

SECTION G: DESIGN GUIDELINES

SECTION SYNOPSIS

The Master Plan for the Kannaland tourism Node is intended to foster the development of the node as an invisible whole. Similarly, the detailed design of its various components should harmonise with the overall image of the area. Thorough design and detailing of these various elements will contribute to a visual and functional cohesive node. The guidelines in this section spell out important principles aimed at unified area node design for the following elements:

- 7.1 Stormwater Management and Erosion control
- 7.2 Parking
- 7.3 Pedestrianways
- 7.4 Planting
- 7.5 Building
- 7.6 Site Furniture
- 7.7 Lighting
- 7.8 Signage

7. DESIGN GUIDELINES

7.1 STORMWATER MANAGEMENT AND EROSION CONTROL

Special consideration must be given for stormwater management for the purpose of preserving natural drainage ways and slowing stormwater runoff from individual sites and route them to streams and rivers by use of catchment ponds and retention-sedimentation basins. Stormwater discharge should be directed away from slopes and into such ponds. The rate of discharge must correspond to the rate prior to site development.

7.1.1 CHARACTER

- ❑ Appropriate to the overall visual integrity of the area

7.1.2 FORM

- ❑ Visually unobtrusive in most intensively used areas
- ❑ Natural-appearing in open spaces wherever possible

7.1.3 SCALE

- ❑ Appropriate to function
- ❑ Appropriate to setting

7.1.4 CLIMATE RESPONSE

- ❑ Aligned according to natural overland flows, open channel and swale routings
- ❑ Stabilise and protect disturbed areas to minimise soil erosion
- ❑ Reduce water volume and velocity over unpaved areas to reduce erosion (fig42)
 - terraced lawns, recreation fields: 1:50 max slope
 - mowed grass banks: 1:3 max slope
 - unmowed banks: 1:2 max slope
- ❑ Re-establish vegetation on barren areas to reduce wind and water erosion
- ❑ Locate and design a system to accommodate periodic flooding

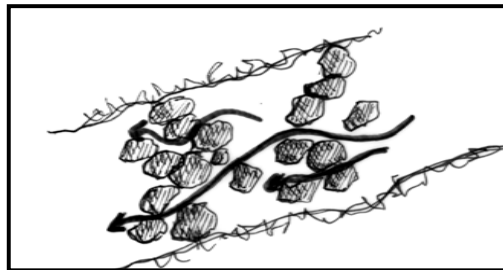


Figure 41: Stormwater - reduce velocity

7.1.5 STRUCTURE (fig 43)

- ❑ Stabilise outlets from pipes into natural drainage swales
- ❑ 1:100 – 1:33 (1 – 3 %) preferred longitudinal slope for drainage swales and channels (1:4 or 25 % max.)
- ❑ 1:100 – 1:10 (1 – 3 %) preferred side slopes for side slopes for drainage swales and channels (1:3,5 or 30 % max.)

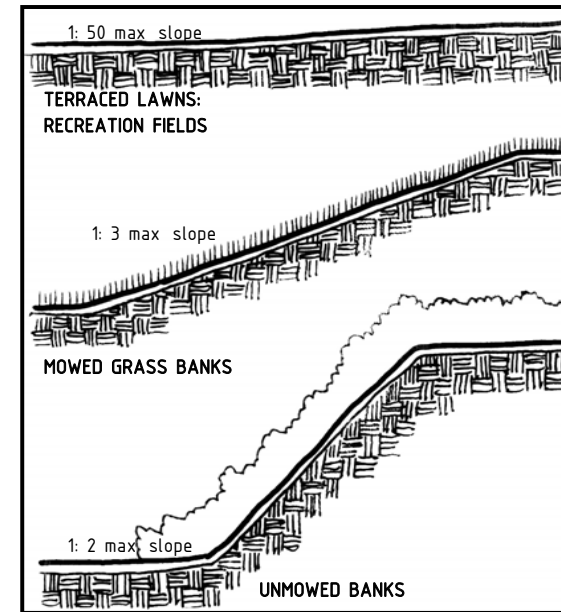


Figure 42: Stormwater management – maximum slopes for planted areas

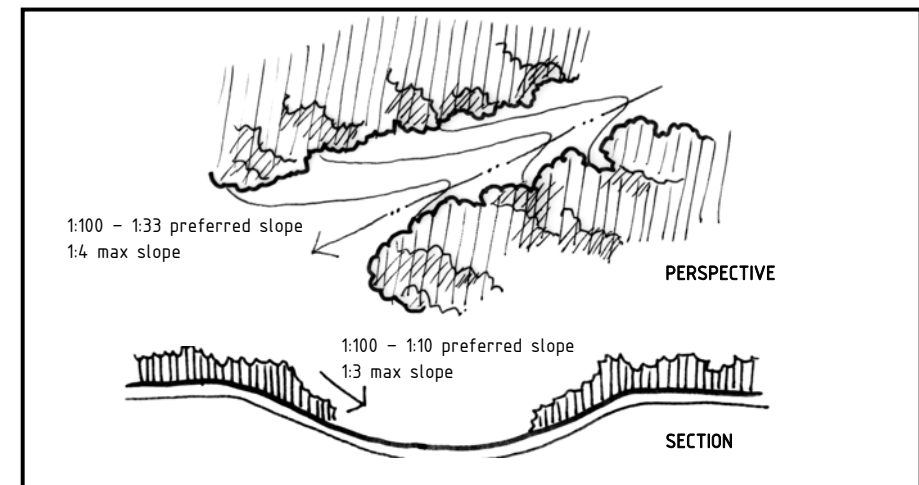


Figure 43: Stormwater management – preferred slopes for drainage swales

7.2 PARKING

Parking will be a major circulation element within the Tourism Node. It should be located according to building and circulation requirements accommodate the maximum number of vehicles and delineate efficient pedestrian and vehicular circulation. Provision must be made for efficient manoeuvring through appropriate dimensions for stalls, turning radius and suitable surface gradients.

Parking lots can be serious visual irritants and safety hazards and must be handled very sensitively. This can be ensured through appropriate siting, the use of planting and lighting and the provision for security surveillance.

7.2.1 CHARACTER

- ❑ Appropriate to the surrounding buildings and environment.
- ❑ Comfortable and easy to use.
- ❑ Be kept small and separated from each other by native vegetation or by landscaped areas.

7.2.2 FORM

- ❑ Fitted to the surrounding terrain.
- ❑ Regular rectilinear forms for maximum efficiency, manoeuvrability.

7.2.3 SCALE

- ❑ Suited to surrounding terrain and building sizes.
- ❑ Suited to the size and type of vehicles expected
- ❑ Impact visually reduced with planted medians and screening
- ❑ Vehicular scale restricted to vehicular areas, i.e., not intruding into pedestrian or other inappropriate areas.

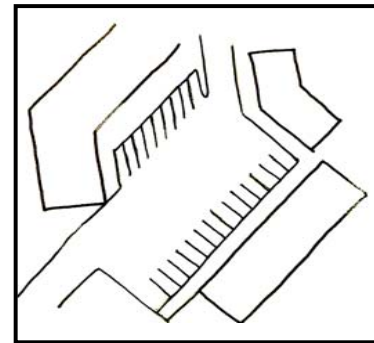


Figure 44: Parking – Large expanses of unrelieved pavement create stormwater runoff problems and poor comfort conditions for pedestrians.

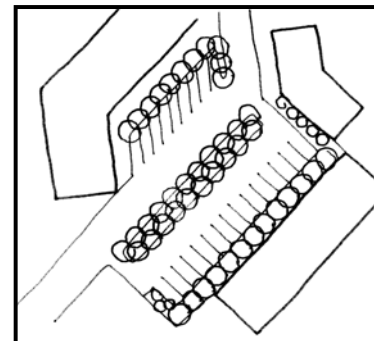


Figure 45: Parking – These problems can be lessened through landscaped planting areas, which include shade

7.2.4 CLIMATE RESPONSE

- Paving materials:
 - low heat-absorption.
 - low radiation/ reflection.
 - permeable paving
 - positive surface drainage with gentlest slopes possible, i.e., 1:100 (1%) min., 1:50 (2%) preferred.
- Planting:
 - reduce heat, noise, pollution and visually break up expanses of paving.

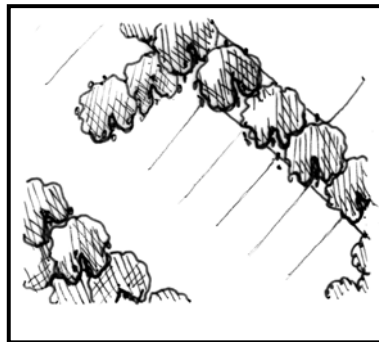


Figure 46: Parking - In an optimum parking arrangement there should be no more than 10 cars in any continuous bay

7.2.5 STRUCTURE

- Access Roads:
 - 6-7 meters min. width for two-way circulation and emergency vehicle access.
 - no parking to be allowed along access roads.
 - no head-in parking along access roads.
 - 1:10 (10%) max. longitudinal slope.
- Aisles:
 - 7m min. width for parking.
 - 6m min. turning radius.
 - 8m turning radius for large busses
 - 1:20 (5%) max. slope for parking and service areas.
 - perpendicular to buildings.

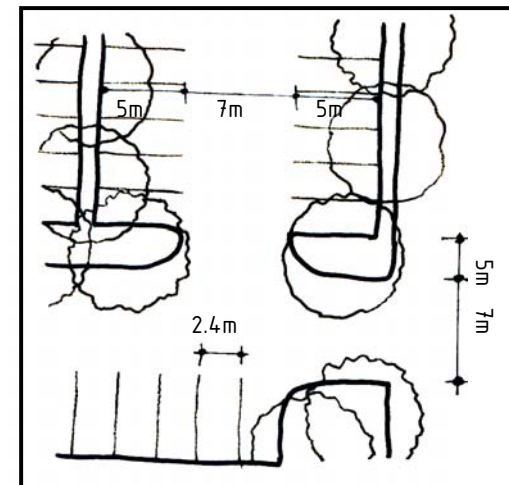


Figure 47: Parking - recommended dimensions

- ❑ Stalls:
 - 2.5m wide by 5m deep
 - 3.6m wide by 5m deep for handicapped parking
 - 1 handicapped stall for every 100 regular stalls, located as close to the building entrance as possible
- ❑ Bays:
 - use planting to visually reduce length, provide shade in bays over 10 stalls long
- ❑ Raised medians:
 - 2.5m recommended minimum width

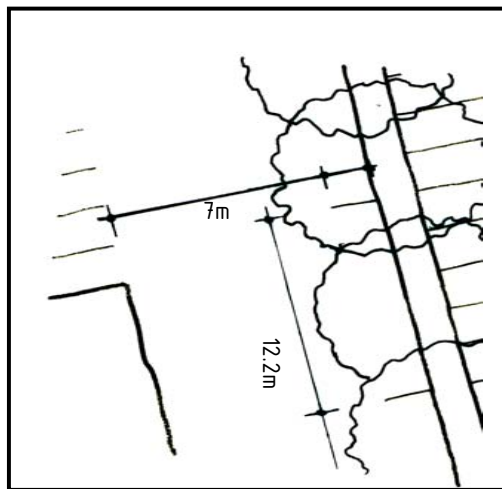


Figure 48: Bus Parking – recommended dimensions

7.2.6 MATERIALS

- ❑ Use same materials on parking areas throughout the node
- ❑ Select coarse surfaces for good traction, glare and noise reduction.
- ❑ Use pervious materials to reduce run-off

7.2.7 COLOUR

- ❑ Avoid light colours to reduce glare
- ❑ Avoid very dark colours to reduce head absorption
- ❑ Contrast with pedestrian way paving colour

7.2.8 SAFETY

- ❑ Signage in paved surface to clearly identify vehicular and pedestrian circulation
- ❑ Adequate lighting levels in parking areas and pedestrian ways leading to parking (refer to section on Lighting)

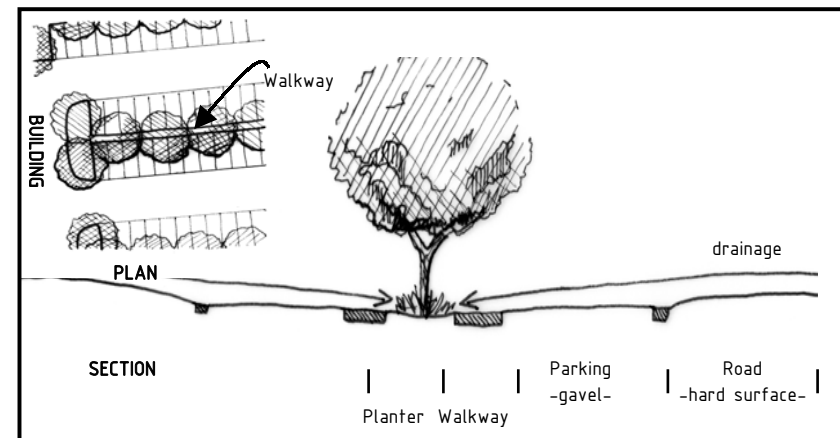


Figure 49: Stormwater management – use pervious materials to reduce runoff

7.3 PEDESTRIANWAYS

Pedestrianways serve an important social, spatial as well as a circulation role. It should be properly designed to manage and direct the flow of pedestrian movement onto and throughout the area, connect major points of origin and destination with clear and conflict free routes. Reduce or prevent conflicts between vehicles and pedestrians and provide opportunities for social interaction throughout the area.

7.3.1 CHARACTER

- ❑ Appropriate to the domestic character of the surrounding buildings
- ❑ Pleasant and comfortable to use
- ❑ Easy to understand

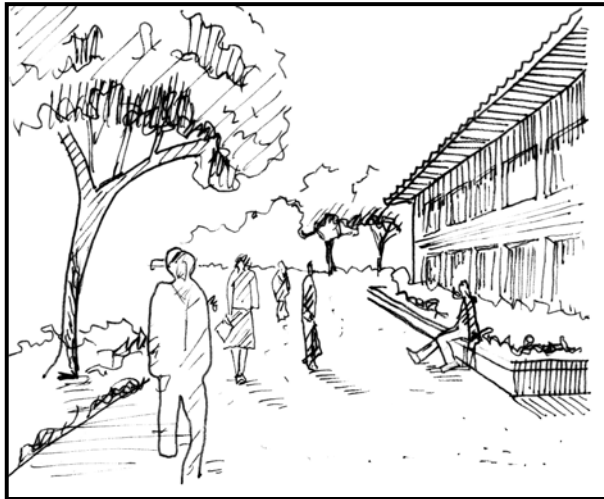


Figure 50: Pedestrianways – structured to buildings

7.3.2 FORM

- ❑ Built areas:
 - structured (Fig 50)
- ❑ Open space:
 - curvilinear, appropriate to natural topographic relief (Fig 51)
- ❑ Appropriate to function/direction of flow
- ❑ Lay-out organized to clearly lead users through the main activities and desired destinations

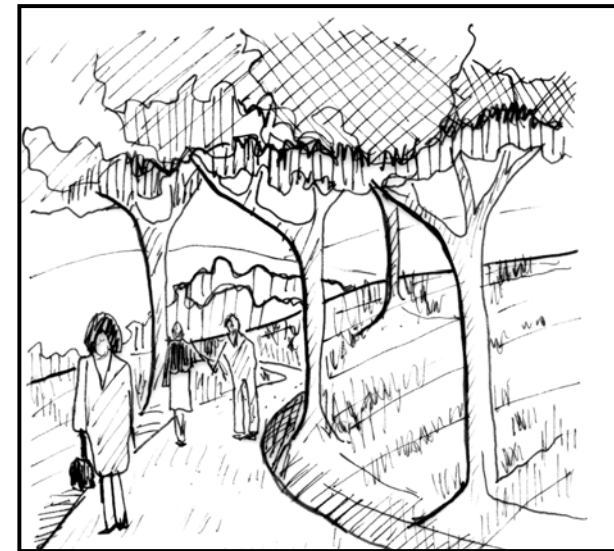


Figure 51: Pedestrianways – curvilinear form to natural areas

7.3.3 SCALE

- ❑ Dimensions appropriate to function
- ❑ Primary walkways:
 - 3-6m width
- ❑ Secondary walkways:
 - 2-3m width
- ❑ Paving:
 - pedestrian scale unit pavers

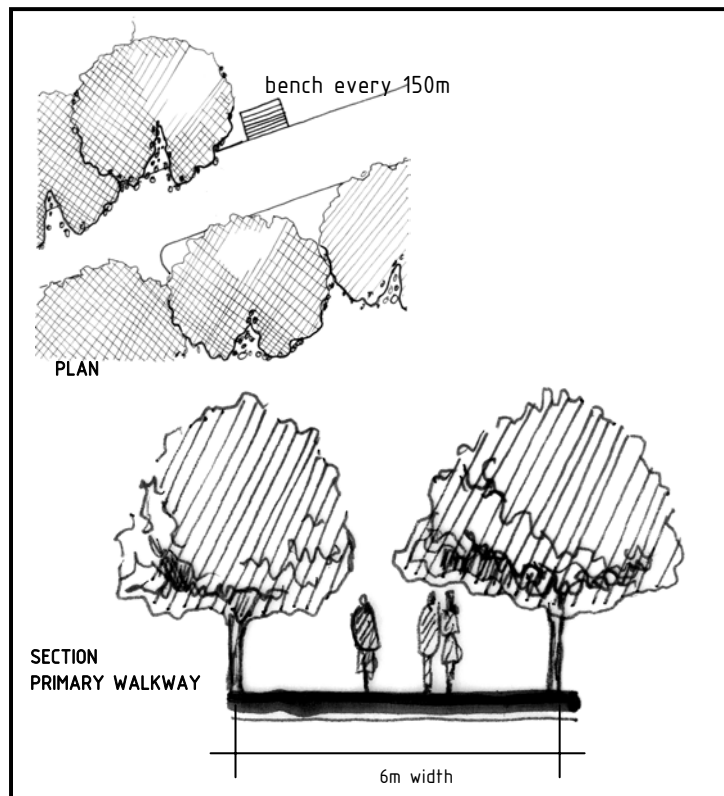


Figure 52: Pedestrianways - recommended dimensions

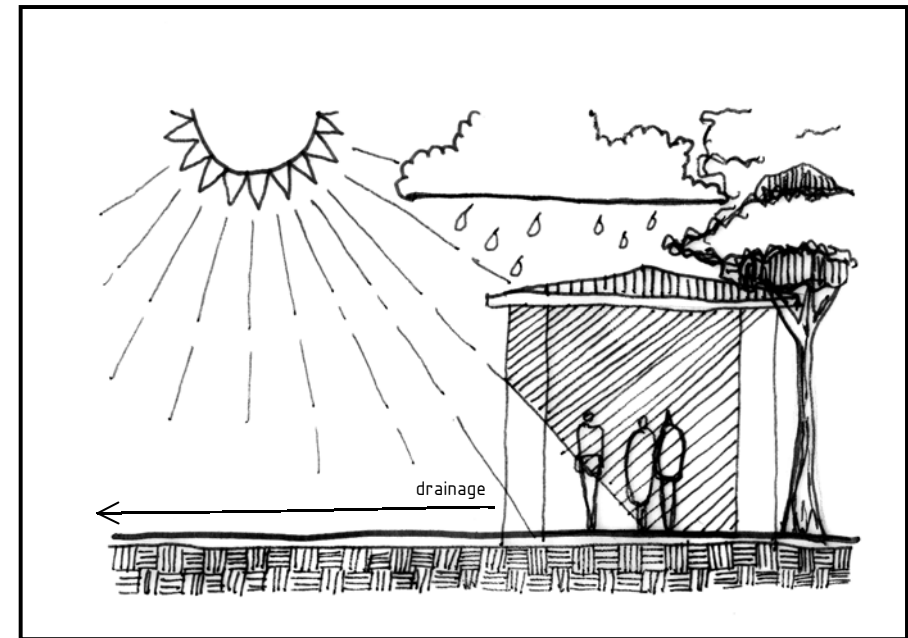


Figure 53: Pedestrianways - climate response

7.3.4 CLIMATE RESPONSE

- ❑ Rain protection along primary walkways
- ❑ Sun protection continuous along primary pedestrian walkways
- ❑ Good natural ventilation along all walkways
- ❑ Pavement:
 - low heat-absorption
 - low radiation-reflection
 - positive surface drainage

7.3.5 STRUCTURE (Fig 54)

- Ramps:
 - 1:12 (8%) max. slope
 - 9m max. length (at 1:12 -can be longer if slope is less than 1:12)
 - 1:6 (17%) max slope for curb ramps
- Primary and secondary walkways
 - 1:20 (5%) max. long slope
 - short, level areas (about 1,5m every 30m) required for wheelchairs over sustained long gradients in excess of 1:25 to 1:20
 - 1:25 (4%) max cross slope

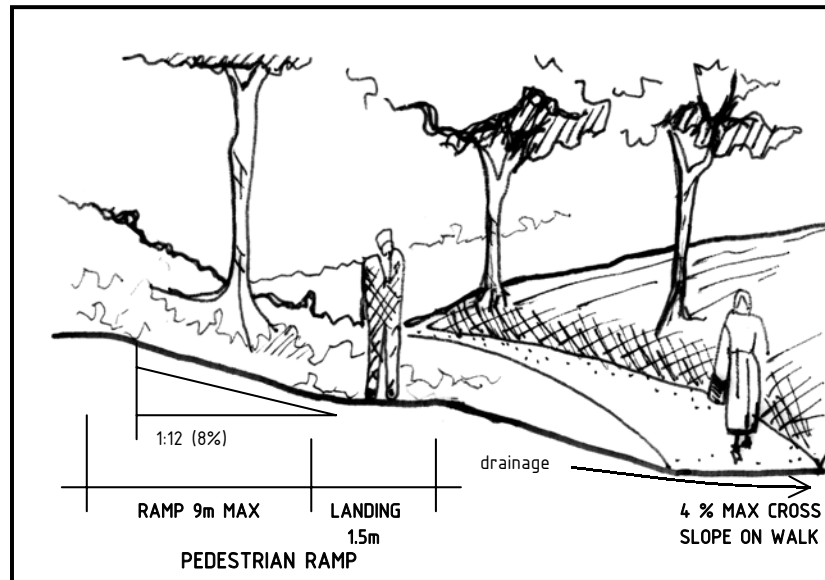


Figure 54: Pedestrianways - recommended slopes

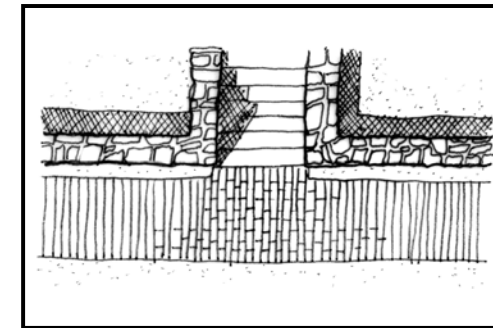


Figure 55: Pedestrianways - change surface materials

- Stairs
 - 1200mm min rise between landings in unprotected exterior stairs
 - 1800mm min between landings in protected exterior stairs
 - 1000mm min width, one-way circulation
 - 1800mm min width, two-way circulation
 - 380mm treads
 - 150mm risers
 - riser tread 530mm
 - nosing rounded or chamfered

7.3.6 MATERIALS

- Brick or unit pavers
- Durable, low-maintenance
- Non-skid surface

7.3.7 COLOUR

- Earth-tone, to co-ordinate with surrounding natural colours
- Complementary colour scheme throughout the area

7.3.8 SAFETY

- ❑ Change surface materials or textures at crosswalks, delineate clearly
- ❑ Non-skid surface
- ❑ Adequate lighting along all pedestrian circulation routes (refer to section on Lighting)
- ❑ Providing parking adjacent to the walk as an additional barrier and measure of safety
- ❑ Separating sidewalks from the roadway by a planted strip
- ❑ Providing for handicapped access along walkways at street intersections and whenever appropriate
- ❑ Depressing or raising the walk and constructing adequate barrier (Fig 56)

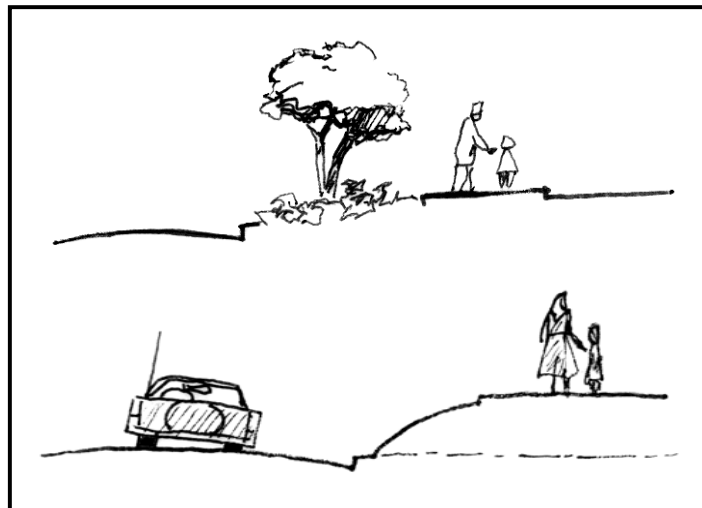


Figure 56: Pedestrianways - safety

7.4 PLANTING

Planting design for the area should be an integral part with the development, reinforcing the lay-out and forms of structural elements and open space, tempering the effects of extreme climatic conditions and visually "pulling together" the various parts of the area. It should accent desirable and screen undesirable views, add variety, texture and seasonal interest of the physical setting.

7.4.1 CHARACTER

- ❑ Appropriate to the character of the area
- ❑ Harmonious with the indigenous vegetation of the area

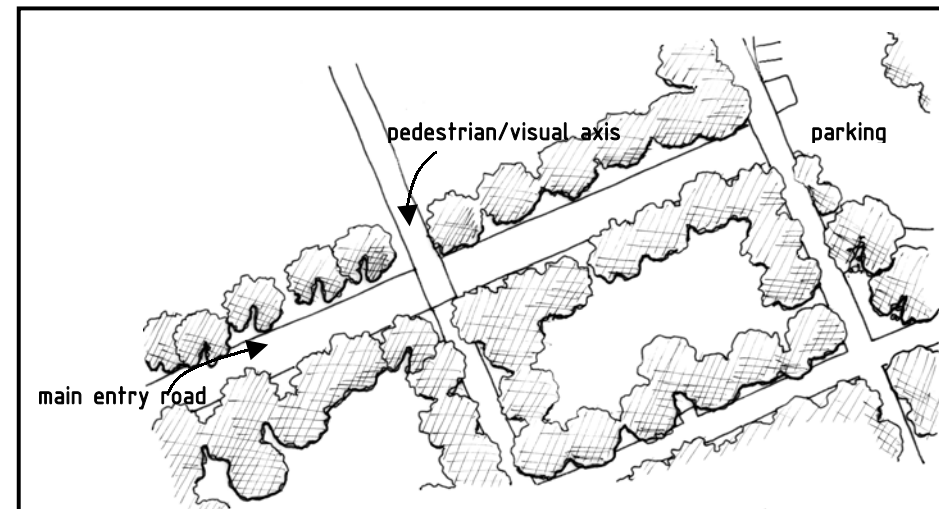


Figure 57: Planting - form suited to surrounding areas

7.4.2 FORM

- ❑ Suited to the various areas in which it will be used (i.e., open space, pedestrian paths, parking lots)
- ❑ Suited to nearby constructed forms
- ❑ Suitable for various architectural uses to create outdoor "rooms" (fig 58)
- ❑ Ceilings:
 - trees, tall shrubs or creepers on trellises to create canopies
- ❑ Walls:
 - shrubs varying in height, texture, form and colour to create total or partial enclosure as screens, baffles or barriers
- ❑ Floors
 - grasses preferred, low spreaders, small shrubs to 45cm to create transitions from one room to another

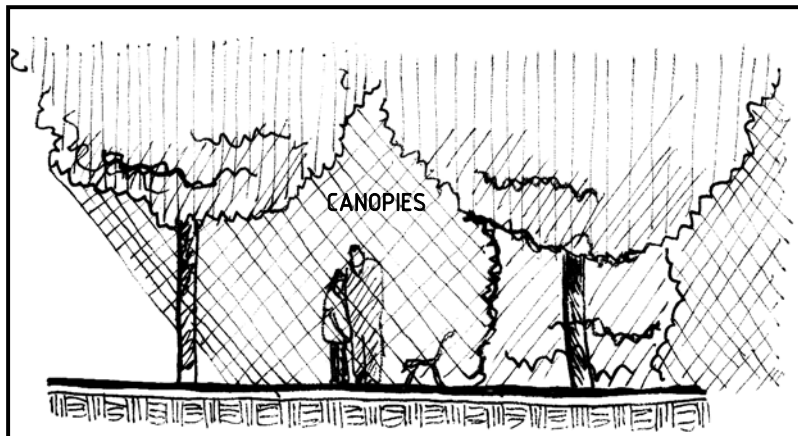


Figure 58: Planting – creating outdoor rooms: canopies

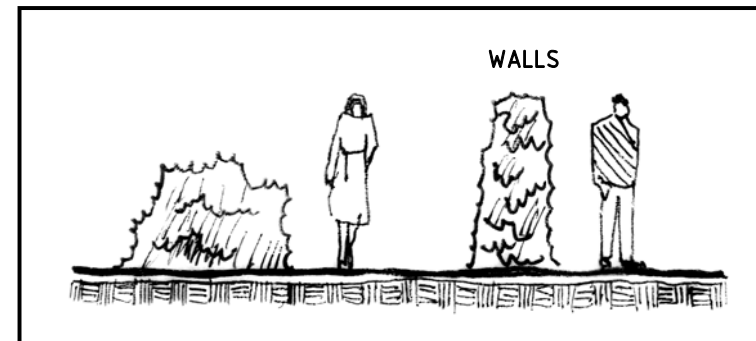


Figure 59: Planting – creating outdoor rooms: walls

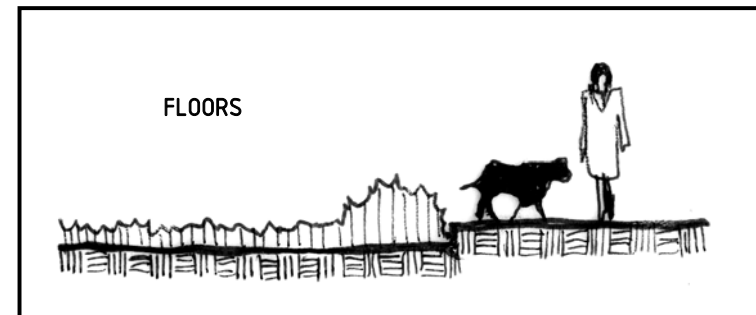


Figure 60: Planting – creating outdoor rooms: floors

7.4.3 SCALE

- ❑ Appropriate to the various areas in which it will be used (i.e. large trees in open spaces, more compact trees in plazas)
- ❑ Suitable for scaling down buildings to relate to human size
- ❑ Suited to scale of nearby hard landscape materials and patterns

7.4.4 CLIMATE RESPONSE

- ❑ Solar radiation: reduce undesirable effects of direct and reflected natural and artificial light
 - Trees: deciduous to increase winter solar penetration and summer solar deflection (Fig 61)
 - planted walls and screens: shield windows from low afternoon sun
 - grasses and ground covers: reduce glare from ground-level surfaces

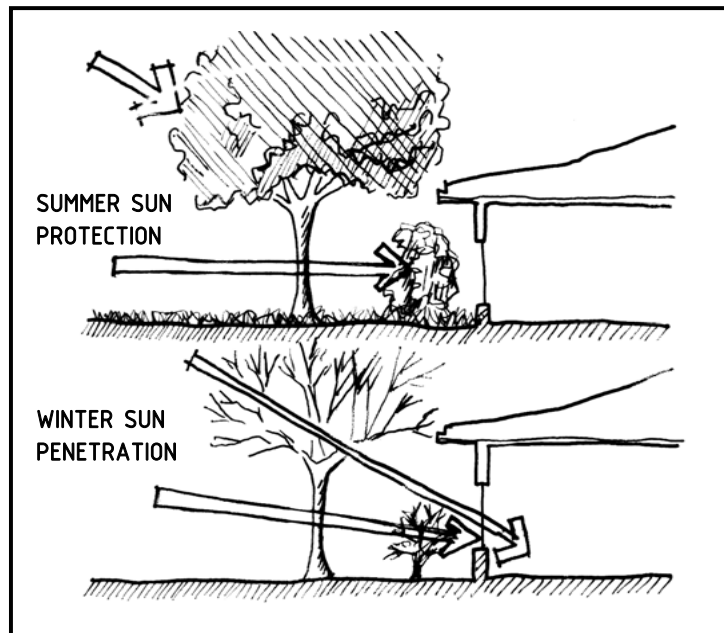


Figure 61: Planting – climate response

- ❑ Air temperature
 - reduce surface temperatures over which air moves
- ❑ Air filtration
 - foliage traps air-borne particles and buffers winds which stir up dust and dirt
- ❑ Wind
 - block, direct or amplify wind
- ❑ Erosion control
 - break force of precipitation, bind soil and hold in place, enrich soil and create mulch layer
- ❑ Wildlife habitats
 - encourage the presence of insects, birds and some small mammals

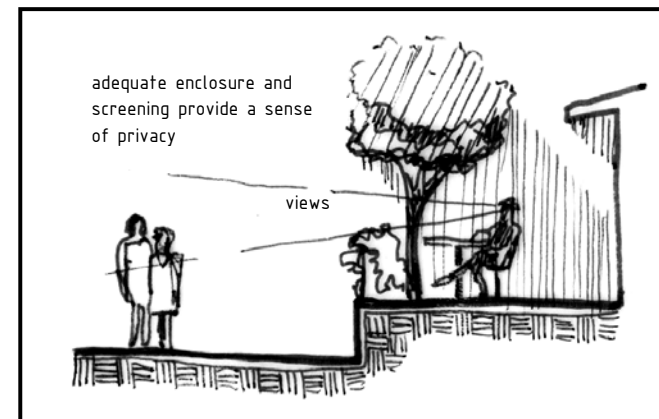


Figure 62: Planting – screening for privacy yet visually accessible

7.4.5 COLOUR/TEXTURE

- ❑ Seasonal colour variation for visual interest throughout the year
- ❑ Co-ordinated colour themes throughout the area
- ❑ Foliage/flower colour used as focal point wherever required
- ❑ Avoid competition between building and planting colours
- ❑ Textures suited to surroundings (i.e. open space, buildings, river corridor)

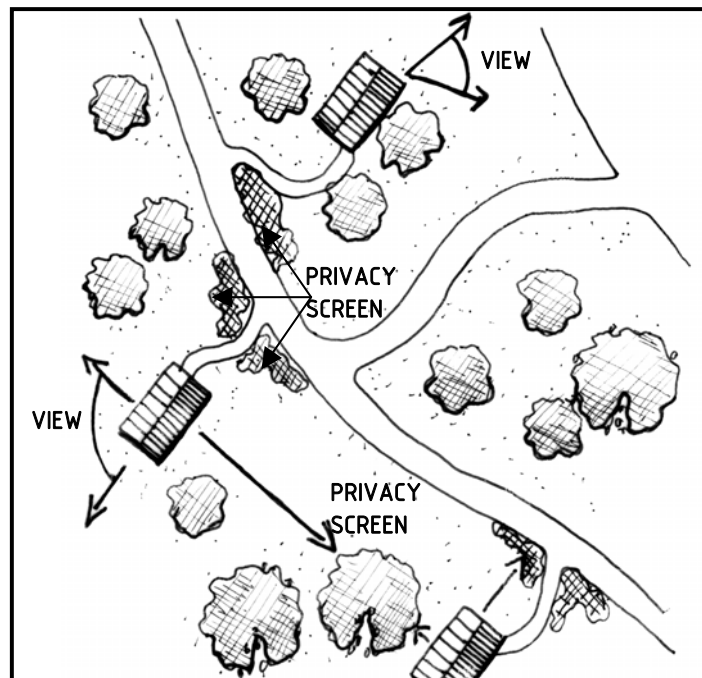


Figure 63: Planting – visual barrier between buildings

7.4.6 INSTALLATION

- ❑ Co-ordinate comprehensive planting scheme installation with building construction phase
- ❑ Plant only after major construction or disturbance in each area has been completed

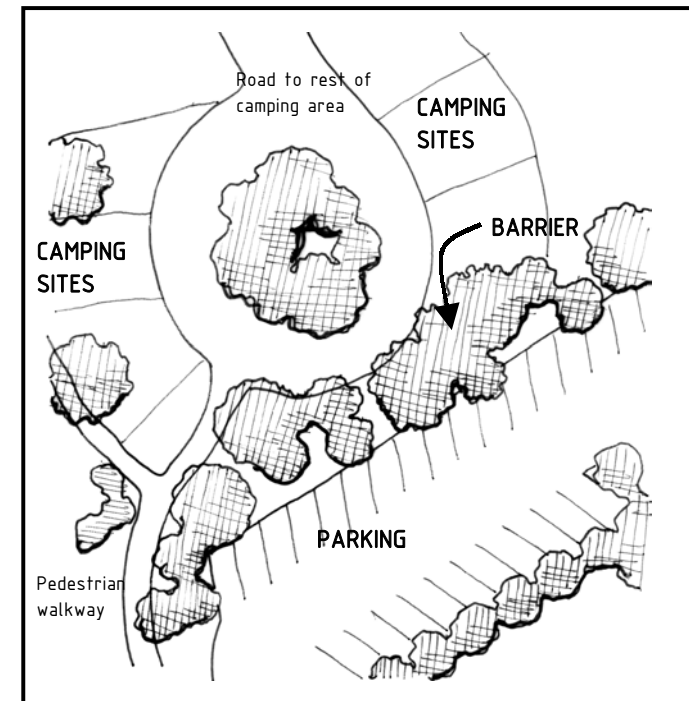


Figure 64: Planting – visual barrier between activities

7.4.7 SAFETY

- ❑ Locate and maintain plants to keep clear of sight lines, signs, building entrances
- ❑ Locate and maintain plants to keep clear of pathways

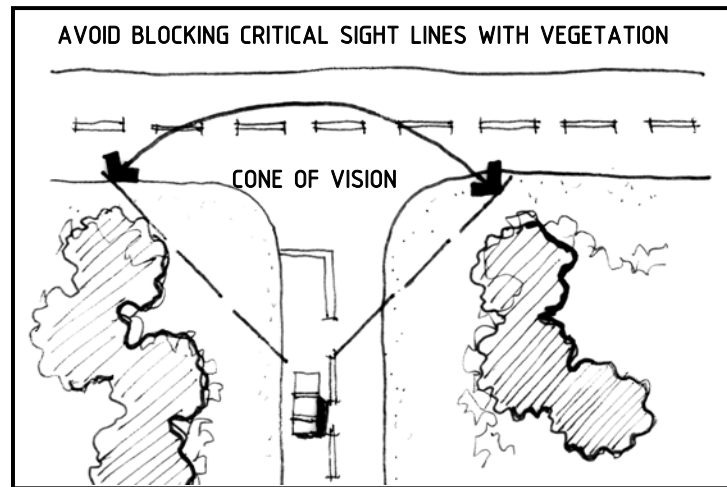


Figure 65: Planting – Safety installation

7.4.8 MAINTENANCE

- ❑ Appropriate to the local climate and growing conditions
- ❑ Ensure man-power requirements to retain desired conditions of growth, scale or form

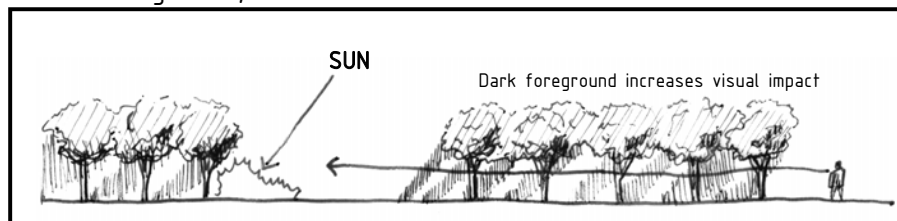


Figure 66: Planting – visual impact

7.5 BUILDING DESIGN GUIDELINES

Buildings will be a strong structural element in the area and their design should contribute to a clear understanding of the organization of both function and space throughout the site. This will be possible through the co-ordination of materials, colours and finishes for structures throughout the area, ensuring consistency of form and scale.

7.5.1 CHARACTER

- ❑ Easy to understand
- ❑ Comfortable to use
- ❑ Appropriate to the function of the development

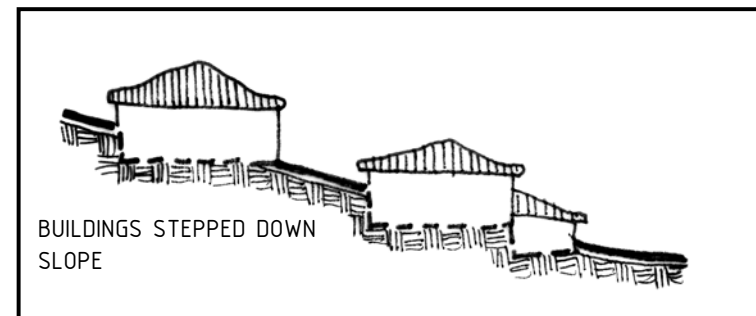


Figure 67: Buildings – form and topography

7.5.2 FORM

- ❑ Compact with min. exposed areas
- ❑ Conforming to topography
- ❑ Structure easily read
- ❑ Columns:
 - uniform character throughout
- ❑ Modules:
 - avoid monotonous repetition
- ❑ Roofs:
 - simple forms
 - pitched at 10 or 22.5 degrees
 - overhangs on all roofs
 - overhangs min. 910mm wide
 - eaves closed

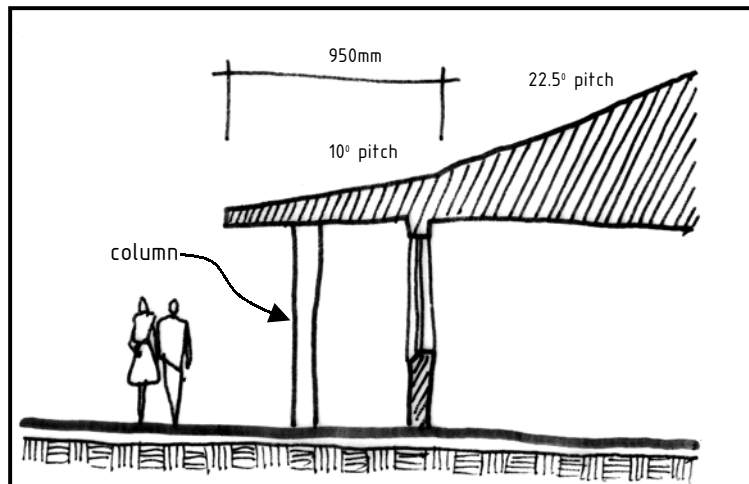


Figure 68: Buildings – roof pitch

7.5.3 SCALE

- ❑ Low buildings (1-2 storeys)
- ❑ Proportion appropriate to the site and other functions i.e. pedestrian scale
- ❑ Individual building units clearly expressed

7.5.4 CLIMATE RESPONSE

- ❑ Functions of the buildings should be arranged so that inhabited rooms exploit the equatorial solar gain in winter.
- ❑ Storage and buffer rooms should be placed to west and east
- ❑ Good natural ventilation, 1,5 m/s needed during summer days
- ❑ Glass:
 - shaded wherever possible by overhangs, trees or orientation
- ❑ Orientation:
 - longest building dimension along east-west axis
- ❑ Walkways:
 - protected from sun
 - protected from rain (concourse)
 - no heat-reflecting floors
- ❑ Walls:
 - cavity walls for thermal and moisture protection
- ❑ Windows:
 - none facing west, minimum number facing east
- ❑ Sun:
 - summer sun must be screened
 - winter sun must be allowed to penetrate

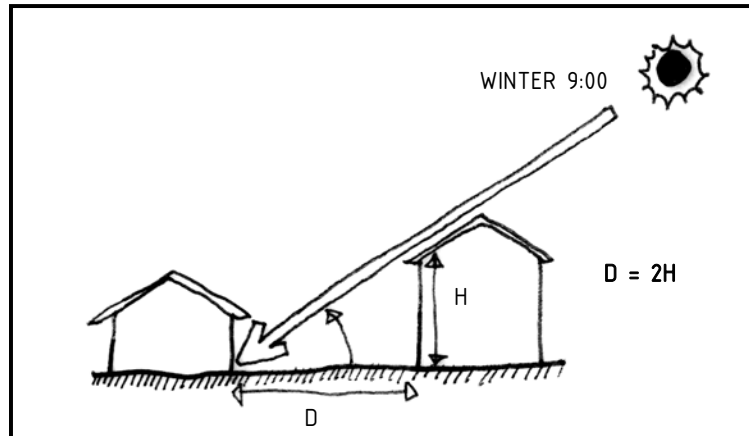


Figure 69: Buildings – solar access for building spacing

7.5.5 MATERIALS AND FINISHES

- ❑ Materials appropriate to the local conditions
- ❑ Materials with high thermal capacities like water, dense concrete and brick are ideal
- ❑ Floors should be concrete finished with grano or hard finish
- ❑ Easy to maintain
- ❑ Columns:
 - rock
- ❑ Exterior floors
 - brick, unit pavers or granolithic
- ❑ Roofs:
 - painted corrugated galvanized mild steel sheeting

- ❑ Walls:
 - rock
 - wood
- ❑ Windows:
 - steel frames

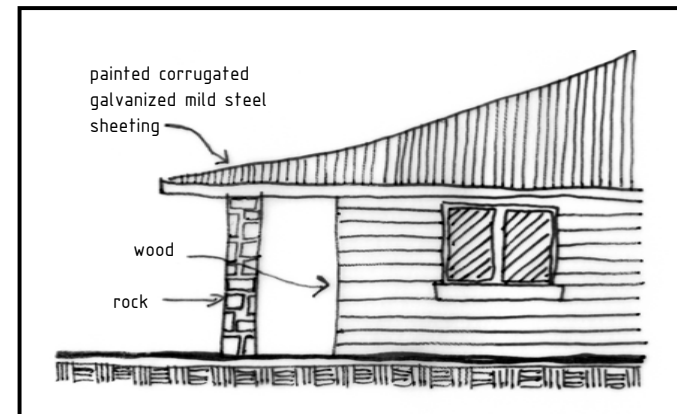


Figure 70: Buildings – materials: wood

7.5.6 EXTERIOR COLOURS

- ❑ Floors:
 - earth-tone compatible with pedestrian concourse paving
 - light, to contrast with the walls
 - avoid reflective light colours
- ❑ Roofs:
 - terra cotta
- ❑ Walls:
 - contrast with roof and walls

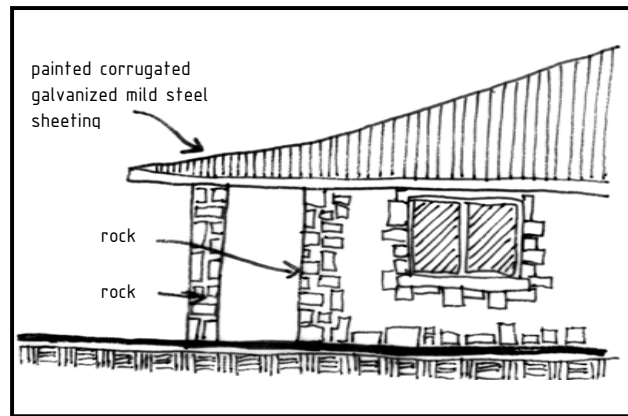


Figure 71: Buildings - materials: rock

7.5.7 SOLAR ACCESS

- ❑ Locate highest buildings to the southern side of the open space with lower buildings or trees (as enclosing elements) on the northern side
- ❑ To provide adequate solar access to a building, the distance between buildings should be determined with the following:
Distance = 2x Height

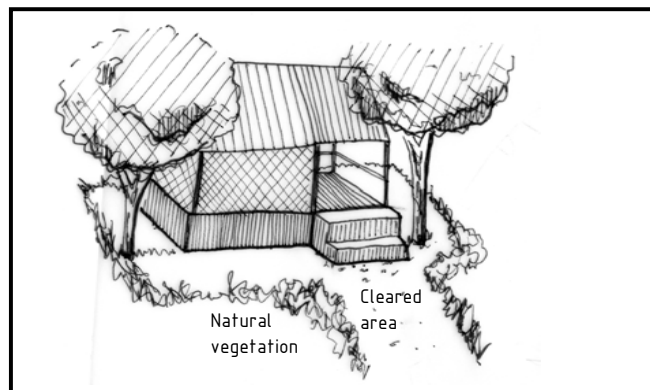


Figure 72: Buildings - Permanent tent structure

7.6 SITE FURNITURE

A well designed site furniture system can help unify the area through the co-ordination of seating, lighting, bus shelters, planters, litter bins and other items throughout the site. These items should be standardized in design and manufacture and be co-ordinate wherever possible for multiple uses. This will prevent clutter in the landscape and contribute to a unified and well-ordered appearance.

Site furniture for the area would include the following items:

- ❑ Formal and informal seating
- ❑ Formal and informal bollards
- ❑ Litter bins
- ❑ Tree grilles and guards
- ❑ Bus shelters
- ❑ Drinking fountains
- ❑ Light posts
- ❑ Sign boards

7.6.1 CHARACTER

- ❑ Appropriate to area design
- ❑ Co-ordinated throughout the area

7.6.2 FORM

- ❑ Pleasing, simple, resilient appearance
- ❑ Appropriate to surroundings
- ❑ Comfortable and easy to use and maintain
- ❑ Easy form for local manufacturing

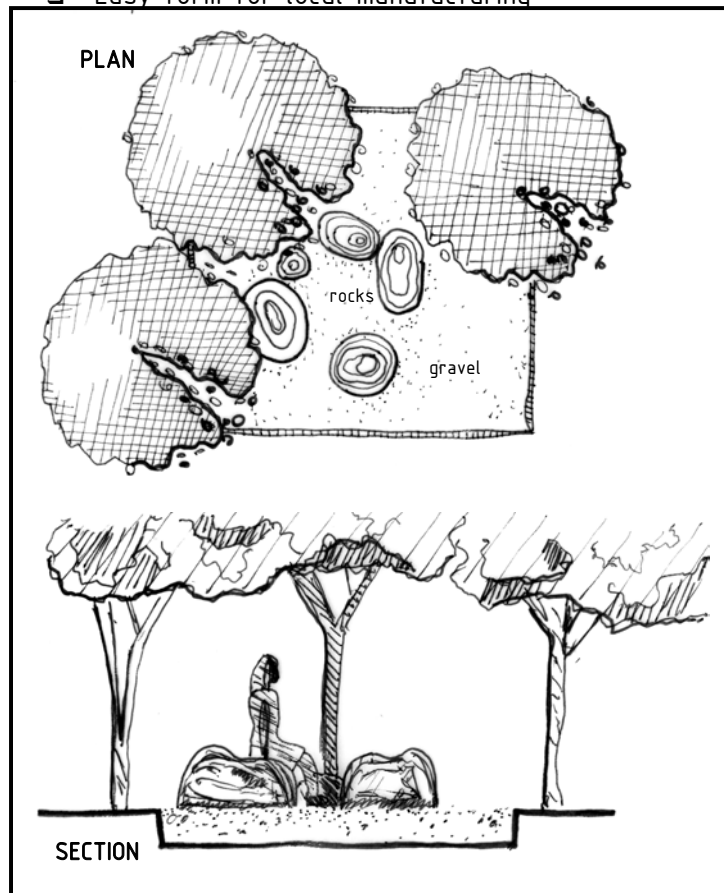


Figure 73: Site Furniture - informal seating

7.6.3 SCALE

- ❑ Suited to the locations in which they are used
- ❑ Proportioned to co-ordinate with nearby structures or natural features

7.6.4 CLIMATE RESPONSE

- ❑ Reduce solar penetration, glare and surface temperatures in seating areas
- ❑ Protection from wind and some extent rain

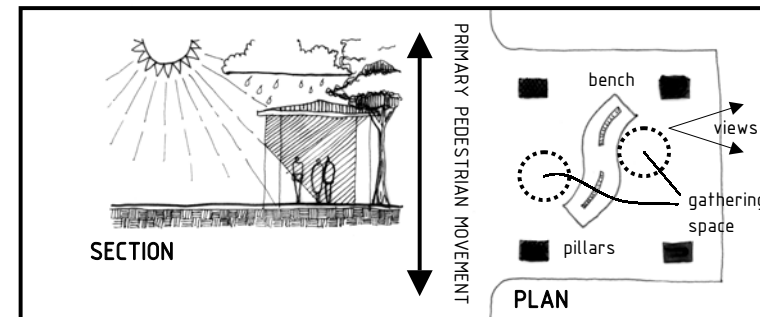


Figure 74: Site furniture - formal seating

7.6.5 STRUCTURE AND FUNCTIONAL ARRANGEMENTS

- ❑ Seating
 - 1500mm from seat front to nearest obstacle
 - 1000mm between benches, end-to-end
 - 600mm between seating and adjacent walks
 - 450-600mm seat height
 - 300-400mm seat depth
 - 600mm seating space per person
 - complementary type throughout area

- Permanent planters (Fig 75)
 - 50cm - 1m between weep holes at bottom of walls for drainage
 - avoid draining planters across pavement
- Litter Bins (Fig 76)
 - 1m height above-ground for openings
 - removable liners
 - weep holes (but not draining onto paved surfaces)
 - complimentary type throughout the area

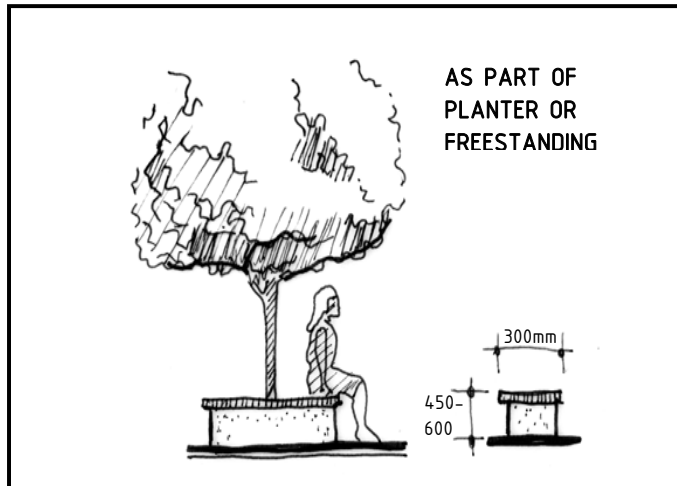


Figure 75: Site furniture - seat dimensions

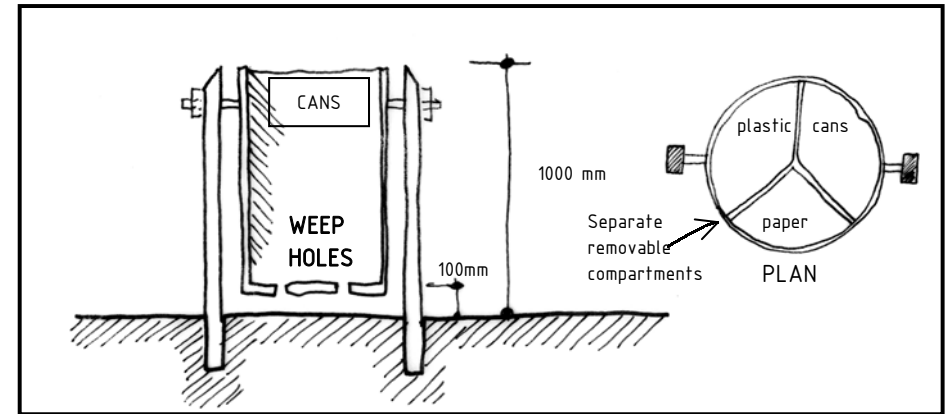


Figure 76: Site furniture - recycle litterbins

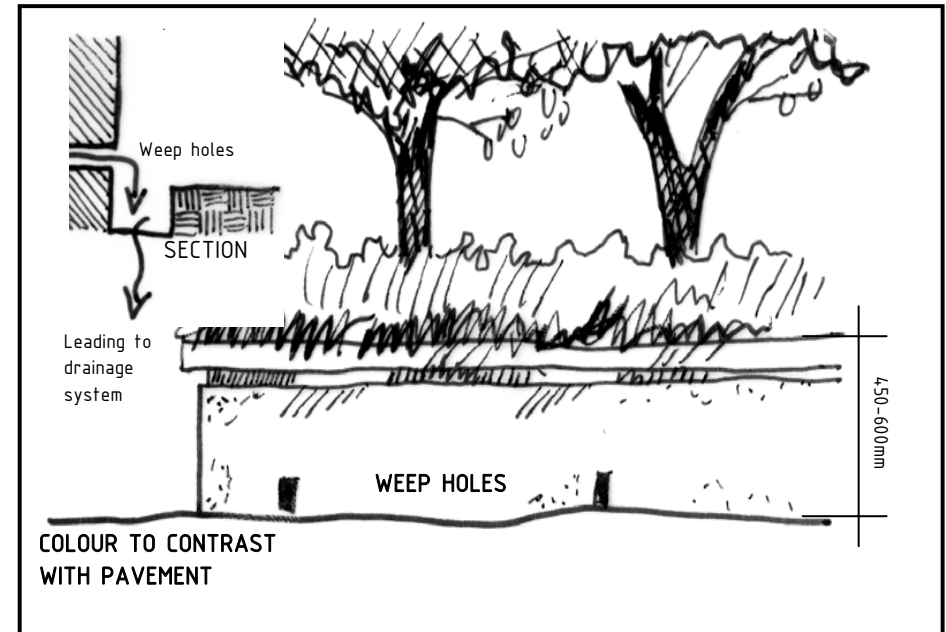


Figure 77: Site furniture - permanent planters

- Bollards (Figs 78)
- 600-1000mm height
- 1000mm length of chains if used between bollards to obstruct vehicular or pedestrian movement
- 1500-2400mm between bollards to block cars
- colour similar to building walls, nearby structural elements but should contrast with surrounding paving
- unified type throughout the area

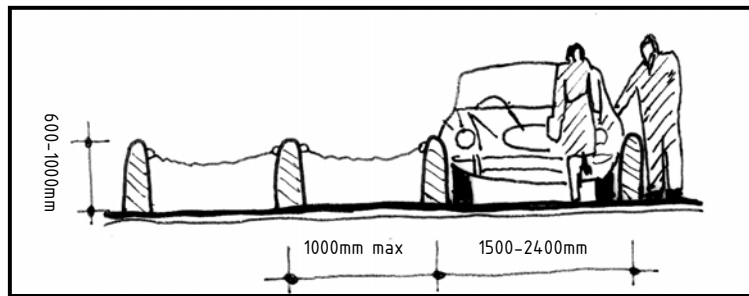


Figure 78: Site furniture - formal bollards

- Tree Grilles (Fig 80)
- install flush with pavement
- 15mm min., 20mm max width of openings around trunk
- 1m or 1 diameter grilles should be constructed in two sections

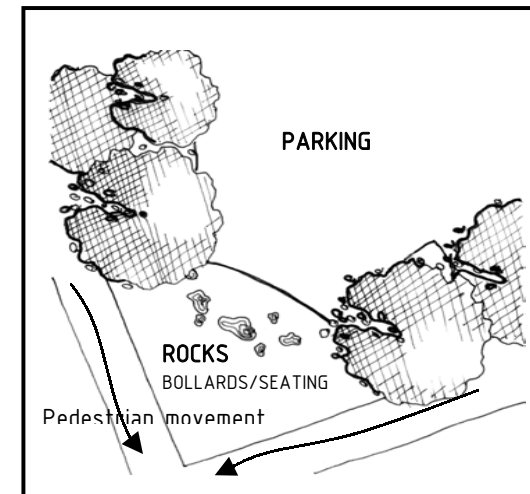


Figure 79: Site furniture - informal bollards/seating

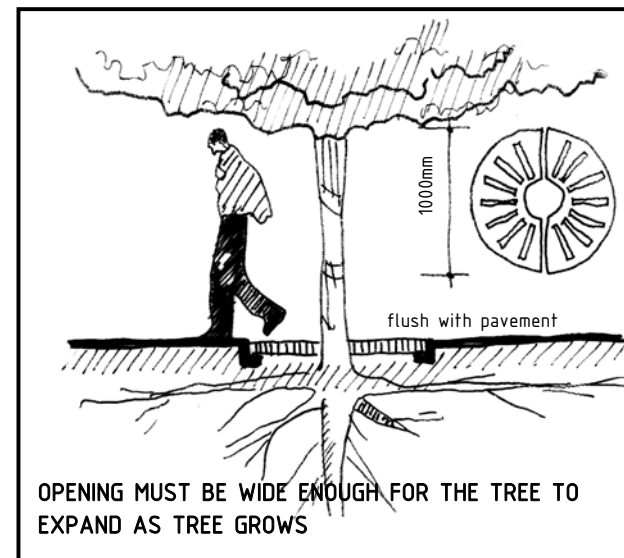


Figure 80: Site furniture - tree grilles

- ❑ Bus Shelters (Fig 81)
 - 1000mm set-back kerb, including roof overhang
 - open or transparent sides for visibility
 - seating, litter bins, display surface where appropriate
 - access in and out of shelter at two points
 - well-lighted
 - designed to conform to appropriate architectural style

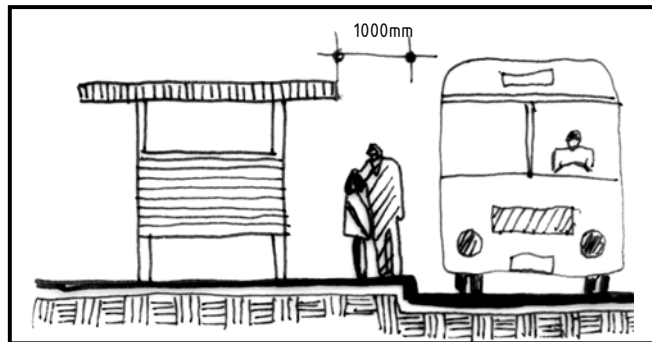


Figure 81: Site furniture - bus shelters

- ❑ Drinking Fountains (Fig 82)
 - 850 mm nozzle height for wheelchairs and children
 - 1000mm nozzle height for adults
 - wide paved area around fountain
 - unified type throughout the area

- ❑ Co-ordinate with surrounding materials
- ❑ Seating:
 - easily drained/fast drying
 - avoid rough materials or those that develop splinters
 - comfortable for extended periods of use
- ❑ Planters:
 - co-ordinate with buildings, pavement and nearby walls
- ❑ Litter Bins:
 - interiors easy to clean
 - co-ordinate with buildings and other site furnishings
- ❑ Bus shelters:
 - co-ordinate with buildings

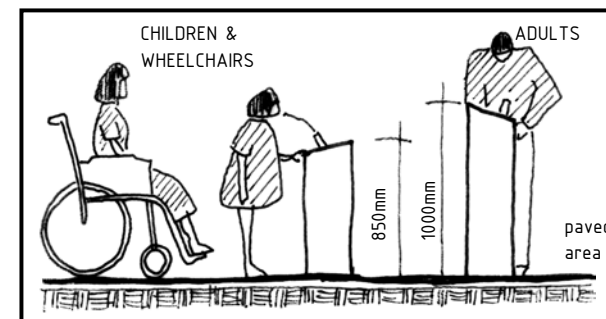


Figure 82: Site furniture - drinking fountain

7.6.6 MATERIALS

- ❑ Durable and easily maintained
- ❑ Resistant to ultraviolet and chemical weathering
- ❑ Vandal resistant

7.6.7 COLOUR

- ❑ Co-ordinate with surroundings
- ❑ Bollards and other elements should contrast with surrounding paving but should not be visually obtrusive
- ❑ Co-ordinate throughout the area for a unified appearance

7.7 LIGHTING

The location and design of lighting throughout the site should provide adequate illumination for visibility, safety and pleasing appearance. Fixtures should be durable, multifunctional and easy to maintain.

7.7.1 CHARACTER

- ❑ Appropriate to the surroundings
- ❑ Suitable to the character of the area
- ❑ Co-ordinated throughout the area
- ❑ Appropriate to the design style of the area elements

7.7.2 FORM

- ❑ Suitable for the surrounding spaces
- ❑ Appropriate for surrounding structures

7.7.3 SCALE

- ❑ Suitable for areas in which it will be used:
 - bollards 1000mm height
 - walkways 3-4m height
 - roadways 9-15m height

7.7.4 CLIMATE RESPONSE

- ❑ Fixtures resistant to dust and high solar radiation

7.7.5 MATERIALS

- ❑ Co-ordinate with other site furnishings
- ❑ Vandalism resistant
- ❑ Easy to maintain

7.7.6 SAFETY

- ❑ Adequate light levels in various part of the site:
 - Plazas 100 lux
 - Pedestrianways 100 lux
 - Parking areas 100 lux
 - Bus shelters 500 lux
 - General grounds 100 lux
 - Building entrances 500 lux
 - Recreation facilities 500 lux
- ❑ Illumination levels may vary to meet special requirements

7.7.7 ECONOMY

- ❑ Select energy-efficient systems consistent with the visual quality of the light colour

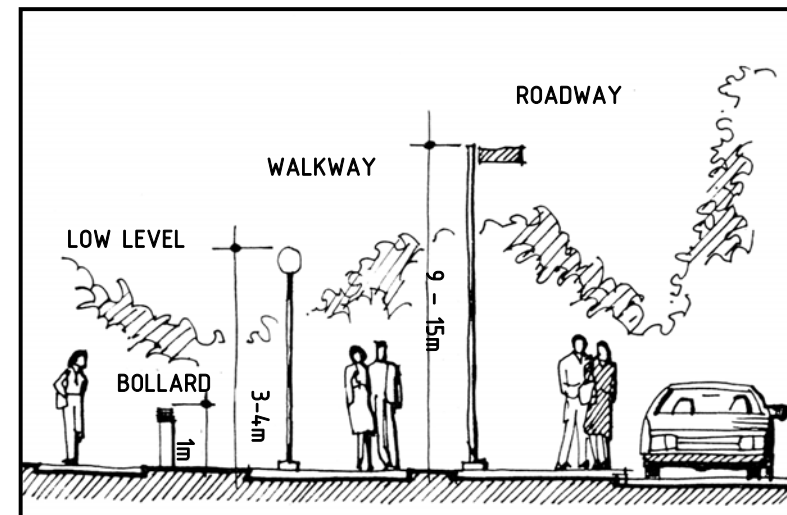


Figure 83: Lighting - recommended lights

7.8 SIGNAGE

The design and location of signage throughout the area should co-ordinate with the design and location of all the components. The directions or information contained on each signage element should be clear and suited to its particular function, while the appearance of the signage should complement and harmonise with the surroundings.

Sign types for the area would include the following items:

- ❑ Trail-blazer
- ❑ Entrance sign
- ❑ Arterial directory
- ❑ Internal directory
- ❑ Street signs
- ❑ Pathway guides
- ❑ Destination identification

7.8.1 CHARACTER

- ❑ Appropriate to particular functions
- ❑ Easily recognizable
- ❑ Co-ordinate throughout the area
- ❑ Appropriate to the design style and architectural forms

7.8.2 SCALE

- ❑ Fitted to surrounding areas
- ❑ Appropriate to particular functions:
 - motorist eye level 1070mm – 1200mm
 - pedestrian eye level 1740mm

- ❑ Characters/symbols easily read from appropriate distances
 - ❑ Appropriate to reading distance and speed of viewer travel
- | Character/Symbol size | Max. Reading Distance |
|-----------------------|-----------------------|
| 100mm | 39m |
| 80mm | 30m |
| 60mm | 22m |
| 40mm | 15m |
| 25mm | 10m |
| 13.5mm | 6m |
| 7.5mm | 3m |

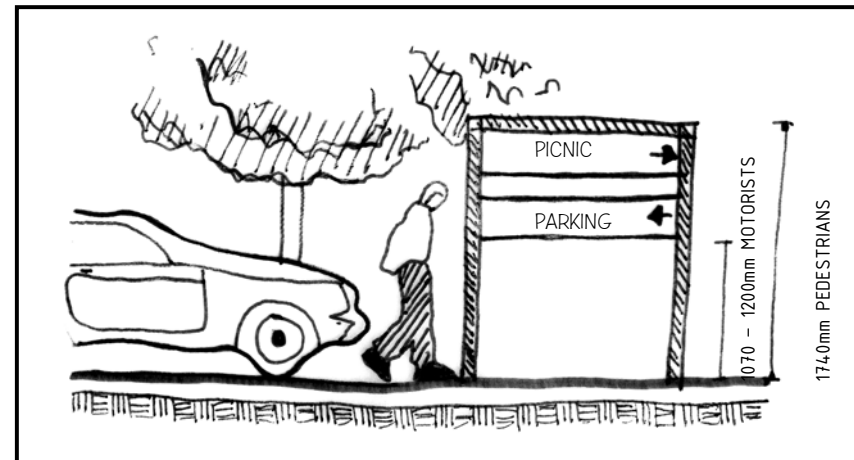


Figure 84: Signage – typical eye levels

7.8.3 FORM

- ❑ Fitted to surrounding areas
- ❑ Appropriate to particular functions
- ❑ Co-ordinate throughout the area

7.8.4 CLIMATE RESPONSE

- ❑ Materials resistant to high ultraviolet radiation and dust
- ❑ Position to reduce potential glare on readable surfaces
- ❑ Locate to reduce maintenance associated with climatic exposure

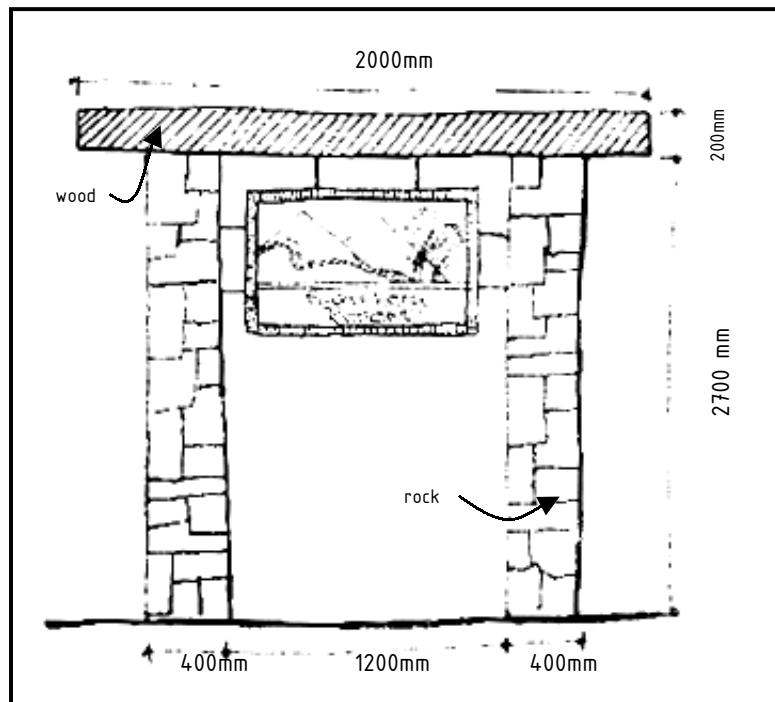


Figure 85: Signage – entrance sign

7.8.5 STRUCTURE AND FUNCTIONAL ARRANGEMENTS

- ❑ Trail-blazer
 - located on the major approach roads to alert and guide visitors
- ❑ Entrance sign
 - placed inside property lines to announce arrival and help create an attractive portal

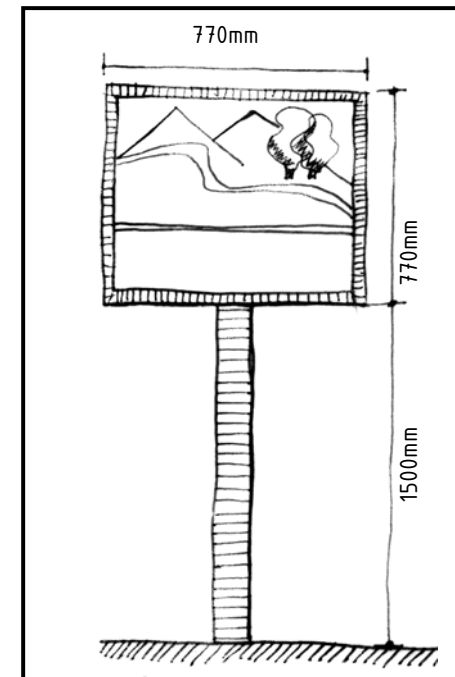


Figure 86: Signage – trail-blazer

- ❑ Arterial directory
 - located on the arterial approaches to every major intersection and list the major destinations
- ❑ Internal directory
 - placed at each intersection or activity centre and provide essential guidance
- ❑ Street signs
 - located with consistent setbacks, at every intersection. Preferably in combination with lighting
- ❑ Pathway guides
 - place and way information is to be provided at the main intersections of pedestrian walks and bicycle paths
- ❑ Group signs into unified systems
- ❑ Avoid clutter
- ❑ Informational signs located at major access points, gathering spots
- ❑ Incorporate into design of site furniture
- ❑ Avoid interfering with pedestrian circulation
- ❑ 500mm min. setback from walkways
- ❑ Avoid interfering with vehicular circulation and door opening
- ❑ Convenient to describe or label displays

7.8.6 COLOUR

- ❑ Co-ordinate throughout the area
- ❑ Suitable to function
- ❑ Appropriate for settings

7.8.7 SAFETY

- ❑ Materials resistant to vandalism
- ❑ Adequate lighting wherever required
- ❑ Locate out of pedestrian and vehicular circulation routes