

# Stormwater Management

## Acceptable Solution No. 2 - Soakage Pit

Use of water infiltration for Stormwater Management for residential development with total additional hardstand areas greater than 30m<sup>2</sup> and up to or equal to 250m<sup>2</sup>

Version:1

Date: 16 April 2026

### Purpose of this document

Acceptable Solutions provide options for development to meet the requirements for stormwater management in Timaru District. It is a simplified process for selection of stormwater management devices and provides solutions to meet the stormwater quantity and quality desires of the district.

### How to use this document - Acceptable Solution No.2 – Soakpit for Stormwater Management

Soakage pits provide a stormwater discharge function through a ground infiltration process. The excavated pit is filled with rocks, and the void spaces provide stormwater storage until the stormwater runoff infiltrates into the ground. To choose the soakpit surface area (m<sup>2</sup>) from the table 1 below, you will need to:

- ✓ Identify the location of your development (Geraldine, Temuka or Pleasant Point). For Timaru an initial ground permeability test must be implemented due to the lack of well drained soils.
- ✓ Insert the pre- and post-development areas into the Acceptable Solution 2 calculator, the total areas must add up.
- ✓ The additional hardstand areas of your development are automatically calculated. Therefore, refer to the bottom cells of the calculator or simply use the table below, depending on your location, for soakpit sizing.

| <b><u>Table 1</u></b>                            |                                      | <b>Geraldine</b>                                |                              | <b>Temuka/Pleasant Point</b>                    |                              |
|--------------------------------------------------|--------------------------------------|-------------------------------------------------|------------------------------|-------------------------------------------------|------------------------------|
| <b>Additional Hardstand Area (m<sup>2</sup>)</b> | <b>Min infiltration rate (mm/hr)</b> | <b>Soakpit Surface Area Asp (m<sup>2</sup>)</b> | <b>Soakpit min depth (m)</b> | <b>Soakpit Surface Area Asp (m<sup>2</sup>)</b> | <b>Soakpit min depth (m)</b> |
| 30-70                                            | 50                                   | 2                                               | 2                            | 2                                               | 2                            |
| 71-110                                           | 50                                   | 3.5                                             | 2                            | 3                                               | 2                            |
| 111-140                                          | 50                                   | 4.5                                             | 2                            | 3.5                                             | 2                            |
| 141-170                                          | 50                                   | 5.5                                             | 2                            | 4.5                                             | 2                            |
| 171-210                                          | 50                                   | 6.5                                             | 2                            | 5.5                                             | 2                            |
| 211-250                                          | 50                                   | 8                                               | 2                            | 6.5                                             | 2                            |

The use of this acceptable solution is not mandatory. The applicant can provide hydraulic and/or engineering calculations to comply with TDC's and the Building Code stormwater management requirements.

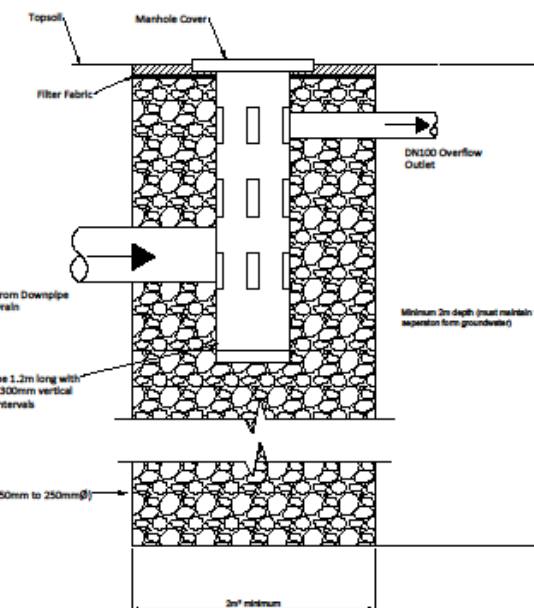
For instance, if you can provide a greater infiltration rate (mm/hr) and groundwater level below existing ground based on testing the ground conditions on site, the soakpit surface area (m<sup>2</sup>) may become smaller.

### Requirements and Limitations

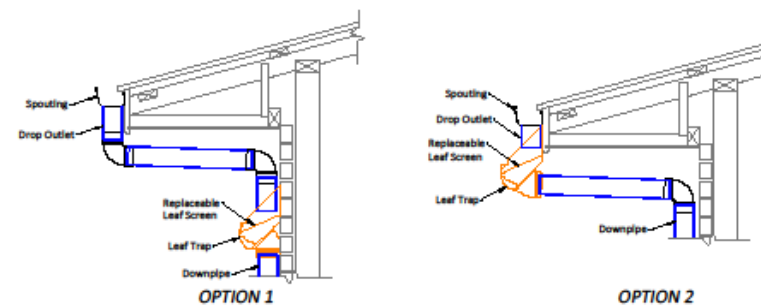
1. This acceptable solution is only applicable to meet the requirement of stormwater quantity neutrality for residential development with total hardstand areas greater than 30m<sup>2</sup> and up to or equal to 250m<sup>2</sup>.
2. A leaf diverter, or similar litter diversion trap or filter, must be installed on the downpipes or prior to the inflow to your soakage device.
3. You must install an overflow pipe to be connected to an acceptable outfall or public system, including kerb and channel when available.
4. Soakage pits should be constructed in medium textured soils with high permeability. They are unsuitable for use in areas of high groundwater levels and/or impermeable soils. Therefore, for Timaru further assessment on ground conditions must be carried out due to the lack of well drained soils.
5. The rate at which water dissipates into the ground depends on the infiltration capability of the soil. The rate of infiltration is measured by a field test, such as a percolation test, cased borelog infiltration testing, double ring infiltrometer testing, etc.
6. The lowest measured infiltration rate must be equal to or greater than 50mm/hr. Therefore, soils must have a minimum infiltration rate of 17 mm/hr after including a factor of safety of 3.
7. The installation of the soakpit must be in accordance with a TDC Standard Urban Soakpit and engineers' advice if needed. [Refer to Figures 2 for Acceptable Solution 2- Soakpit Details]
8. Soakpits are not considered to provide stormwater treatment. A stable system that does not scour and increase sediment load to the soakage device is required to improve the long-term performance of the device and minimise operation and maintenance constraints.
9. This spread sheet only consists of a minimum infiltration rate of 50mm/hr and a soakpit depth of 2m, assuming groundwater is at 3m below surface level. These requirements ensure a draw down time less than 48hr and minimum depth.
10. Any variation from the details in Table 1 will mean your stormwater management is non-compliant with this Acceptable Solution and engineering compliance may be required.

**Figure 1: Example Construction Detail of an Urban Private Soakpit**

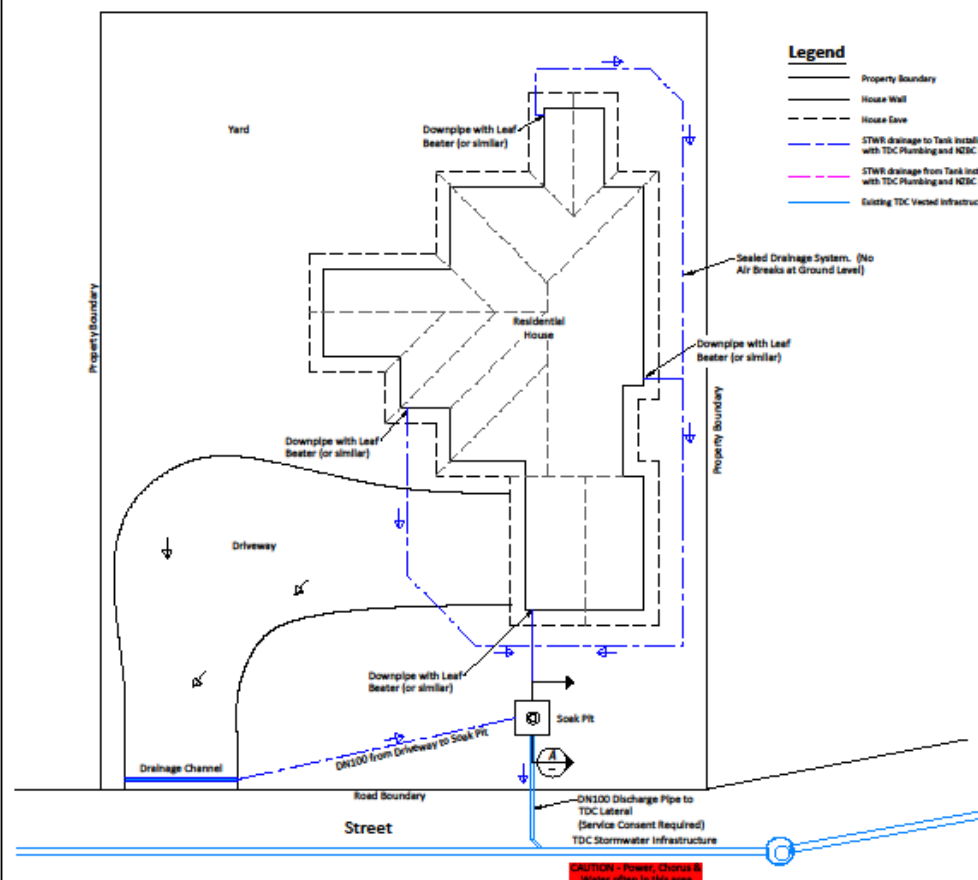




SECTION A  
Scale: 1:10 @ A1



TYPICAL LEAF TRAP INSTALLATION  
Scale: 1:10 @ A1



EXAMPLE DRAINAGE SITE LAYOUT  
Scale: 1:100 @ A1

- Legend**
- Property Boundary
  - House Wall
  - House Cove
  - STWR drainage to Tank installed in accordance with TDC Plumbing and NSBC Requirements
  - STWR drainage from Tank installed in accordance with TDC Plumbing and NSBC Requirements
  - Existing TDC Vented Infrastructure

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|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED: 06_15_2018         |  |  |  |  |  |  |  |  |  | CHECKED: 06_15_2018  |  |  |  |  |  |  |  |  |  | Timaru 7940         |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  | DESIGNED:                    |  |  |  |  |  |  |  |  |  |                      |  |  |  |  |  |  |  |  |  |                     |  |  |  |  |  |  |  |  |  |                                                                                       |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                         |  |  |  |  |  |  |  |  |  |                |  |  |  |  |  |  |  |  |  |      |  |  |  |  |  |  |  |  |  |   |  |  |  |  |  |  |  |  |  |