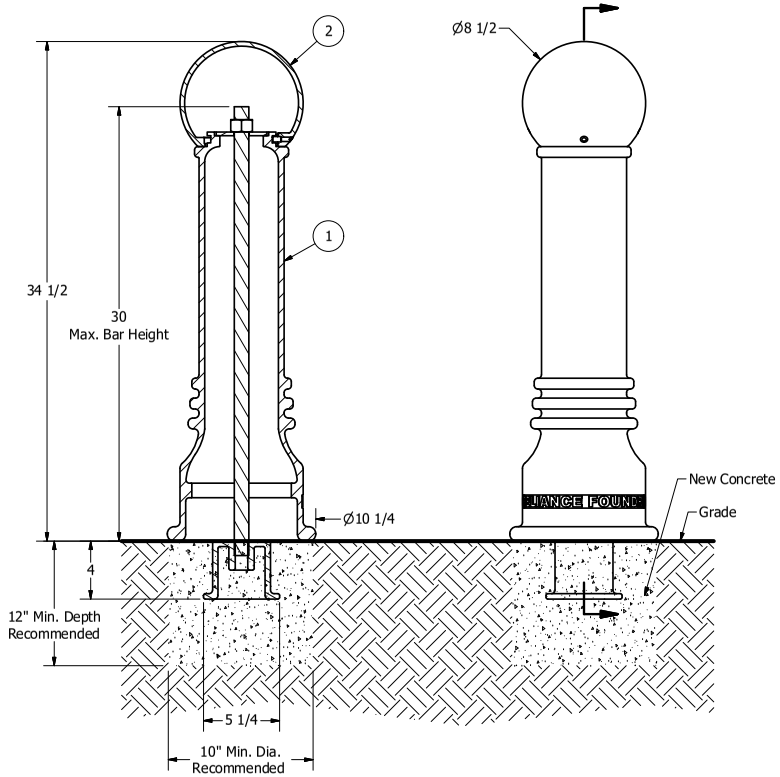
RELIANCE FOUNDRY
SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

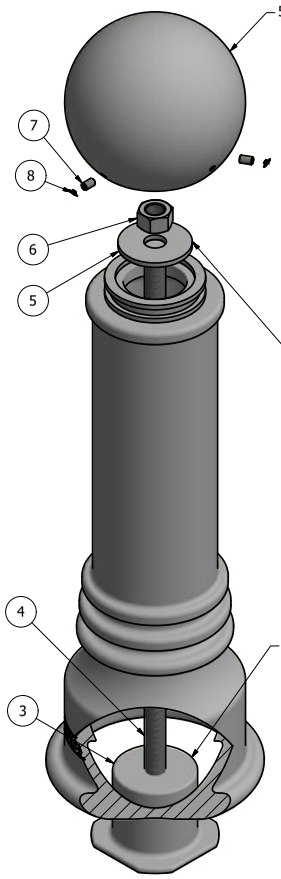
TITLE
Bollard R-7555

SIZE		DWG NO	REV
C		R7555	C1
NOT TO SCALE		SHEET 1 OF 9	

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.

Bollard R-7555





General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

⦿ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
○ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
○ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
○ Post Cover - New Post in New Concrete (see sheet 5 of 9)
○ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
○ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
○ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
○ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

Notes:
1) Bollard post is provided as shown. Concrete, foundation and/or installation ordered separately or provided by others.
2) Minimum foundation sizes depend on local soil conditions, weather conditions, and engineering requirements.
3) Dimensions provided herein is for reference only. Please consult Reliance Foundry sales professionals if any dimension is critical to your particular installation.
4) Reliance Foundry reserves the right to amend design and specifications without prior notice for product improvement.

Tools needed:
1) Measuring tape
2) 1 1/2" wrench
3) 3/16" hex key

PARTS LIST

ITEM	QTY	PART NUMBER	DESCRIPTION	MATERIAL	WEIGHT
1	1	R7555B	R7555 Base	Ductile Iron Powder Coated	63 lbs
2	1	R7555C	R7555 Cap	Ductile Iron Powder Coated	15 lbs
3	1	R7500AN 1"	R7500 Anchor Casting 1"	Ductile Iron Hot Dip Galvanized	8 3/8 lbs
4	1	R7500BAR 1"	R7500 Threaded Bar 1" x 31"	Steel Plated	6 3/4 lbs
5	1	Washer 1" OD 3 1/2"	Washer 1" OD 3 1/2" Thick 1/4"	Steel Plated	5/8 lbs
6	1	Hex Nut 1"	Hex Nut 1" - requires 1 1/2" wrench	Steel Plated	1/4 lbs
7	3	Hexagon Socket Set Screw 3/8" x 5/8"	Hexagon Socket Set Screw 3/8" x 5/8" - requires 3/16" hex key	Stainless Steel	
8	3	Polyethylene Plug 3/8"	Polyethylene Plug 3/8"	LDPE Black	

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.

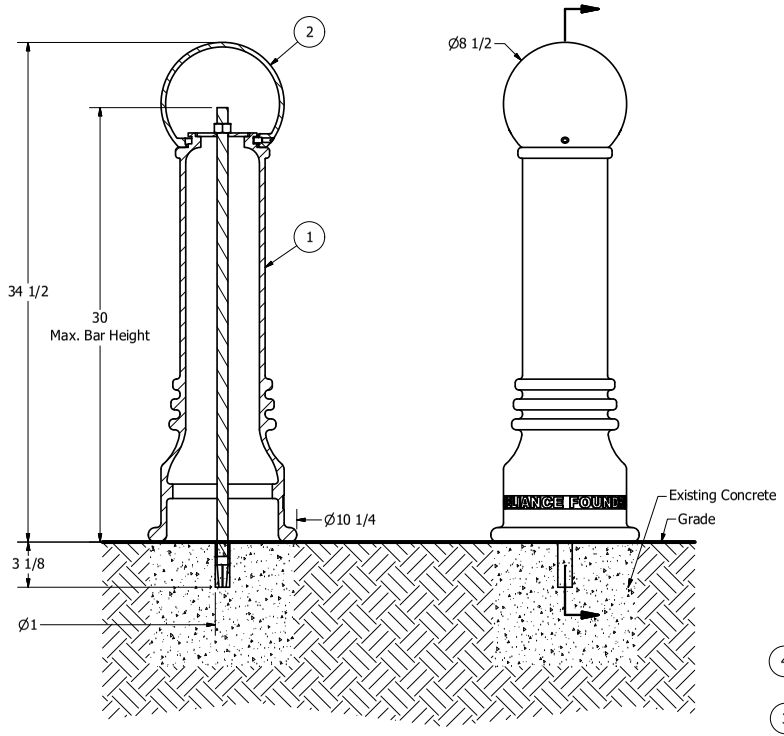
RELIANCE FOUNDRY
SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

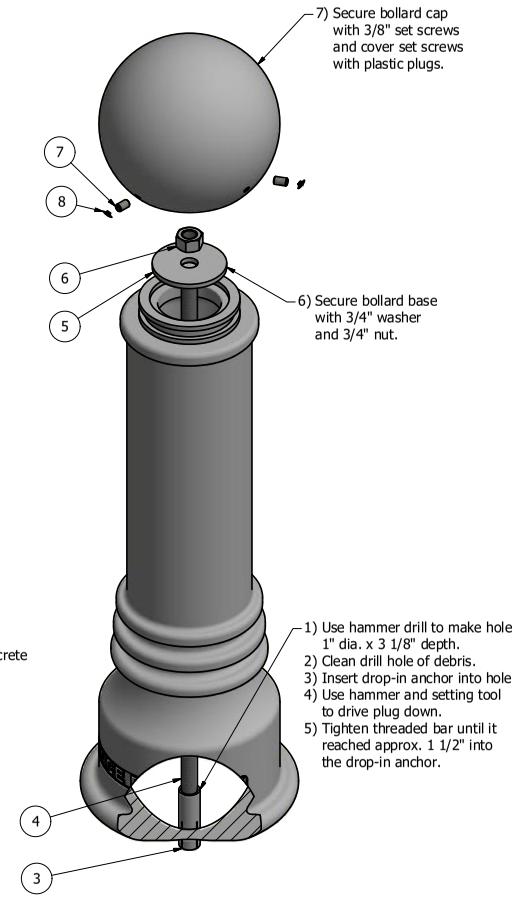
TITLE
Bollard R-7555

SIZE	DWG NO	REV
C	R7555	C1

NOT TO SCALE | SHEET 2 OF 9

Bollard R-7555





General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

- ○ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
- ⦿ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
- ○ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
- ○ Post Cover - New Post in New Concrete (see sheet 5 of 9)
- ○ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
- ○ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
- ○ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
- ○ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

Notes:
1) Bollard post is provided as shown. Concrete, foundation and/or installation ordered separately or provided by others.
2) Minimum foundation sizes depend on local soil conditions, weather conditions, and engineering requirements.
3) Dimensions provided herein is for reference only. Please consult Reliance Foundry sales professionals if any dimension is critical to your particular installation.
4) Reliance Foundry reserves the right to amend design and specifications without prior notice for product improvement.

Tools needed:
1) Measuring tape
2) 1 1/8" wrench
3) 3/16" hex key
4) Hammer drill
5) 1" Masonry drill bit
6) Hammer
7) Drop-in concrete insert setting tool

PARTS LIST

ITEM	QTY	PART NUMBER	DESCRIPTION	MATERIAL	WEIGHT
1	1	R7555B	R7555 Base	Ductile Iron Powder Coated	63 lbs
2	1	R7555C	R7555 Cap	Ductile Iron Powder Coated	15 lbs
3	1	Drop-in Concrete Insert 3/4"	Drop-in Concrete Insert 3/4" - requires 1" x 3 1/8" hole (dia. x depth)	Steel Plated	1/2 lbs
4	1	R7500BAR 3/4"	R7500 Threaded Bar 3/4" x 31"	Steel Plated	3 1/4 lbs
5	1	Washer 3/4" OD 3 1/2"	Washer 3/4" OD 3 1/2" Thick 1/4"	Steel Plated	5/8 lbs
6	1	Hex Nut 3/4"	Hex Nut 3/4" - requires 1 1/8" wrench	Steel Plated	1/8 lbs
7	3	Hexagon Socket Set Screw 3/8" x 5/8"	Hexagon Socket Set Screw 3/8" x 5/8" - requires 3/16" hex key	Stainless Steel	
8	3	Polyethylene Plug 3/8"	Polyethylene Plug 3/8"	LDPE Black	

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.

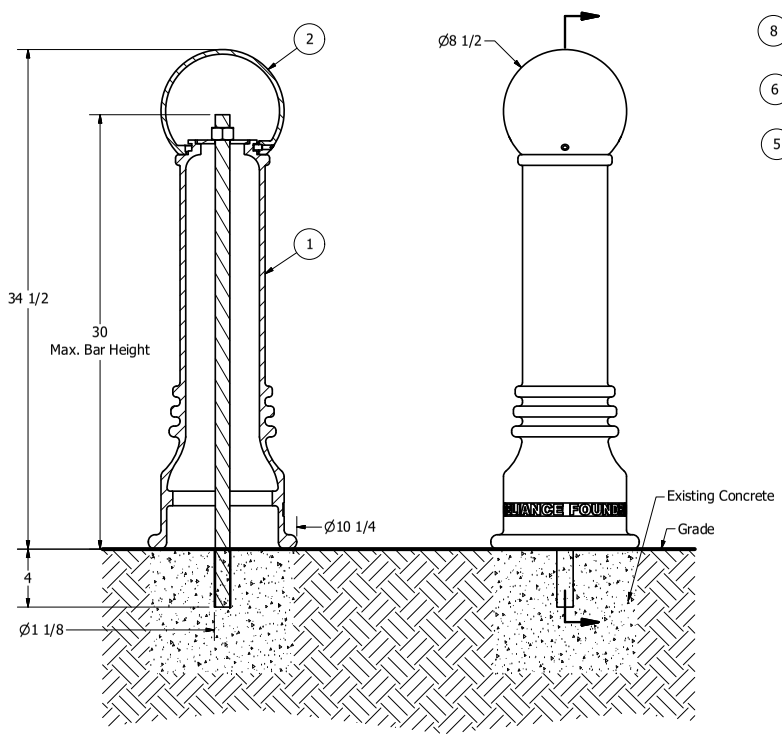
RELIANCE FOUNDRY SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

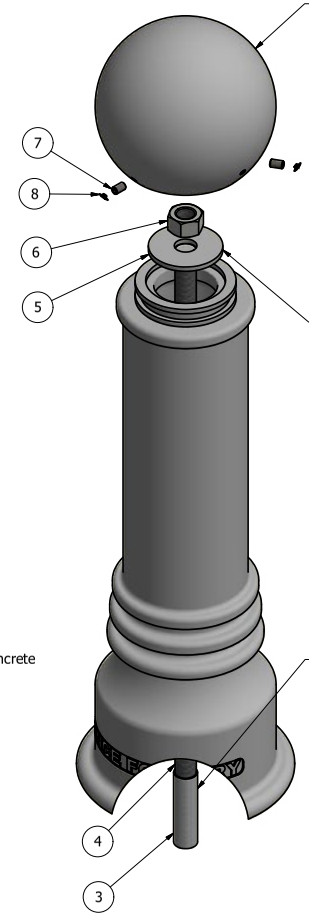
TITLE
Bollard R-7555

SIZE	DWG NO	REV
C	R7555	C1

NOT TO SCALE

Bollard R-7555





1) Use hammer drill to make hole 1 1/8" dia. x 4" depth.
2) Clean drill hole of debris.
3) Caulk adhesive into hole from bottom up and fill 2/3 full.
4) Push threaded bar into adhesive and turn to ensure bonding.
5) Ensure bar is perpendicular and extend no more than 30" above grade.
6) Wait at least 45 minutes for adhesive to set.

General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

- ○ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
- ○ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
- ⦿ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
- ○ Post Cover - New Post in New Concrete (see sheet 5 of 9)
- ○ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
- ○ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
- ○ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
- ○ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

Notes:
1) Bollard post is provided as shown. Concrete, foundation and/or installation ordered separately or provided by others.
2) Minimum foundation sizes depend on local soil conditions, weather conditions, and engineering requirements.
3) Dimensions provided herein is for reference only. Please consult Reliance Foundry sales professionals if any dimension is critical to your particular installation.
4) Reliance Foundry reserves the right to amend design and specifications without prior notice for product improvement.

Tools needed:
1) Measuring tape
2) 1 1/2" wrench
3) 3/16" hex key
4) Hammer drill
5) 1 1/8" Masonry drill bit
6) Caulking gun and utility knife

PARTS LIST

ITEM	QTY	PART NUMBER	DESCRIPTION	MATERIAL	WEIGHT
1	1	R7555B	R7555 Base	Ductile Iron Powder Coated	63 lbs
2	1	R7555C	R7555 Cap	Ductile Iron Powder Coated	15 lbs
3	1	Adhesive Anchor	AC100+ Gold Adhesive Anchoring System	Vinylester Adhesive Mortar	5/8 lbs
4	1	R7500BAR 1"	R7500 Threaded Bar 1" x 34"	Steel Plated	6 1/4 lbs
5	1	Washer 1" OD 3 1/2"	Washer 1" OD 3 1/2" Thick 1/4"	Steel Plated	5/8 lbs
6	1	Hex Nut 1"	Hex Nut 1" - requires 1 1/2" wrench	Steel Plated	1/4 lbs
7	3	Hexagon Socket Set Screw 3/8" x 5/8"	Hexagon Socket Set Screw 3/8" x 5/8" - requires 3/16" hex key	Stainless Steel	
8	3	Polyethylene Plug 3/8"	Polyethylene Plug 3/8"	LDPE Black	

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.

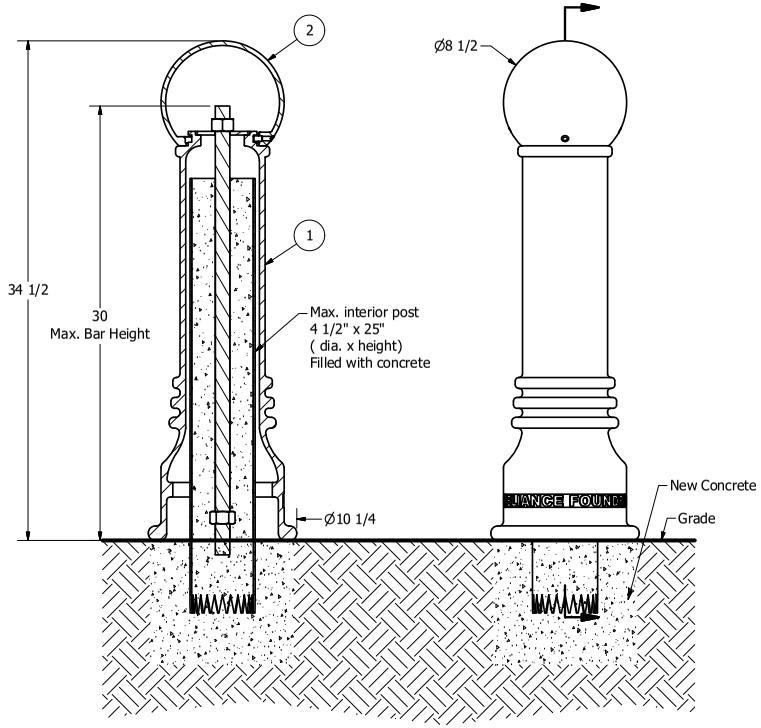
RELIANCE FOUNDRY
SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

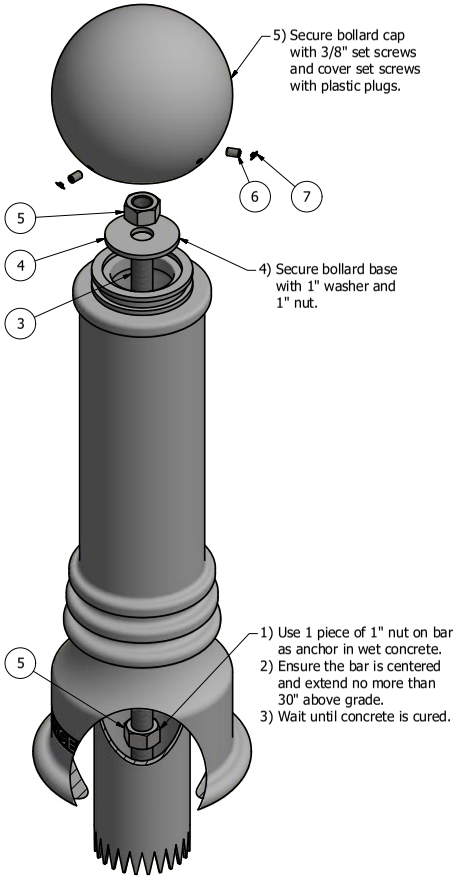
TITLE
Bollard R-7555

SIZE	DWG NO	REV
C	R7555	C1

NOT TO SCALE | SHEET 4 OF 9

Bollard R-7555





General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

- ○ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
- ○ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
- ○ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
- ⦿ Post Cover - New Post in New Concrete (see sheet 5 of 9)
- ○ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
- ○ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
- ○ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
- ○ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

Notes:
1) Bollard post is provided as shown. Concrete, foundation and/or installation ordered separately or provided by others.
2) Minimum foundation sizes depend on local soil conditions, weather conditions, and engineering requirements.
3) Dimensions provided herein is for reference only. Please consult Reliance Foundry sales professionals if any dimension is critical to your particular installation.
4) Reliance Foundry reserves the right to amend design and specifications without prior notice for product improvement.

Tools needed:
1) Measuring tape
2) 1 1/2" wrench
3) 3/16" hex key

PARTS LIST

ITEM	QTY	PART NUMBER	DESCRIPTION	MATERIAL	WEIGHT
1	1	R7555B	R7555 Base	Ductile Iron Powder Coated	63 lbs
2	1	R7555C	R7555 Cap	Ductile Iron Powder Coated	15 lbs
3	1	R7500BAR 1"	R7500 Threaded Bar 1" x 31"	Steel Plated	6 3/4 lbs
4	1	Washer 1" OD 3 1/2"	Washer 1" OD 3 1/2" Thick 1/4"	Steel Plated	5/8 lbs
5	2	Hex Nut 1"	Hex Nut 1" - requires 1 1/2" wrench	Steel Plated	1/4 lbs
6	3	Hexagon Socket Set Screw 3/8" x 5/8"	Hexagon Socket Set Screw 3/8" x 5/8" - requires 3/16" hex key	Stainless Steel	
7	3	Polyethylene Plug 3/8"	Polyethylene Plug 3/8"	LDPE Black	

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.

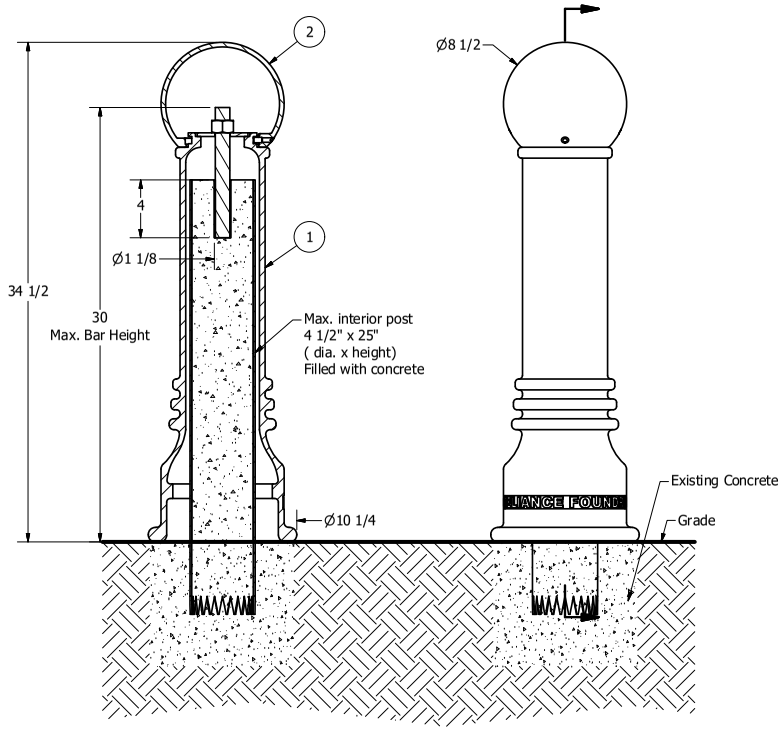
RELIANCE FOUNDRY SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

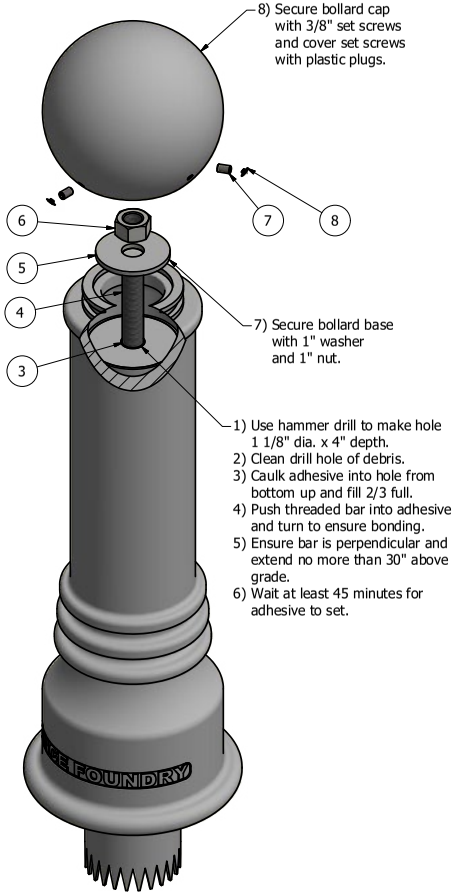
TITLE: Bollard R-7555

SIZE	DWG NO	REV
C	R7555	C1

NOT TO SCALE

Bollard R-7555





General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

- ○ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
- ○ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
- ○ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
- ○ Post Cover - New Post in New Concrete (see sheet 5 of 9)
- ⦿ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
- ○ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
- ○ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
- ○ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

Notes:
1) Bollard post is provided as shown. Concrete, foundation and/or installation ordered separately or provided by others.
2) Minimum foundation sizes depend on local soil conditions, weather conditions, and engineering requirements.
3) Dimensions provided herein is for reference only. Please consult Reliance Foundry sales professionals if any dimension is critical to your particular installation.
4) Reliance Foundry reserves the right to amend design and specifications without prior notice for product improvement.

Tools needed:
1) Measuring tape
2) 1 1/2" wrench
3) 3/8" allen key
4) Hammer drill
5) 1 1/8" Masonry drill bit
6) Caulking gun

PARTS LIST

ITEM	QTY	PART NUMBER	DESCRIPTION	MATERIAL	WEIGHT
1	1	R7555B	R7555 Base	Ductile Iron Powder Coated	63 lbs
2	1	R7555C	R7555 Cap	Ductile Iron Powder Coated	15 lbs
3	1	Adhesive Anchor	AC100+ Gold Adhesive Anchoring System	Vinylester Adhesive Mortar	5/8 lbs
4	1	R7500BAR 1"	R7500 Threaded Bar 1" Custom Order Length	Steel Plated	TBD
5	1	Washer 1" OD 3 1/2"	Washer 1" OD 3 1/2" Thick 1/4"	Steel Plated	5/8 lbs
6	1	Hex Nut 1"	Hex Nut 1" - requires 1 1/2" wrench	Steel Plated	1/4 lbs
7	3	Hexagon Socket Set Screw 3/8" x 5/8"	Hexagon Socket Set Screw 3/8" x 5/8" - requires 3/16" hex key	Stainless Steel	
8	3	Polyethylene Plug 3/8"	Polyethylene Plug 3/8"	LDPE Black	

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.

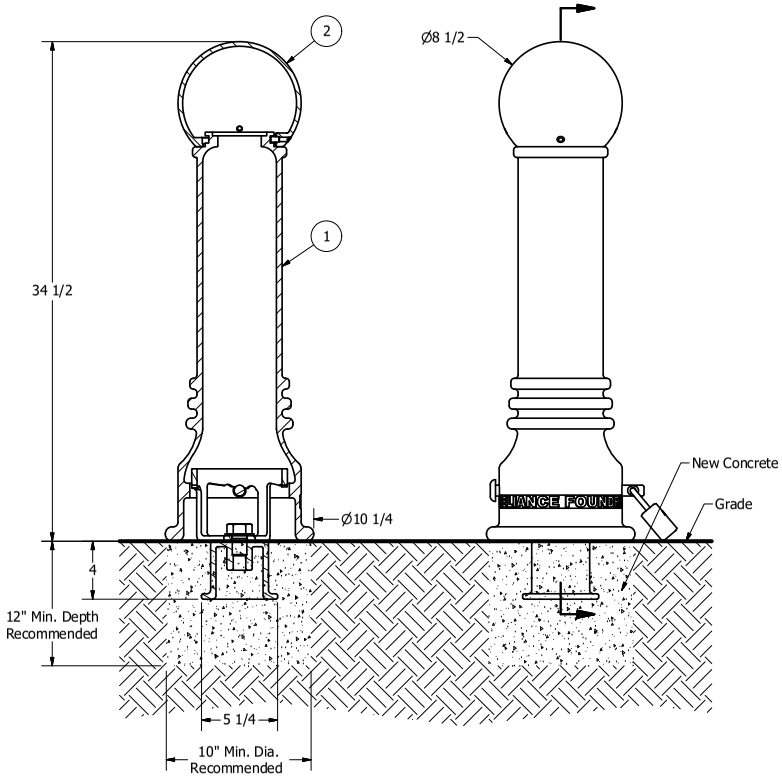
RELIANCE FOUNDRY
SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

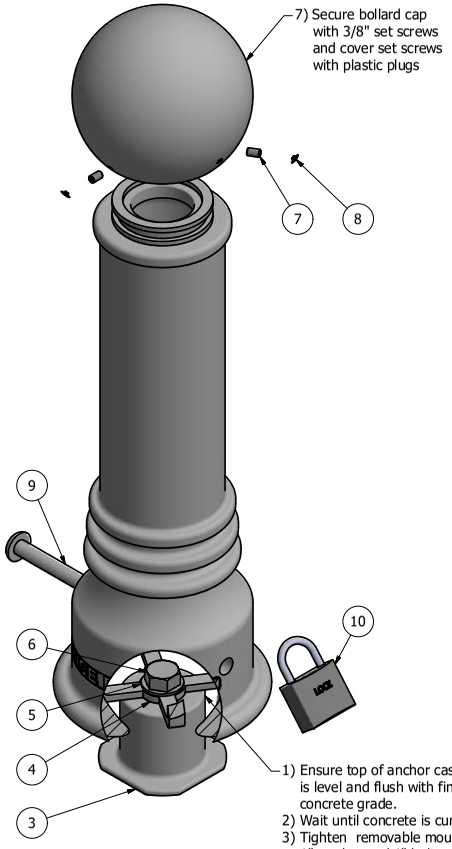
TITLE
Bollard R-7555

SIZE	DWG NO	REV
C	R7555	C1

NOT TO SCALE | SHEET 6 OF 9

Bollard R-7555





1) Ensure top of anchor casting is level and flush with finished concrete grade.
2) Wait until concrete is cured.
3) Tighten removable mount with 1" washer and 1" bolt.
4) Align and insert lock pin through bollard base.
5) Turn bollard base clockwise to tighten it into position.
6) Fasten the padlock.

Notes:
1) Bollard post is provided as shown. Concrete, foundation and/or installation ordered separately or provided by others.
2) Minimum foundation sizes depend on local soil conditions, weather conditions, and engineering requirements.
3) Dimensions provided herein is for reference only. Please consult Reliance Foundry sales professionals if any dimension is critical to your particular installation.
4) Reliance Foundry reserves the right to amend design and specifications without prior notice for product improvement.

Tools needed:
1) Measuring tape
2) 1 1/2" wrench
3) 3/16" hex key

General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

- ○ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
- ○ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
- ○ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
- ○ Post Cover - New Post in New Concrete (see sheet 5 of 9)
- ○ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
- ⦿ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
- ○ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
- ○ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

PARTS LIST

ITEM	QTY	PART NUMBER	DESCRIPTION	MATERIAL	WEIGHT
1	1	R7555B	R7555 Base	Ductile Iron Powder Coated	63 lbs
2	1	R7555C	R7555 Cap	Ductile Iron Powder Coated	15 lbs
3	1	R7500AN 1"	R7500 Anchor Casting 1"	Ductile Iron Hot Dip Galvanized	8 3/8 lbs
4	1	R7500RM 1"	R7500 Removable Mount 1"	Steel Hot Dip Galvanized	4 5/8 lbs
5	1	Washer 1" OD 2"	Washer 1" OD 2" Thick 1/8"	Steel Plated	1/8 lbs
6	1	Hex Bolt 1" x 1 1/2"	Hex Bolt 1" x 1 1/2" - requires 1 1/2" wrench	Steel Plated	5/8 lbs
7	3	Hexagon Socket Set Screw 3/8" x 5/8"	Hexagon Socket Set Screw 3/8" x 5/8" - requires 3/16" hex key	Stainless Steel	
8	3	Polyethylene Plug 3/8"	Polyethylene Plug 3/8"	LDPE Black	
9	1	R7500 Lock Pin 3/4" x 10"	R7500 Lock Pin 3/4" x 10"	Steel Powder Coated	1 1/2 lbs
10	1	Padlock (Optional)	Optional Padlock (Brass or Stainless Steel)	Choice of Brass or Stainless Steel	5/8 lbs

RELIANCE FOUNDRY SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

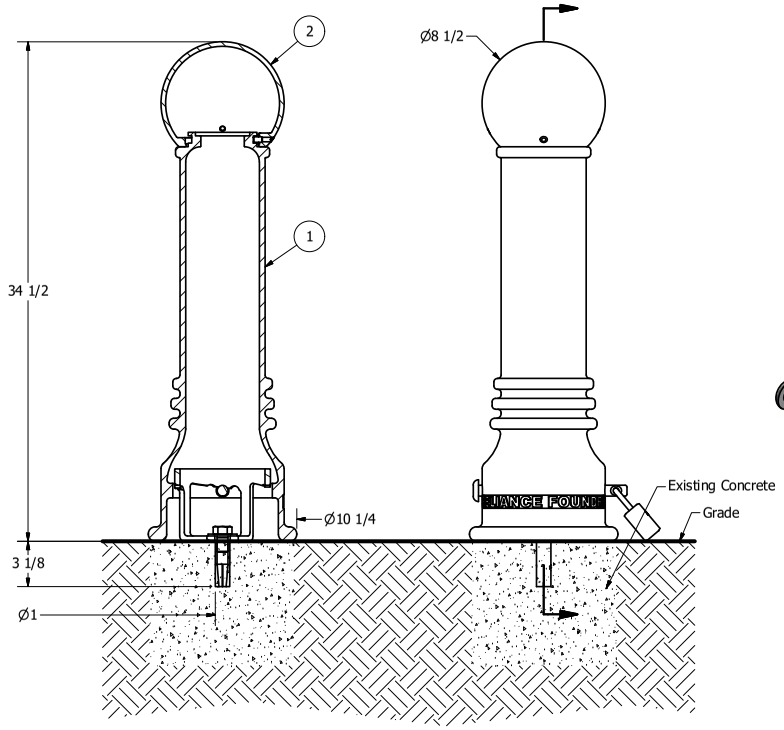
TITLE: Bollard R-7555

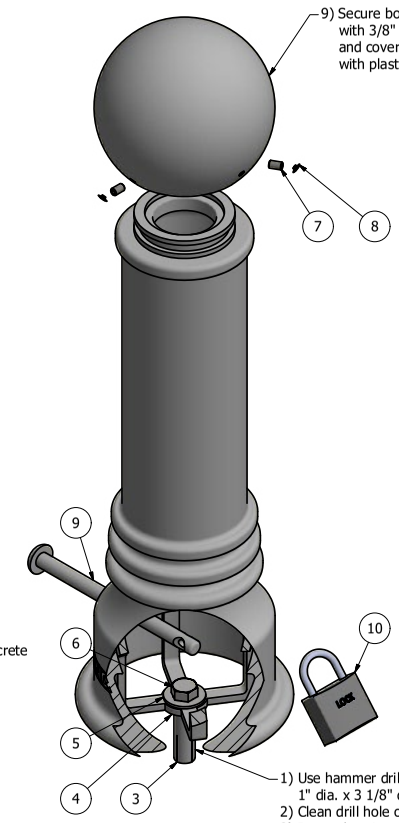
SIZE: C | DWG NO: R7555 | REV: C1

NOT TO SCALE | SHEET 7 OF 9

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.

Bollard R-7555





1) Use hammer drill to make hole 1" dia. x 3 1/8" depth.
2) Clean drill hole of debris.
3) Insert drop-in anchor into hole
4) Use hammer and setting tool to drive plug down.
5) Tighten removable mount with 3/4" washer and 3/4" bolt.
6) Align and insert lock pin through bollard base.
7) Turn bollard base clockwise to tighten it into position.
8) Fasten the padlock.

Notes:
1) Bollard post is provided as shown. Concrete, foundation and/or installation ordered separately or provided by others.
2) Minimum foundation sizes depend on local soil conditions, weather conditions, and engineering requirements.
3) Dimensions provided herein is for reference only. Please consult Reliance Foundry sales professionals if any dimension is critical to your particular installation.
4) Reliance Foundry reserves the right to amend design and specifications without prior notice for product improvement.

Tools needed:
1) Measuring tape
2) 1 1/8" wrench
3) 3/16" hex key
4) Hammer drill
5) 1" Masonry drill bit
6) Hammer
7) Drop-in concrete insert setting tool

General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

○ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
○ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
○ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
○ Post Cover - New Post in New Concrete (see sheet 5 of 9)
○ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
○ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
⦿ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
○ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

PARTS LIST

ITEM	QTY	PART NUMBER	DESCRIPTION	MATERIAL	WEIGHT
1	1	R7555B	R7555 Base	Ductile Iron Powder Coated	63 lbs
2	1	R7555C	R7555 Cap	Ductile Iron Powder Coated	15 lbs
3	1	Drop-in Concrete Insert 3/4"	Drop-in Concrete Insert 3/4" - requires 1" x 3 1/8" hole (dia. x depth)	Steel Plated	1/2 lbs
4	1	R7500RM 1"	R7500 Removable Mount 1"	Steel Hot Dip Galvanized	4 5/8 lbs
5	1	Washer 3/4" OD 2"	Washer 3/4" OD 2" Thick 1/8"	Steel Plated	1/8 lbs
6	1	Hex Bolt 3/4" x 1 1/4"	Hex Bolt 3/4" x 1 1/4" - requires 1 1/8" wrench	Steel Plated	1/4 lbs
7	3	Hexagon Socket Set Screw 3/8" x 5/8"	Hexagon Socket Set Screw 3/8" x 5/8" - requires 3/16" hex key	Stainless Steel	
8	3	Polyethylene Plug 3/8"	Polyethylene Plug 3/8"	LDPE Black	
9	1	R7500 Lock Pin 3/4" x 10"	R7500 Lock Pin 3/4" x 10"	Steel Powder Coated	1 1/2 lbs
10	1	Padlock (Optional)	Optional Padlock (Brass or Stainless Steel)	Choice of Brass or Stainless Steel	5/8 lbs

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.

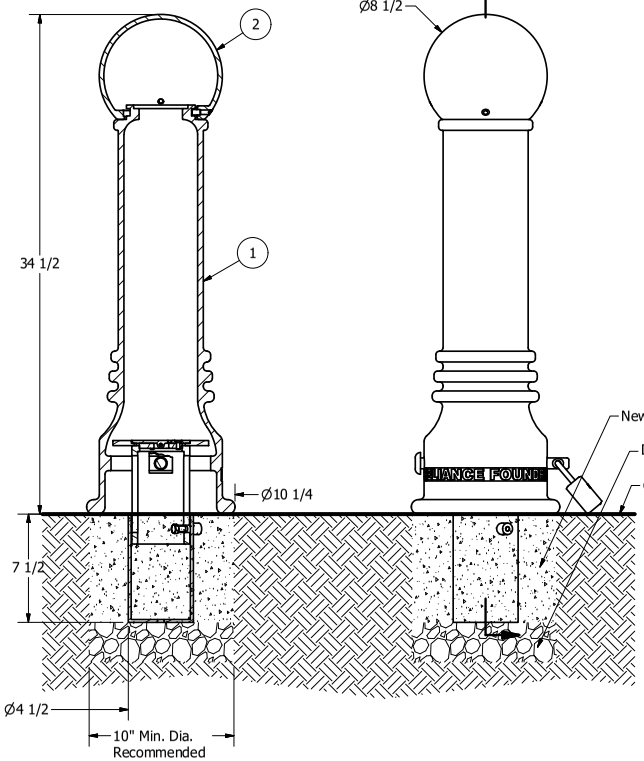
RELIANCE FOUNDRY SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

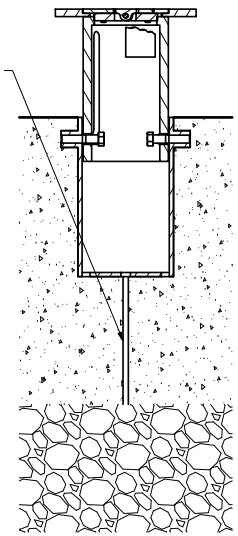
TITLE
Bollard R-7555

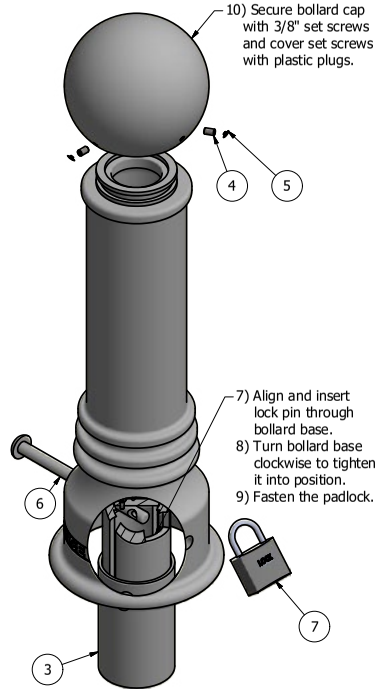
SIZE	DWG NO	REV
C	R7555	C1

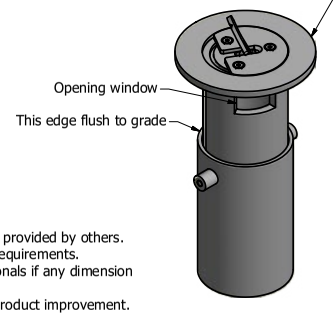
NOT TO SCALE | SHEET 8 OF 9

Bollard R-7555









1) Ensure adequate drainage underneath
2) Ensure top edge of outer housing flush to grade
3) Lift handle raise inner housing, turn and rest on UP position
4) Observe and orient opening window to desired lock pin direction
5) Rest inner housing on DOWN position
6) Pour concrete and wait for concrete to cure

Tools needed:
1) Measuring tape
2) 3/16" hex key

General Description:

The R-7555 Decorative Bollard is made from a versatile ductile iron, featuring a clean finish and large spherical top casting. Bollard surfaces are protected by a durable powder coating, available in 6 standard colors, to prevent wear and corrosion. Use as fixed, stand-alone bollards or cover impact-resistant security posts. Removable mountings are available.

Specifications:

Height: 34 1/2"
Base Diameter: 10 1/4"
Weight: 78 lbs (Bollard Only)
Material: Ductile Iron
Max. Interior Security Post Size:
4 1/2" x 25" (Diameter x Height)

Finish Options:

⦿ Polyester Powdercoated

See Reliance Foundry's standard color options at:
www.reliance-foundry.com/bollard/colors-bollards

Installation Options:

- ○ Fixed - Anchor Casting in New Concrete (see sheet 2 of 9)
- ○ Fixed - Concrete Insert Anchor in Existing Concrete (see sheet 3 of 9)
- ○ Fixed - Adhesive Anchor in Existing Concrete (see sheet 4 of 9)
- ○ Post Cover - New Post in New Concrete (see sheet 5 of 9)
- ○ Post Cover - Existing Post with Adhesive Anchor (see sheet 6 of 9)
- ○ Removable - Anchor Casting in New Concrete (see sheet 7 of 9)
- ○ Removable - Concrete Insert Anchor in Existing Concrete (see sheet 8 of 9)
- ⦿ Removable - Premium Retractable in New Concrete (see sheet 9 of 9)

For more information on bollard post installation, please visit:
www.reliance-foundry.com/bollard/installation-bollards

Care and Maintenance:

Reliance's line of bollards are finished with a long-lasting powder-coating. Proper care and maintenance are required. Regularly-performed inspections and routine cleaning will ensure that a bollard retains its aesthetic appeal and does not become damaged by the elements.

See Reliance Foundry's maintenance guide at:
www.reliance-foundry.com/bollard/maintenance-bollards

Notes:
1) Bollard post is provided as shown. Concrete, foundation and/or installation ordered separately or provided by others.
2) Minimum foundation sizes depend on local soil conditions, weather conditions, and engineering requirements.
3) Dimensions provided herein is for reference only. Please consult Reliance Foundry sales professionals if any dimension is critical to your particular installation.
4) Reliance Foundry reserves the right to amend design and specifications without prior notice for product improvement.

PARTS LIST

ITEM	QTY	PART NUMBER	DESCRIPTION	MATERIAL	WEIGHT
1	1	R7555B	R7555 Base	Ductile Iron Powder Coated	63 lbs
2	1	R7555C	R7555 Cap	Ductile Iron Powder Coated	15 lbs
3	1	R7000	R7000 Retractable Removable Mount w/ Spacer L	Steel Hot Dip Galvanized	17 1/2 lbs
4	3	Hexagon Socket Set Screw 3/8" x 5/8"	Hexagon Socket Set Screw 3/8" x 5/8" - requires 3/16" hex key	Stainless Steel	
5	3	Polyethylene Plug 3/8"	Polyethylene Plug 3/8"	LDPE Black	
6	1	R7500 Lock Pin 3/4" x 10"	R7500 Lock Pin 3/4" x 10"	Steel Powder Coated	1 1/2 lbs
7	1	Padlock (Optional)	Optional Padlock (Brass or Stainless Steel)	Choice of Brass or Stainless Steel	5/8 lbs

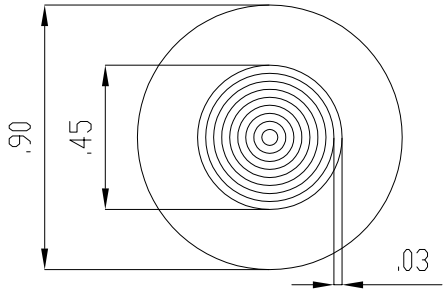
RELIANCE FOUNDRY SINCE 1925
Unit 207, 6450 - 148 Street, Surrey, BC V3S 7G7, Canada
1-888-735-5680 info@reliance-foundry.com
www.reliance-foundry.com

TITLE: Bollard R-7555

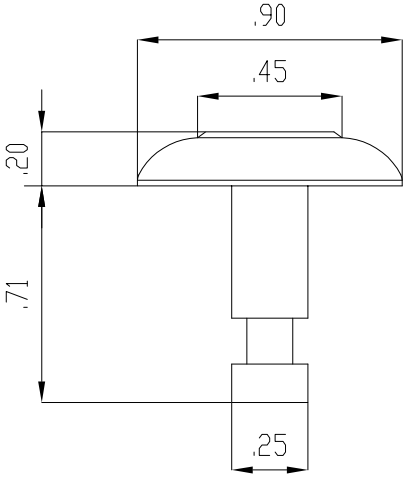
SIZE: C | DWG NO: R7555 | REV: C1

NOT TO SCALE | SHEET 9 OF 9

COPYRIGHT RESERVED THIS PLAN DRAWING AND DESIGN ARE, AND AT ALL TIMES REMAIN, THE EXCLUSIVE PROPERTY OF RELIANCE FOUNDRY CO. LTD.



TOP VIEW
N.T.S.



SIDE VIEW
N.T.S.

ISOMETRIC VIEW
N.T.S.

"ALL DIMENSIONS ARE SHOWN IN INCHES"

www.advantagetactile.com

Advantage Tactile Systems

©Advantage Tactile Systems

ADVANTAGE, ADVANTAGE TACTILE SYSTEMS, ADVANTAGE HYBRID TACTILE SYSTEMS AND THE TWO AND THREE DIMENSIONAL DESIGNS ON THE TILE BETWEEN AND ON THE DOMES ARE TRADEMARKS OF ADVANTAGE TACTILE SYSTEMS INC.
PATENTS PENDING IN THE USA, CANADA AND INTERNATIONALLY. MANUFACTURED AND DISTRIBUTED BY ADVANTAGE TACTILE SYSTEMS INC
Ⓓ KENNETH E. SZEKELY

MATERIAL LIST

ITEM	DESCRIPTION	PART NO.	QT'Y
1	ADVANTAGE ONE TWSI DOME	ADV-D-1281-N	1
2			
3			
4			
5			

REFERENCE DRAWINGS

DWG. NO.	DESCRIPTION

Machined Finish

No.	DATE	REVISION	APPR.
01	01/07/15	Dimensional Changes	VS
00	21/05/13		

SCALE AS NOTED

DESIGNED BY		DATE 09/14/15
DRAWN BY	PW	DATE 09/14/15
CHECKED BY	DD	DATE 09/14/15
PROJECT MANAGER		
TRADE TWSI	PART NO. ADV-B-3281-N	

MATERIAL Stainless Steel 316, Marine Grade

SUBJECT TACTILE WALKING SUFACE INDICATORS

PROJECT ADV-D-1281-N
ADVANTAGE ONE
TACTILE WALKING SURFACE INDICATORS
STAINLESS STEEL TRUNCATED DOME ATTENTION INDICATOR W/
CONCENTRIC CIRCLES

DRAWING NO.	SHT. NO.	REV. NO.
ADV-D-1281-N	0	0

STREETLIFE®

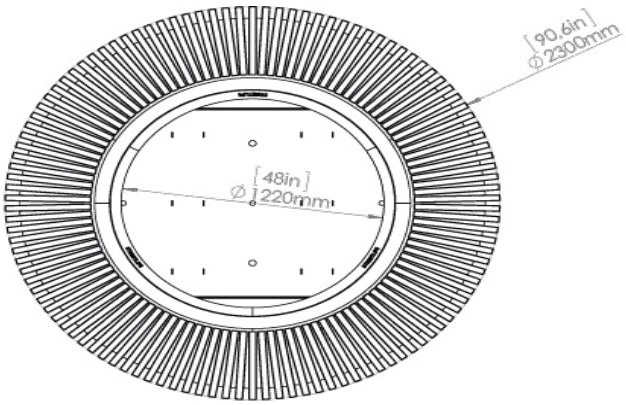
Product Sheet Green Circular Bench

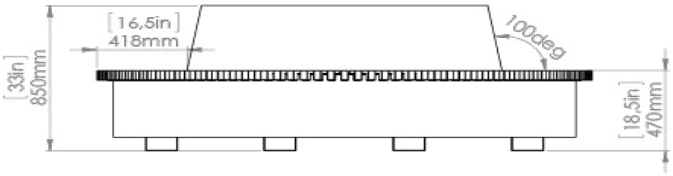
Mobile tree planter with integrated hardwood seating

Product Code	**GCB-D230-PC**
Dimensions	ca. 230x85cm | 91x33” (Øxh)
Material	Seat: timber, untreated 100% Hardwood (Cumaru) Slats: (3,5x5,7cm | 1.4x2.2”) ca. 40cm | 16” depth Aluminium tub, powdercoated in RAL color
Weight	ca. 240 kg = 530 lbs.
Packing unit	Completely preassembled
Cleaning & Maintenance	Timber: with clear water and soft brush or cloth; do not use high pressure cleaner or similar (this can open up the wood grain and make the surface coarse). The timber can be gently sanded every 2-3 years (in the direction of the wood grain) Clean annually with clear water and mild detergents
Rendering	

STREETLIFE BV, Oude Singel 144, 2312 RG Leiden, The Netherlands; tel. +31 71 524 6846; fax +31 71 524 6849; www.streetlife.nl
Chamber of Commerce: 28.073.827 Tax No. NL 806077049B01

STREETLIFE®

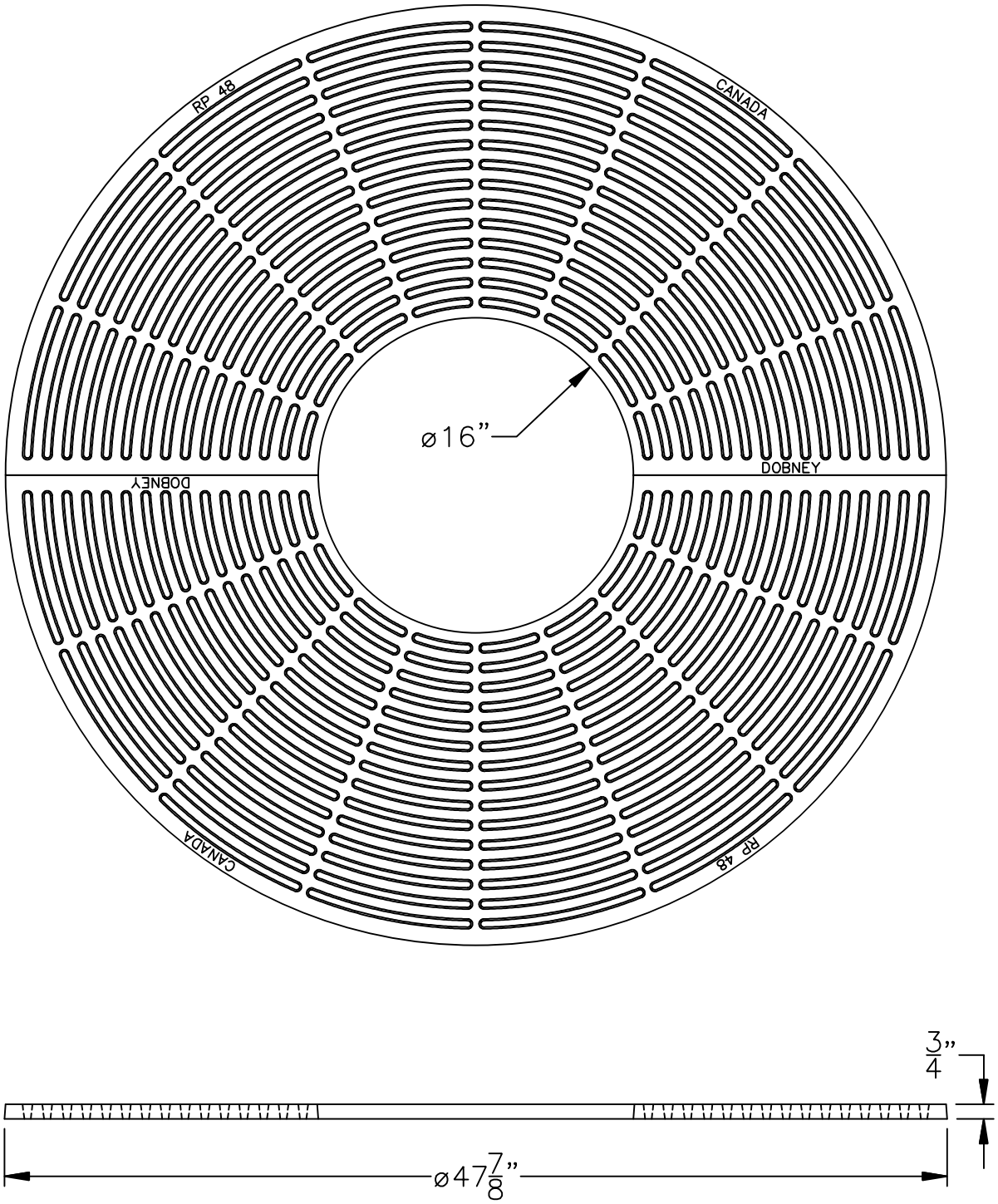




*Metric units are leading

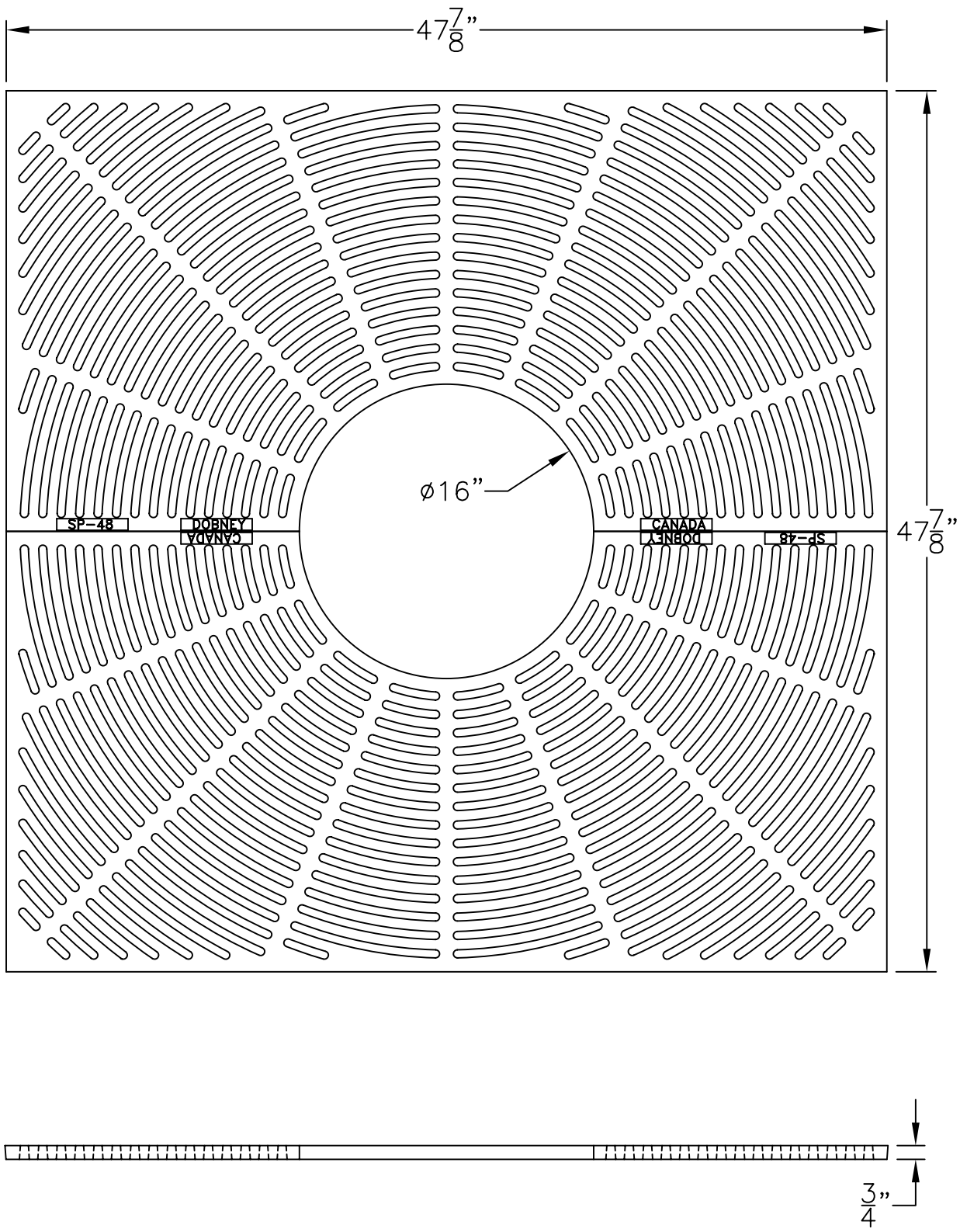
Design: Streetlife
Protected by int. Modeldepots & Patents

STREETLIFE BV, Oude Singel 144, 2312 RG Leiden, The Netherlands; tel. +31 71 524 6846; fax +31 71 524 6849; www.streetlife.nl
Chamber of Commerce: 28.073.827 Tax No. NL 806077049B01



Approx. Weight:
200 lbs/Set

DOBNEY	DOBNEY FOUNDRY LTD. SURREY B.C.
RATING– DUCTILE IRON	
TREE GRATE	NO. RP–48



APPROX. WEIGHT—108 KG

DOBNEY	DOBNEY FOUNDRY LTD. SURREY B.C.
RATING— DUCTILE IRON	
TREE GRATE	NO. SP—48

ROMPOX®-D1

up to 7,5 t

The proven paving jointing mortar

2 component epoxy resin paving jointing mortar

PROPERTIES

- for light to medium traffic loads
- for joint widths from 3 mm | ⅛"
- for joint depths from 30 mm | 1 3⁄16"
- water permeable
- self compacting
- water emulsifiable
- can be applied to ground temperatures of > 0 °C | > 32 °F

ROMEX® PFLASTERFUGENMÖRTEL

INFO

Films & Consumption calculator at www.romex-pfm.de

Application

Construction site requirements: The foundation needs to be prepared according to the expected traffic loads. Regulations and leaflets regarding construction of paved stone surfaces should be heeded. Future loads must not cause the surface to settle or loosen stones. Ideally "ROMEX®-TRASS-BED – the frost resistant drainage mortar" should be used. See separate product information.

Preparation: Clean out joints to a depth of at least 30 mm | 1 3/16" (minimum joint width 3 mm | 1/8"). The surface to be joint-fixed should be cleaned of all impurities before work commences. Adjoining surfaces that are not to be joint-fixed are taped off.

Pre-wet: Pre-wet the surface. Porous surfaces as well as higher surface temperatures, require more intense pre-wetting.

Mix: Pour the 25 kg | 55,1 lbs filler components into the mixing tub and start the mixing process. Whilst mixing, slowly add the separately packaged components completely into the mixture. After mixing for 3 minutes add water according to the product package and continue mixing well for at least 3 minutes.

Application: Apply the mixed paving jointing mortar onto the well moistened surface and work it carefully into the joints using a squeegee/rubber slider. The mortar is poured out at three or four spots within the jointing area in order to make best use of the fluidity of the paving jointing mortar. Application time at +20 °C / +68 °F is approx. 20 – 30 minutes.

Final cleaning: After approx. 10 – 15 minutes the excess mortar on the surface of the stones can be swept off carefully with a large, coarse broom. Then use a soft, hair broom to do a final cleaning until all residual mortar has been removed from the surface. The correct moment for sweeping, is when white smears no longer form on the stone surface during sweeping. Sweeping should be done diagonally to the joint. Do not re-use swept off material.

Subsequent treatment: The freshly jointed surface needs to be protected against rain for the next 12 – 24 hours. The rain protection layer must not be laid directly onto the paved surface this is to ensure sufficient air circulation. Safe rain protection is afforded by the specially developed ROMEX® protective surface mats, that can be simply laid on the surface. Please ask your trade supplier. During the initial period a very thin film of epoxy resin remains on the stone surface and intensifies the colour of the stone and protects it from dirt. This film disappears over the course of time due to weathering and abrasion.

Application data:

Application time:	20-30 minutes at +20 °C | +68 °F application temperature
Surface temperature:	> 0 °C | > 32 °F
at lower temperatures:	slow hardening
at high temperatures:	quick hardening
Surface re-opening:	can be walked on after 12 – 24 hours / can be driven on after 6 days

Technical data:	Laboratory value*[1]	Building site value*[2]
Hard mortar raw density:	1,68 kg/dm³ | 0,97 oz/in³	1,43 kg/dm³ | 0,83 oz/in³
Bending tensile strength:	12,0 N/mm² | 1.740 psi	7,9 N/mm² | 1.145 psi
Compressive strength:	34,2 N/mm² | 4.960 psi	16,6 N/mm² | 2.408 psi
Static elasticity module:	8.000 N/mm² | 1.160.302 psi	2.180 N/mm² | 316.182 psi
Water permeability value:	-	$7{,}5 \times 10^{-4}$ m/s | 106,2 iph (for a joint fraction of 10%)*[3]

Storage life: 24 months, resin/hardener components: frostfree, filler components: dry

Consumption table in kg/m² | lb/sq ft - Basis for calculation: Joint depth 30 mm | 1 3/16"

	Stone size	40 x 40 cm 16" x 16"	20 x 20 cm 8" x 8"	16 x 24 cm 6 5/16" x 10"	14 x 16 cm 5 9/16" x 6 5/16"	9 x 11 cm 3 9/16" x 4 3/8"	4 x 6 cm 1 5/8" x 2 3/8"
Joint width	3 mm | 1/8"	0,7 | 0,14	1,4 | 0,29	1,4 | 0,29	1,7 | 0,35	2,6 | 0,53	4,9 | 1,00
	5 mm | 3/16"	1,1 | 0,23	2,3 | 0,47	2,4 | 0,49	2,9 | 0,59	4,4 | 0,90	8,1 | 1,66
	8 mm | 5/16"	1,8 | 0,37	3,6 | 0,74	3,8 | 0,78	4,6 | 0,94	7,0 | 1,43	13,0 | 2,66
	Polygonal slabs	approx. 4-6 | 0,8 - 1,23					

Pre-wet

Mix

Add water

Sweep off

Wash in

Final cleaning

*[1] without addition of water
*[2] acc. to ROMEX® testing method
*[3] water permeable acc. to „Leaflet on water permeable pavements and roads" by Research institute for road and traffic (Germany); issue 1998

Standard specifications for

ROMPOX®-PROFI-DEKO

The professional sand and gravel binder

2 component synthetic resin binding agent for washed, dried and dust-free silica sand, gravel or grit (grainsize from approx. 0-10 mm) for water permeable pathway constructions, bicycle trails, tree pits etc.

One Set of **ROMPOX®-PROFI-DEKO**

Proof of procurement:
ROMEX® PFM GmbH, Von-Bassenheim-Str. 2, 53881 Euskirchen- Kessenich
G E R M A N Y
Tel: 0049 22 51/94 12-20 - Fax: 0049 22 51 / 94 12 - 28
E-Mail: info@romex-pfm.de - www.romex-pfm.de

We point out that these specifications do not purport to be fully complete, as this requires a detailed study of the project. Should circumstances arise which require further or other work to be carried out, then this must be taken into consideration by those who use these specifications for sale.

==========

BASE AGGREGATE:
Provide Base Aggregate materials conforming to ASTM D 2940 and gradation requirements according to standards of e.g. the American Society for Testing and Materials (ASTM) latest addition.

Note: Compaction of the soil subgrade to at least 95% Standard Proctor Density per ASTM D 698 is recommended. Higher density or compaction to ASTM D 1557 (Modified Proctor Density) may be necessary for areas subject to vehicular traffic. Stabilization of the subgrade and/or base material may be necessary with weak or saturated subgrade soils. The Architect/Engineer should inspect subgrade preparation, elevations, and conduct density tests for conformance to specifications.

Note: Local aggregate base materials typical to those used for flexible pavements are recommended, or those conforming to ASTM D 2940. Compaction to not less than 95% Proctor Density in accordance with ASTM D 698 is recommended for pedestrian areas. Compaction to not less than 98% Modified Proctor Density according to ASTM D 1557 is recommended for vehicular areas.

==========

1. Prepare the construction site and if necessary, arrange for traffic detour.
The surface to be worked on must have a depth of at least 30 mm (1,18 inch) and the foundation should be compacted, water permeable and firm. Adjoining surfaces should be taped off.

_____ sqm/sqft _____

2. Mix **one Set** of the 2 component synthetic resin binding agent **ROMPOX®-PROFI-DEKO** according to manufacturer's instructions with

72,5 kg/160 lbs washed, dried and dust-free **silica sand** supplied by the contractor, for at least 5 minutes. Specification for silica sand or similar:

This material is derived from the crushing, screening and classification systems currently used to process the very pure quartzite mined in the quarry.

Typical chemical analysis (weight %)

SiO2	99.40
Al2O3	0.50
Fe2O3	0.05

AVERAGE MOISTURE: max. 5.0%

Typical screening analysis

Screen Size	(%)	% Retained	% Passing
1700	3.40	3.40	96.60
1400	3.78	7.18	92.82
1000	23.52	30.70	69.30
710	43.06	73.76	26.24
425	24.15	97.91	2.09
125	1.98	99.89	0.11
PAN	0.11	100.00	0.00

One set of ROMPOX-PROFI-DEKO for 72,5 kg/ 160 lbs. = for 1,5 m²/ 16 sqft.

Pour the prepared mixture onto the prepared surface and use a shovel to spread well. Using a levelling batten, scrape off so it is of equal height all over. Using a bricklaying trowel by hand or a wing smoother, compact the mixture well and smooth the surface. In order to minimise uncontrolled breakages, after the surface has fully hardened, predetermined breaking points should be laid every 5,00 m to max. 7,00 m. Please take note of the manufacturer's instructions.

3. Immediately after the surface has hardened (usually after 24 hours), the ROMPOX®-PROFI-DEKO-binding agent that has been used, is applied undiluted to the stone surface as a sealant, using a brush or fur roller. This results in an even better surface strength and is absolutely recommended.

Requirements for the sealing are approx. 200-300 g / square metre (0,44-0,66 lbs/10 sft.). One Set of ROMPOX®-PROFI-DEKO is for about 12,5 sqm (135 sqft).

_____ sqm/sqft _____

this page was left blank intentionally

CITY OF
VICTORIA