# 卵形側溝Ⅱ 流速･流量表（8割水深）

マニング公式により流速・流量の計算を行う。

R：径深(m)　　R＝A／P

V：流速(m/s)　　$V = 1 / n \cdot R^{2/3} \cdot I^{1/2}$

Q：流量($m^3$/s)　　Q＝A・V

ここで、A：通水断面積($m^2$)

P：潤辺(m)

n：粗度係数

I：水路勾配(‰)

| 呼び名 | | 200 | | 300 | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 通水断面積 A($m^2$) | | 0.0270 | | 0.0524 | | | | | | | | | |
| 潤辺 P(m) | | 0.4670 | | 0.6257 | | | | | | | | | |
| 径深 R(m) | | 0.0578 | | 0.0837 | | | | | | | | | |
| $R^{2/3}$ | | 0.1495 | | 0.1914 | | | | | | | | | |
| 粗度係数 n | | 0.013 | | 0.013 | | | | | | | | | |
| 水路勾配 I (‰) | $I^{1/2}$ | 流速 V (m/s) | 流量 Q ($m^3$/s) | 流速 V (m/s) | 流量 Q ($m^3$/s) | 流速 V (m/s) | 流量 Q ($m^3$/s) | 流速 V (m/s) | 流量 Q ($m^3$/s) | 流速 V (m/s) | 流量 Q ($m^3$/s) | 流速 V (m/s) | 流量 Q ($m^3$/s) |
| 100.0 | 0.3162 | 3.637 | 0.098 | 4.656 | 0.244 | | | | | | | | |
| 75.0 | 0.2739 | 3.150 | 0.085 | 4.032 | 0.211 | | | | | | | | |
| 50.0 | 0.2236 | 2.572 | 0.069 | 3.292 | 0.173 | | | | | | | | |
| 40.0 | 0.2000 | 2.300 | 0.062 | 2.945 | 0.154 | | | | | | | | |
| 35.0 | 0.1871 | 2.152 | 0.058 | 2.755 | 0.144 | | | | | | | | |
| 30.0 | 0.1732 | 1.992 | 0.054 | 2.550 | 0.134 | | | | | | | | |
| 25.0 | 0.1581 | 1.819 | 0.049 | 2.328 | 0.122 | | | | | | | | |
| 20.0 | 0.1414 | 1.627 | 0.044 | 2.082 | 0.109 | | | | | | | | |
| 18.0 | 0.1342 | 1.543 | 0.042 | 1.975 | 0.104 | | | | | | | | |
| 16.0 | 0.1265 | 1.455 | 0.039 | 1.862 | 0.098 | | | | | | | | |
| 14.0 | 0.1183 | 1.361 | 0.037 | 1.742 | 0.091 | | | | | | | | |
| 12.0 | 0.1095 | 1.260 | 0.034 | 1.613 | 0.085 | | | | | | | | |
| 10.0 | 0.1000 | 1.150 | 0.031 | 1.472 | 0.077 | | | | | | | | |
| 9.5 | 0.0975 | 1.121 | 0.030 | 1.435 | 0.075 | | | | | | | | |
| 9.0 | 0.0949 | 1.091 | 0.029 | 1.397 | 0.073 | | | | | | | | |
| 8.5 | 0.0922 | 1.060 | 0.029 | 1.358 | 0.071 | | | | | | | | |
| 8.0 | 0.0894 | 1.029 | 0.028 | 1.317 | 0.069 | | | | | | | | |
| 7.5 | 0.0866 | 0.996 | 0.027 | 1.275 | 0.067 | | | | | | | | |
| 7.0 | 0.0837 | 0.962 | 0.026 | 1.232 | 0.065 | | | | | | | | |
| 6.5 | 0.0806 | 0.927 | 0.025 | 1.187 | 0.062 | | | | | | | | |
| 6.0 | 0.0775 | 0.891 | 0.024 | 1.141 | 0.060 | | | | | | | | |
| 5.5 | 0.0742 | 0.853 | 0.023 | 1.092 | 0.057 | | | | | | | | |
| 5.0 | 0.0707 | 0.813 | 0.022 | 1.041 | 0.055 | | | | | | | | |
| 4.5 | 0.0671 | 0.772 | 0.021 | 0.988 | 0.052 | | | | | | | | |
| 4.0 | 0.0632 | 0.727 | 0.020 | 0.931 | 0.049 | | | | | | | | |
| 3.5 | 0.0592 | 0.680 | 0.018 | 0.871 | 0.046 | | | | | | | | |
| 3.0 | 0.0548 | 0.630 | 0.017 | 0.806 | 0.042 | | | | | | | | |
| 2.5 | 0.0500 | 0.575 | 0.016 | 0.736 | 0.039 | | | | | | | | |
| 2.0 | 0.0447 | 0.514 | 0.014 | 0.658 | 0.035 | | | | | | | | |
| 1.5 | 0.0387 | 0.445 | 0.012 | 0.570 | 0.030 | | | | | | | | |
| 1.0 | 0.0316 | 0.364 | 0.010 | 0.466 | 0.024 | | | | | | | | |