

Supplementary Materials

Table S1.

Case study 2. Nodal average daily demands.

Node	daily demand (l/s)
1	1.38
2	0.18
3	0.92
4	2.57
5	2.83
6	8.36
7	3.42
8	5.33
9	1.52
10	0.86
11	2.27
12	1.31
13	8.52
14	0.88
15	0.22
16	0.39
17	0.45
18	2.82
19	0.03
20	0.31
21	2.60
22	1.03
23	1.00
24	0.53
25	0.76
26	0.00
27	0.00

Table S2.**Case study 2. Network pipe characteristics**

Pipe	Upstream node	Downstream node	<i>L</i> (m)	<i>D</i> (mm)
1	1	2	10.1	100
2	2	3	2874.5	125
3	3	4	1732.8	150
4	1	16	2851.4	125
5	4	5	2648	200
6	5	7	144.5	200
7	5	6	364.9	200
8	7	10	817.4	150
9	6	13	1269.8	200
10	7	8	332.7	300
11	8	11	628.3	150
12	9	10	269.7	150
13	11	9	241.3	150
14	8	18	887.8	300
15	12	14	2055.9	150
16	13	12	130.9	250
17	21	13	991.1	250
18	14	15	6.8	200
19	15	16	607.2	150
20	15	17	1669.7	125
21	17	16	1046.8	150
22	18	21	132.1	300
23	18	19	392.5	450
24	19	20	154.5	450
25	22	23	2469.3	200
26	22	19	1593.6	250
27	24	23	2567	125
28	25	24	2337.7	100
29	17	25	2452.7	150
30	27	26	19.6	450
31	26	20	9.6	450
32	20	11	490.9	150