

## Private Pumping Installation Application

### Authorisation for private pumping systems for domestic, industrial and commercial premises, discharging in the sewerage system.

As required by the *Sewerage Act 1929*, Section 35, Regulation 8 (1) (a)

#### This document covers:

1. authorisation by SA Water to install private pumping systems to convey sewage, trade wastes, sullage and seepage water from private properties (domestic, commercial or industrial).
2. acceptance of discharges from these pumping systems into the sewerage system.

SA Water is not responsible for the design, operation, maintenance and suitability of these private pumping systems and therefore these aspects are not covered in this documentation.

SA Water will consider accepting flows from private pumping installations into the sewerage system providing the following discharge rates and discharge conditions are met, irrespective of whether a trade waste discharge licence is required to discharge waste.

#### Discharge flow rate:

All pumped discharges into the sewerage system must be approved in writing by SA Water as detailed below and must also be in accordance with the following criteria:

1. Pumped flows up to and including 1.0 litre/second can be discharged to the sewerage system on written approval from the Customer Technical Services Branch.

Note: Discharges from sullage tanks receiving single or double bowl domestic kitchen sinks are exempt.

2. Flow rates above 1.0 litre/second and up to a maximum of 2.0 litres/second can only be discharged to the SA Water sewerage system with the written approval of the Manager Systems Planning (via the Customer Technical Services Branch). The Manager Systems Planning has the responsibility for assessing capacity issues within the SA Water sewerage system.
3. For flows exceeding 2.0 litres/second, day time discharges may be precluded by SA Water, or special discharge conditions will apply, possibly including on-site storage for disposal during specified off-peak times.

All approvals under clause 3 must be approved by the Manager Systems Planning (via the Customer Technical Services Branch).

#### Supporting information:

- To ensure a pumped discharge application is processed without delay, the attached pro forma must be completed and submitted to SA Water at least 14 days prior to commencement of works
- Applicants are advised to contact the Plumbing Services Coordinator (Customer Technical Services Branch) (08)82071420 for advice on any matter contained in this pro forma
- All plumbing work on the pumping system and its connection into the sewerage system must be carried out by a licensed plumbing contractor and must be inspected/audited by SA Water (via the Customer Technical Services Branch)
- Bookings for inspections can be made via the SA Water Customer Contact Centre on 1300 884 055 or via the internet at <http://plumbooking.sawater.com.au>
- A Certificate of Completion for the pumping installation and/or connection into the sewerage system is to be submitted to SA Water within 7 days after completion, as per Regulation 15 under the *Sewerage Act 1929*
- Trade waste, toxicity/chemical composition discharges must comply with the *Sewerage Act 1929*, Part 5, Section 54 and Regulation 20

## Private Pumping Installation Application

This pro forma applies for authorisation by SA Water for:

- use of private pumping systems to convey sewage, trade wastes, sullage and seepage water from private properties (domestic, commercial or industrial)
- acceptance of discharges from those pumping systems into the sewerage system

**This pro forma must be completed in full prior to assessment of the application.**

<b>Owner/business name:</b> _____	
Property address: _____	Suburb/Town: _____ Postcode: _____
Postal address: _____	Suburb/Town: _____ Postcode: _____
Telephone: _____	Mobile: _____
	Email: _____
<b>Consultant/designer</b>	
Contact Person: _____	Telephone: _____
Postal address: _____	Mobile: _____
Suburb/Town: _____ Postcode: _____	Email: _____
<b>Wastewater flow details</b>	
Type of waste pumped: _____	Duration of the discharge/s (eg 5 mins each cycle): _____
Maximum rate of discharge: _____ L/sec	Maximum daily discharge to sewer: _____ kL/day
Discharge time/s during day/night: _____	Flow velocity in pumping mains: _____ m/sec

### Further information

Customer Technical Services Branch  
 GPO Box 1751  
 ADELAIDE SA 5001  
[www.sawater.com.au](http://www.sawater.com.au)

<b>Pumping unit details</b>	
(a) Manufacturer's pump performance curves <b>must be</b> submitted with this application.	
(b) Pumping unit:	Make: _____ Speed: _____ Type: _____ Max sphere: _____ Model: _____ Curve no: _____ Duty: Flow (L/sec): _____ Head (m): _____ Motor (kw): _____
(c) Distributor:	Name: _____ Address: _____
<b>Pumping system details</b> (refer to Figure 1)	
(a) Pipe material: _____	
(b) Pipe outer diameter (OD) : _____ Class _____	
(c) Internal diameter/mean bore size of drain at the discharge connection point (ID): _____ mm	
(d) Pipeline length (sump to discharge connection point: L _____ m	
(e) Static head: $H_s$ : _____ m	
<b>Plans</b> - please provide <b>two copies of the plans</b> including the following details	
(a) Details and locations of holding tanks, wet wells, associated with the pumping installation.	
(b) Site plan and elevation sections detailing, levels and location of pipe work used in the pumping system.	

**Pipeline details** (Refer table 1)

Pipe internal diameter (ID/mean bore size): \_\_\_\_\_ mm

Fitting type	No. of fittings	Factor (table 1)	Equivalent lengths (m)
Bends			m
Gate valves			m
Reflux (non return valve)			m
Others			m
Total length: ( $L_T$ )			m
Total equivalent pipeline length: ( $L_e = L + L_T$ )			m

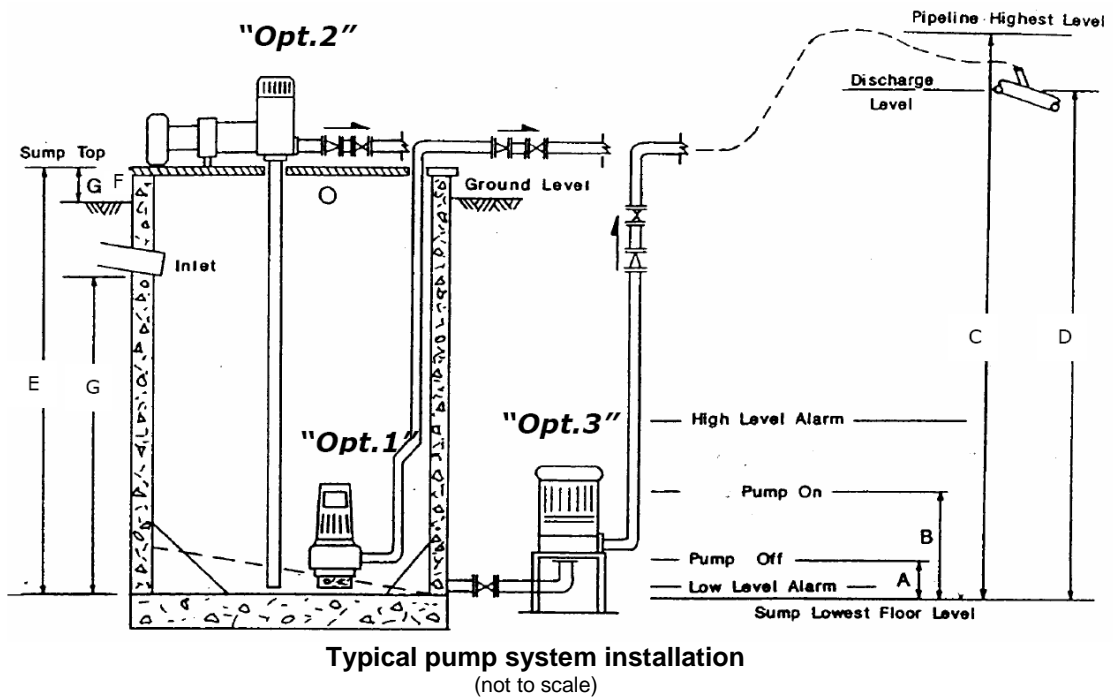
Table 1: Equivalent pipe length for pipe fittings

Fitting type	Equivalent pipe length (m)					
	Fitting nominal ID (mm)					
	40	50	65	80	90	100
45° → 90° standard bend	1.7	2.1	2.5	2.9	3.3	3.6
45° → 90° long radius bend	0.7	0.9	1.0	1.2	1.4	1.5
Gate valve	0.3	0.3	0.4	0.5	0.5	0.6
Reflux valve	2.1	2.6	3.1	3.6	4.1	4.5

**Further information**

Customer Technical Services Branch  
 GPO Box 1751  
 ADELAIDE SA 5001  
[www.sawater.com.au](http://www.sawater.com.au)

**Pumping system layout** Figure 1: Typical pumping system – examples of options 1, 2 and 3



All dimensions are relative to sump floor lowest level.

A: \_\_\_\_\_ E: \_\_\_\_\_

B: \_\_\_\_\_ F: \_\_\_\_\_

C: \_\_\_\_\_ G: \_\_\_\_\_

D: \_\_\_\_\_

Pump's maximum operating static head  $H_s$ : (C-A) : \_\_\_\_\_ m Ref Fig. 1

**PLEASE NOTE:**

SA Water has no responsibility for the design, operation, maintenance and suitability of private pumping systems.

**Further information**

Customer Technical Services Branch

GPO Box 1751

ADELAIDE SA 5001

[www.sawater.com.au](http://www.sawater.com.au)

Revised December 2009