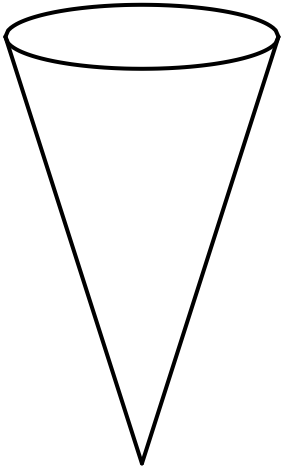
Applications of Differentiation

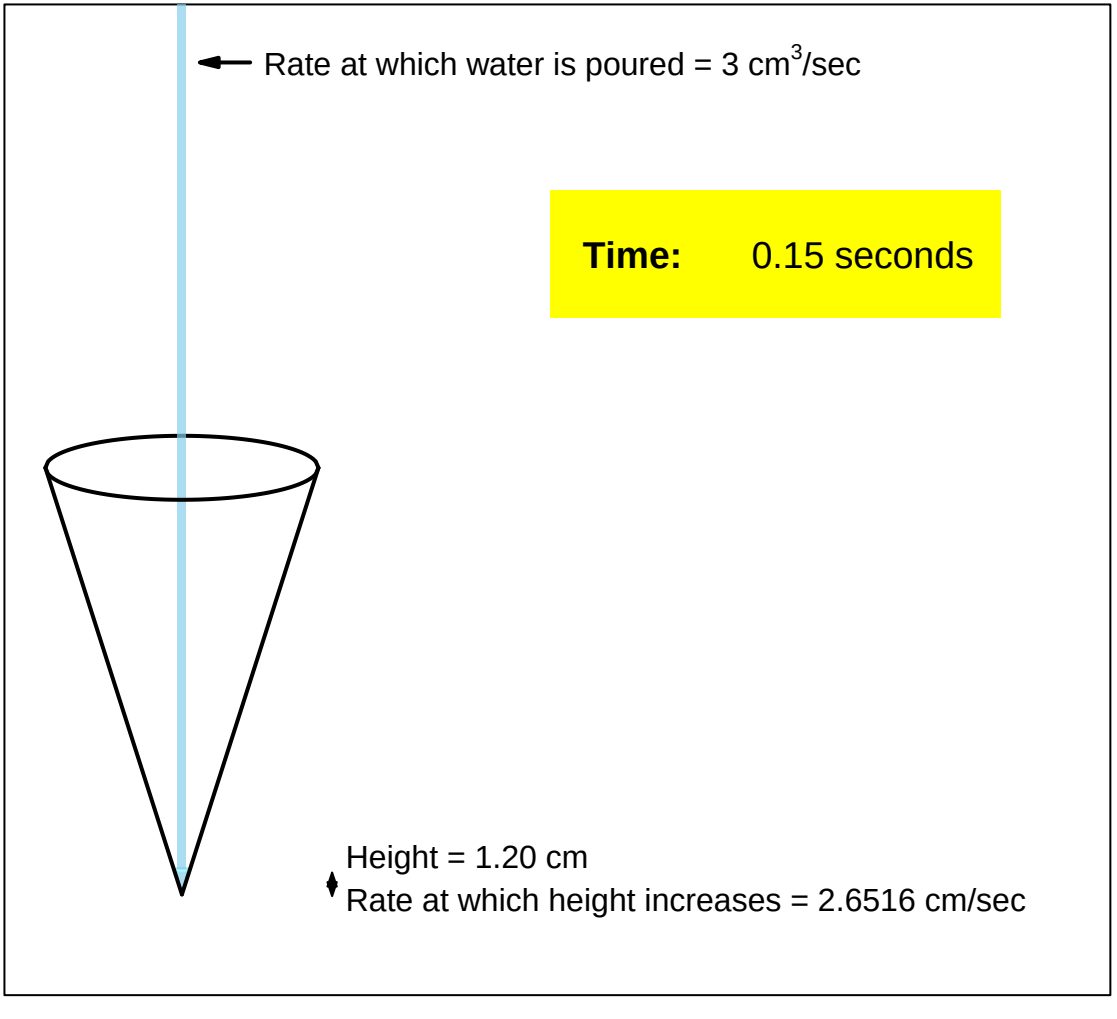
Time: 0.00 seconds



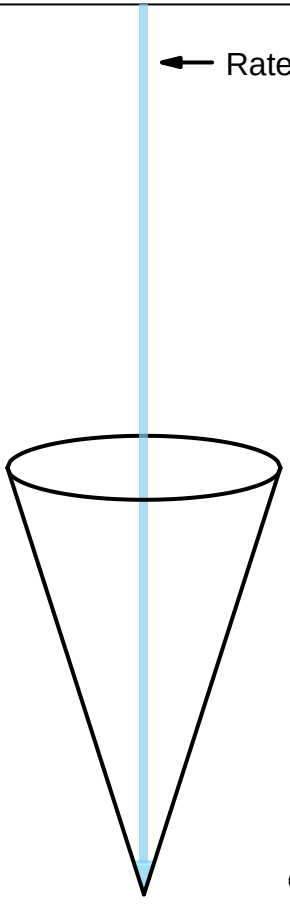
Height = 0 cm

Rate at which height rises = undefined

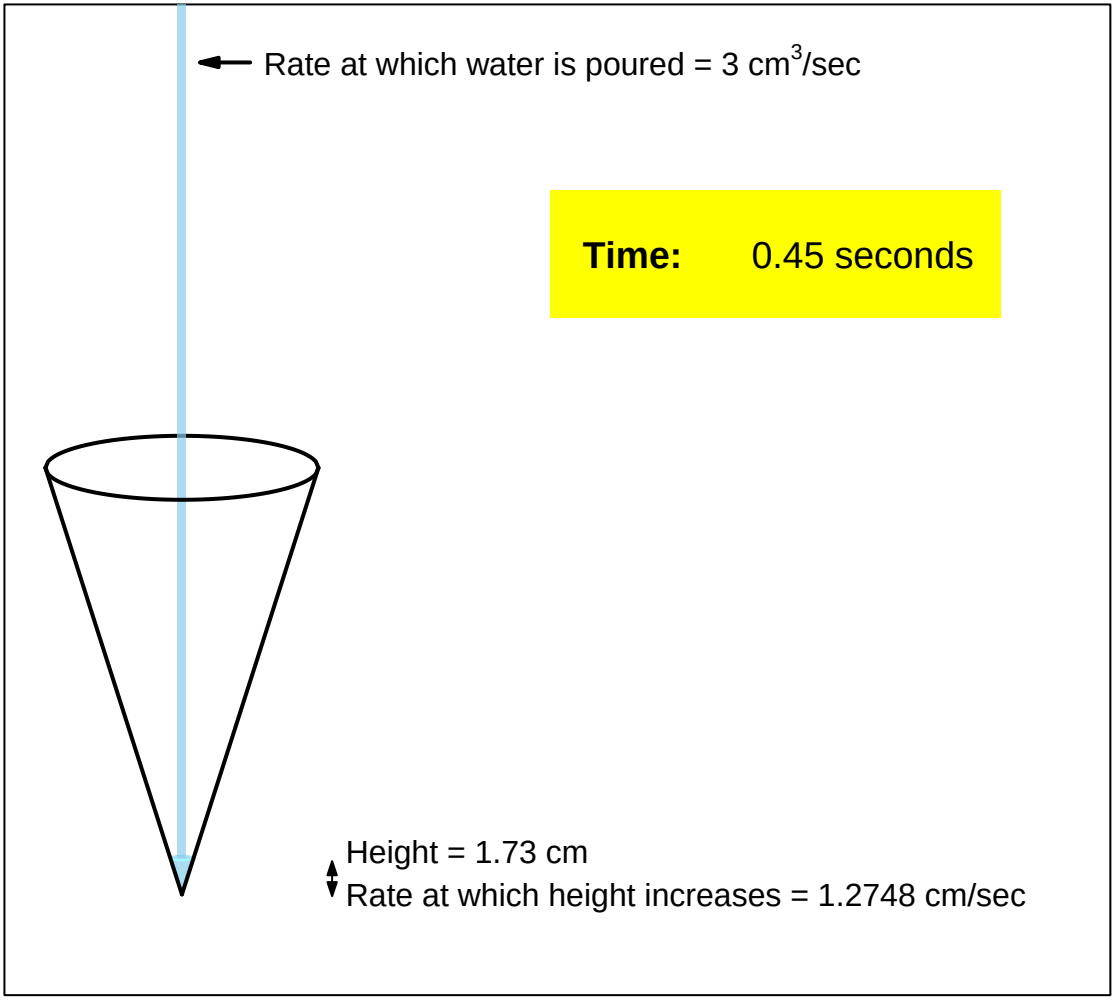
Applications of Differentiation



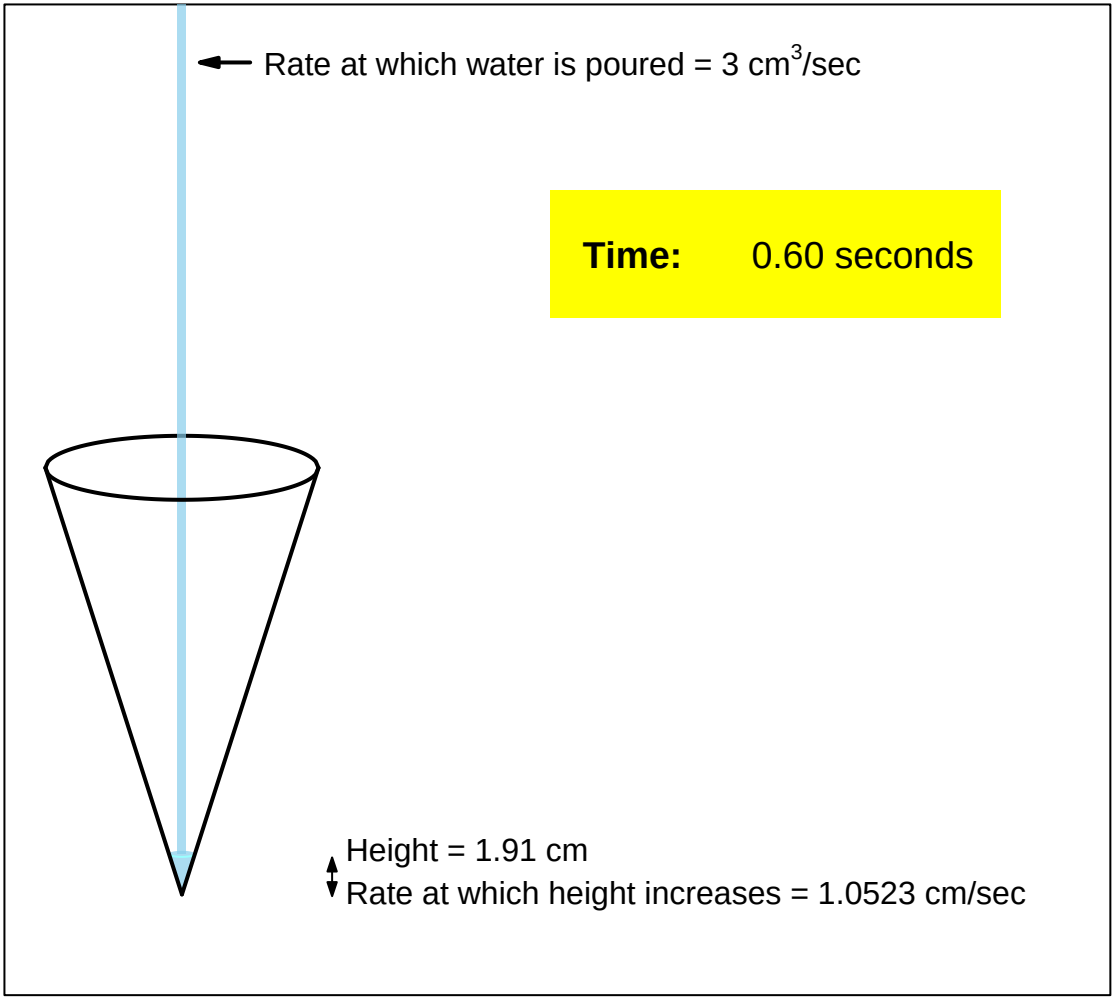
Applications of Differentiation



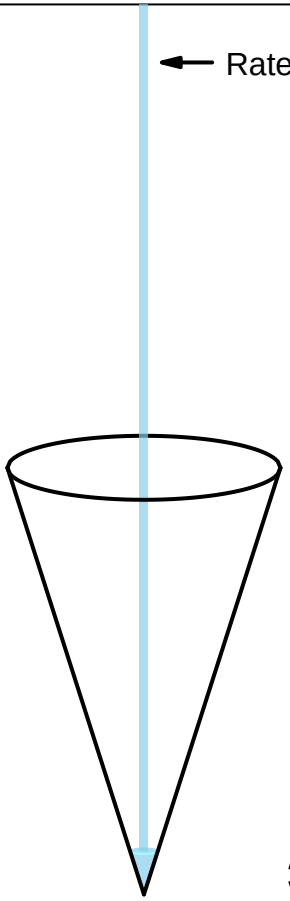
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



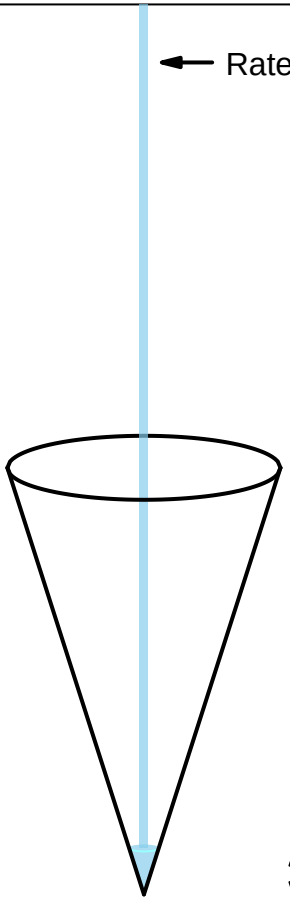
Rate at which water is poured = 3 cm^3/sec

Time: 0.75 seconds

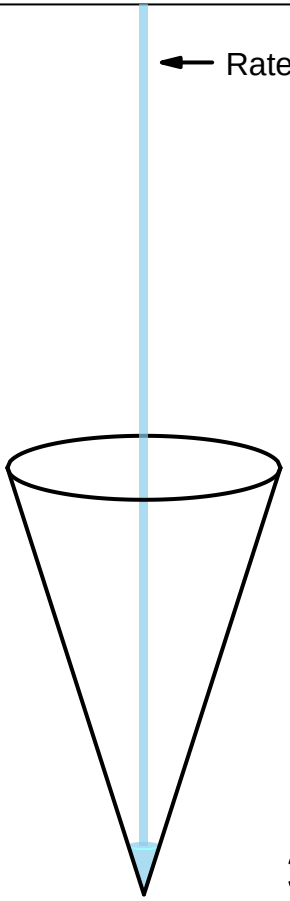
Height = 2.05 cm

Rate at which height increases = 0.9068 cm/sec

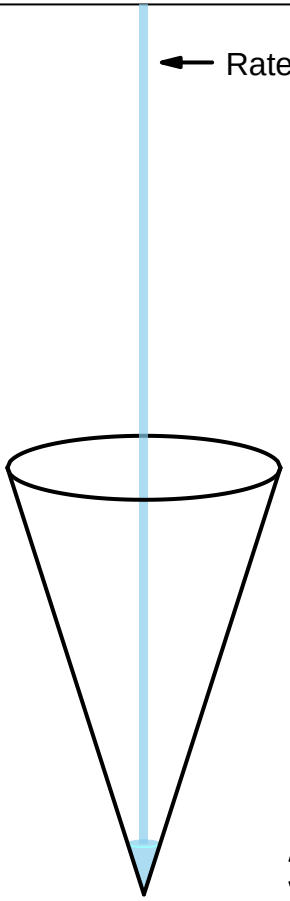
Applications of Differentiation



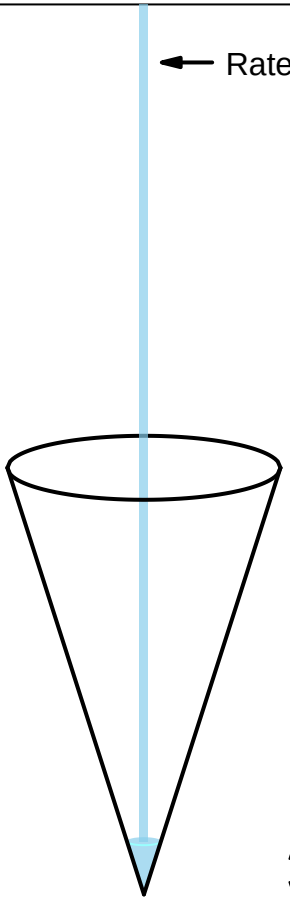
Applications of Differentiation



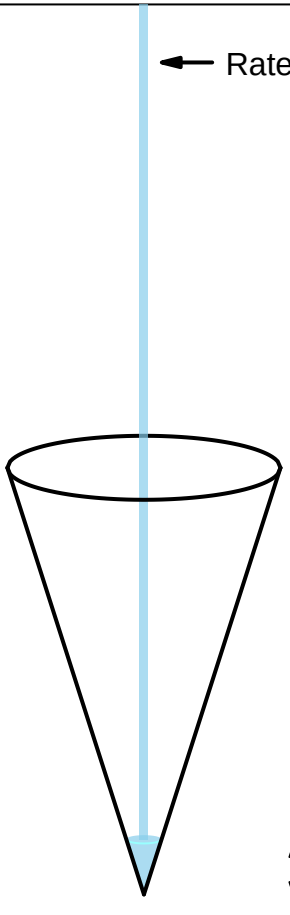
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



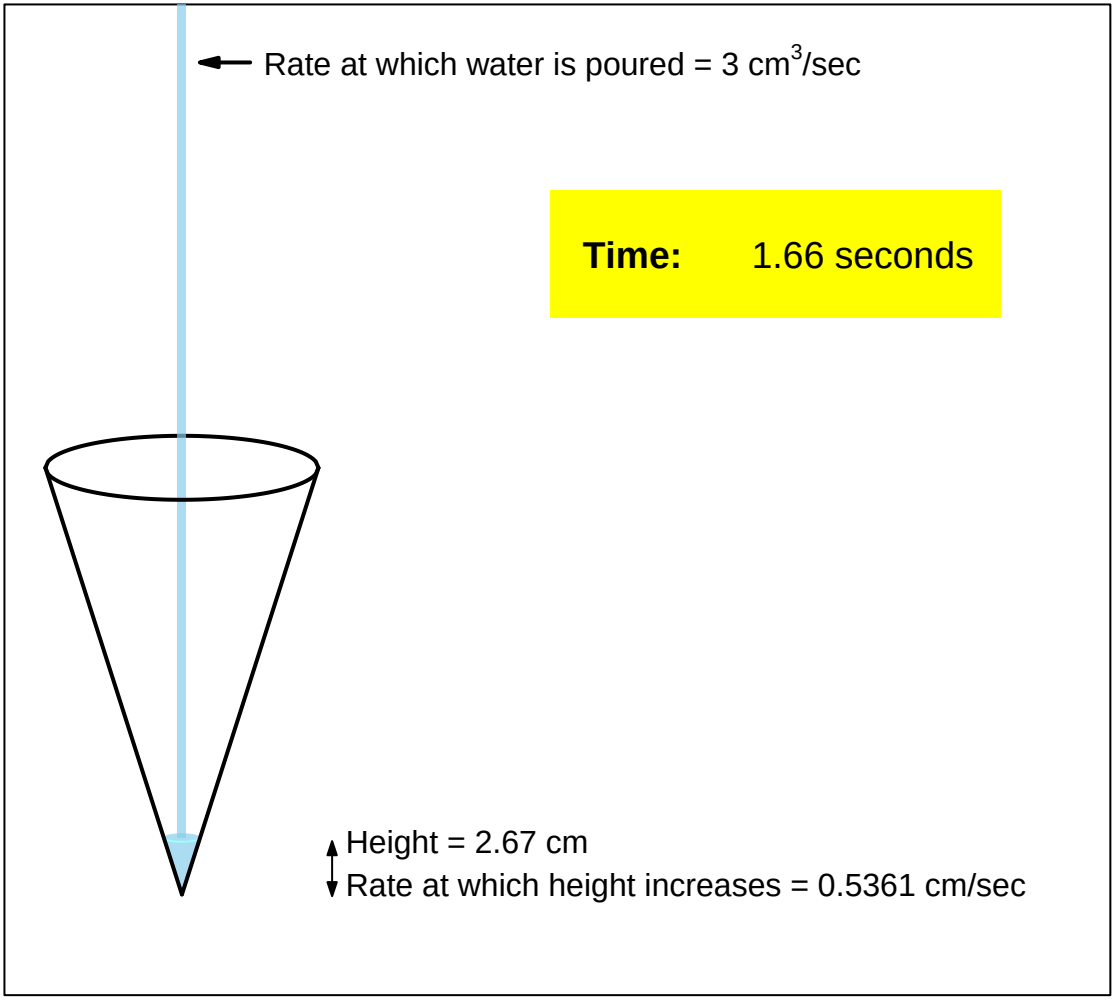
Rate at which water is poured = 3 cm^3/sec

Time: 1.51 seconds

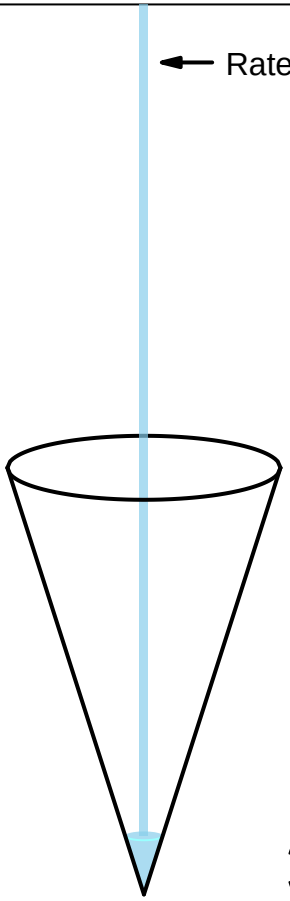
Height = 2.59 cm

Rate at which height increases = 0.5713 cm/sec

Applications of Differentiation

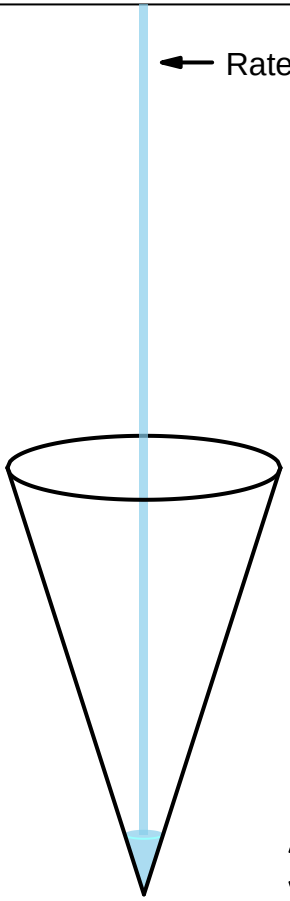


Applications of Differentiation



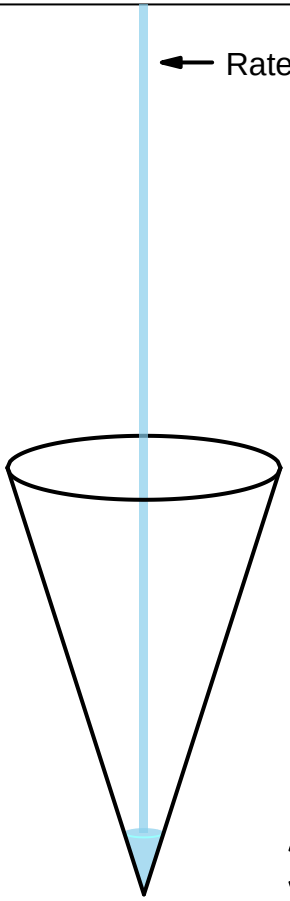
Time: 1.81 seconds

Applications of Differentiation



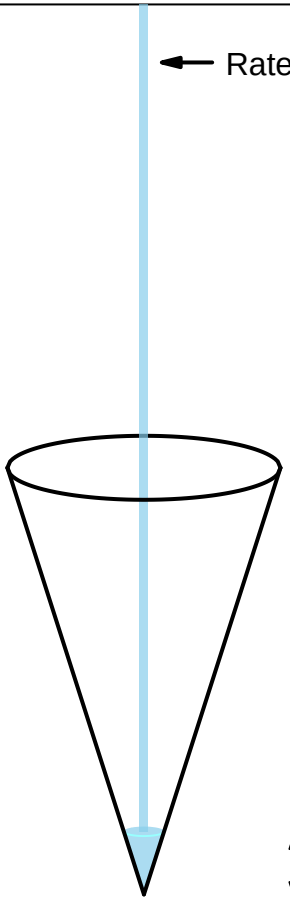
Time: 1.96 seconds

Applications of Differentiation



Time: 2.11 seconds

Applications of Differentiation



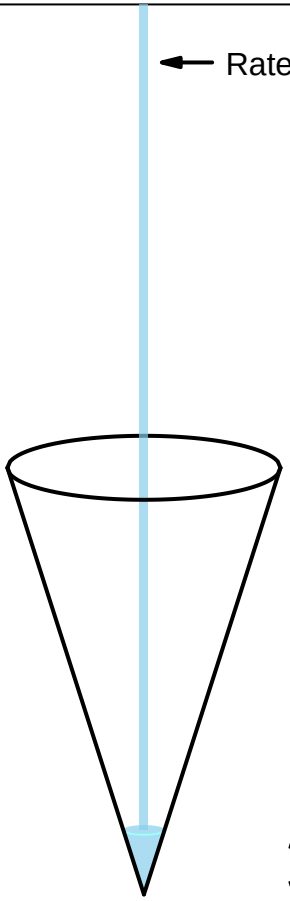
Rate at which water is poured = 3 cm^3/sec

Time: 2.26 seconds

Height = 2.96 cm

Rate at which height increases = 0.4360 cm/sec

Applications of Differentiation



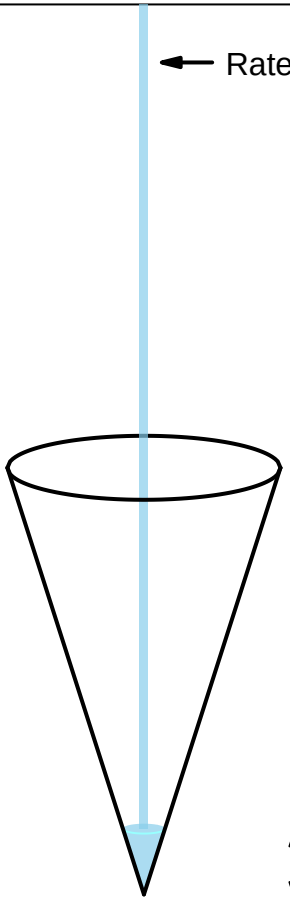
Rate at which water is poured = 3 cm^3/sec

Time: 2.41 seconds

Height = 3.02 cm

Rate at which height increases = 0.4176 cm/sec

Applications of Differentiation



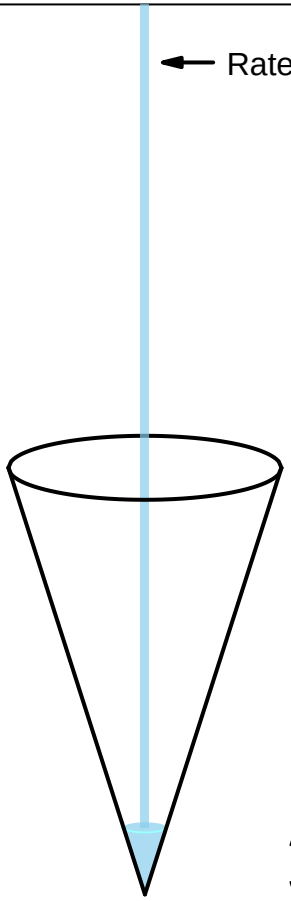
Rate at which water is poured = 3 cm^3/sec

Time: 2.56 seconds

Height = 3.09 cm

Rate at which height increases = 0.4011 cm/sec

Applications of Differentiation



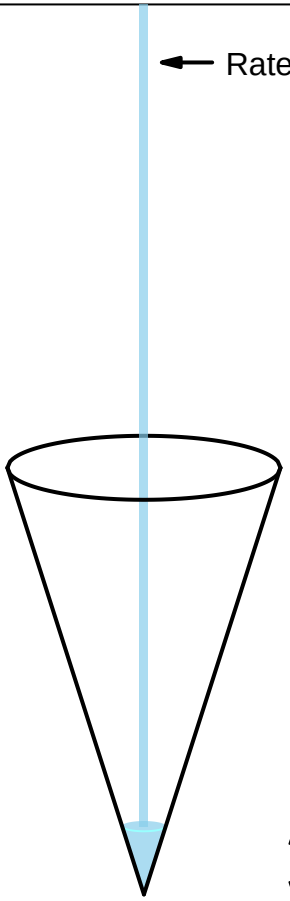
Rate at which water is poured = 3 cm^3/sec

Time: 2.72 seconds

Height = 3.15 cm

Rate at which height increases = 0.3861 cm/sec

Applications of Differentiation



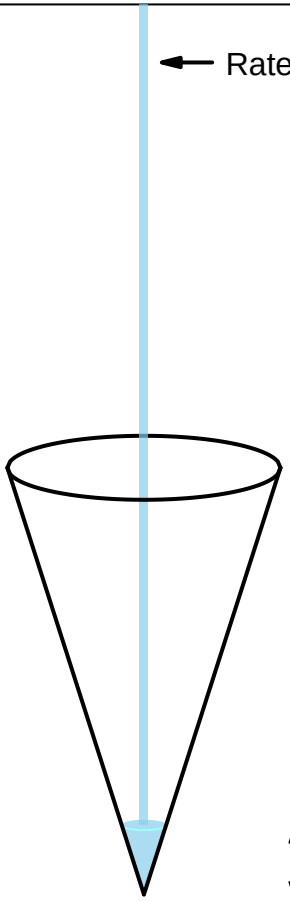
Rate at which water is poured = 3 cm^3/sec

Time: 2.87 seconds

Height = 3.20 cm

Rate at which height increases = 0.3724 cm/sec

Applications of Differentiation



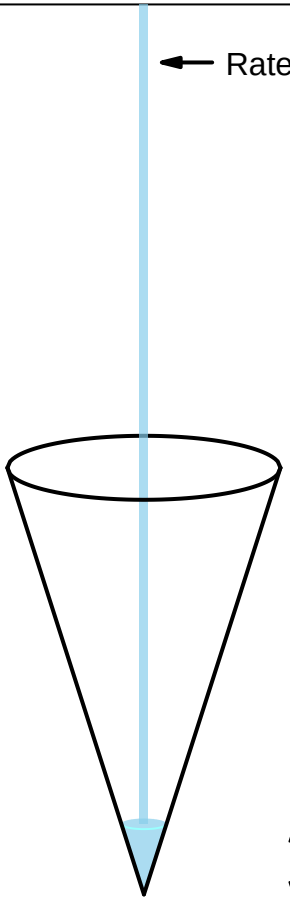
Rate at which water is poured = 3 cm^3/sec

Time: 3.02 seconds

Height = 3.26 cm

Rate at which height increases = 0.3599 cm/sec

Applications of Differentiation



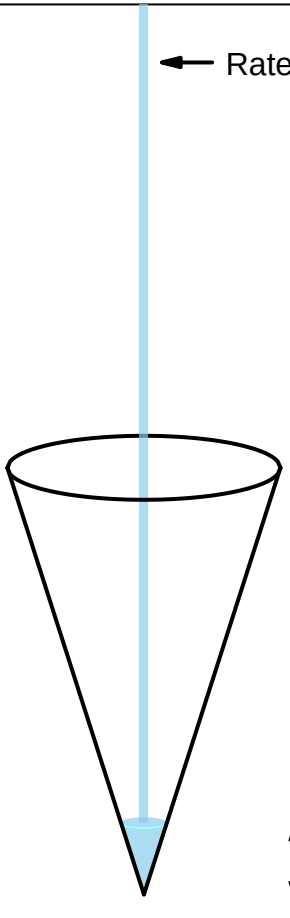
Rate at which water is poured = 3 cm^3/sec

Time: 3.17 seconds

Height = 3.31 cm

Rate at which height increases = 0.3484 cm/sec

Applications of Differentiation



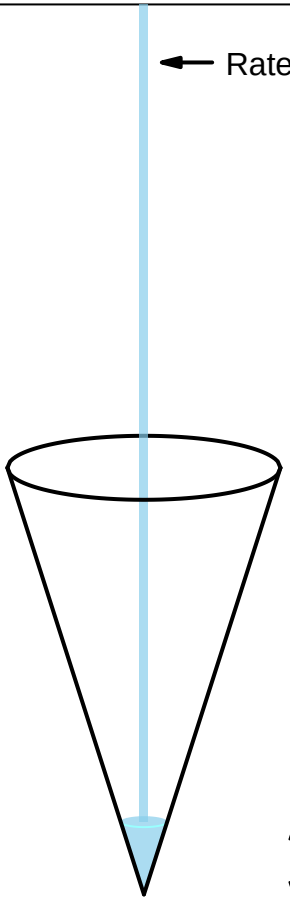
Rate at which water is poured = 3 cm^3/sec

Time: 3.32 seconds

Height = 3.36 cm

Rate at which height increases = 0.3377 cm/sec

Applications of Differentiation



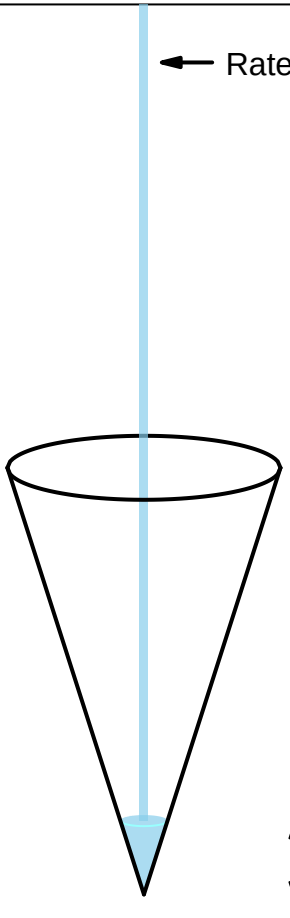
Rate at which water is poured = 3 cm^3/sec

Time: 3.47 seconds

Height = 3.41 cm

Rate at which height increases = 0.3279 cm/sec

Applications of Differentiation



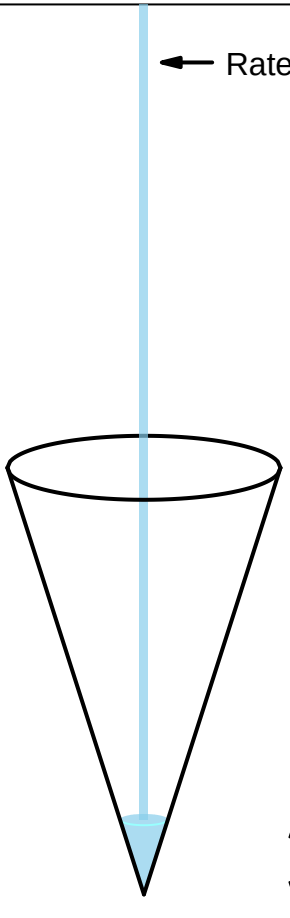
Rate at which water is poured = 3 cm^3/sec

Time: 3.62 seconds

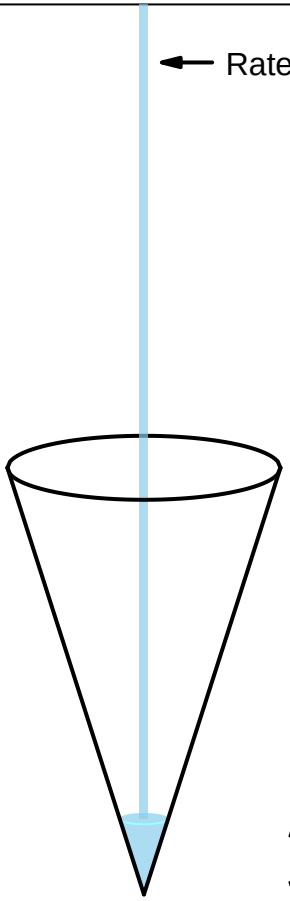
Height = 3.46 cm

Rate at which height increases = 0.3187 cm/sec

Applications of Differentiation



Applications of Differentiation



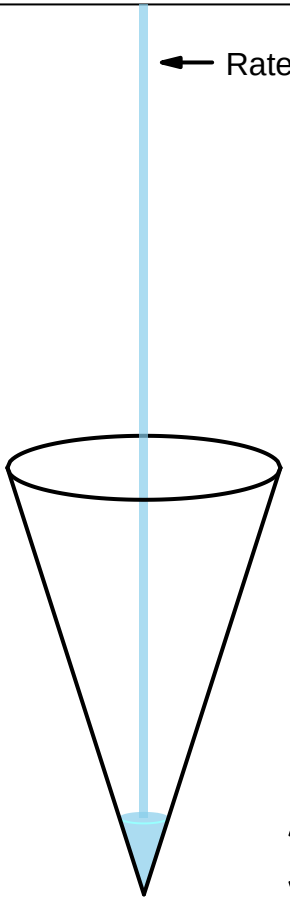
Rate at which water is poured = 3 cm^3/sec

Time: 3.92 seconds

Height = 3.56 cm

Rate at which height increases = 0.3021 cm/sec

Applications of Differentiation



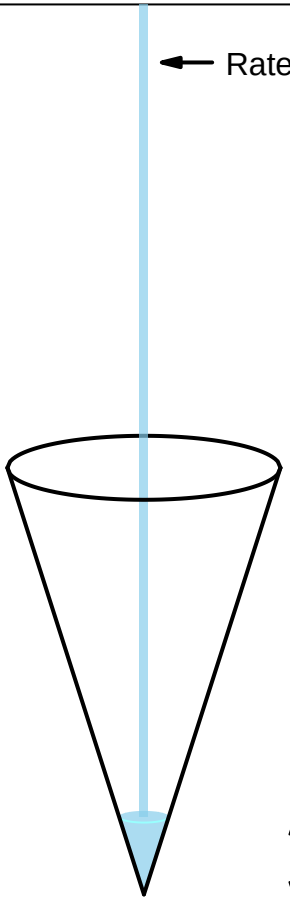
Rate at which water is poured = 3 cm^3/sec

Time: 4.07 seconds

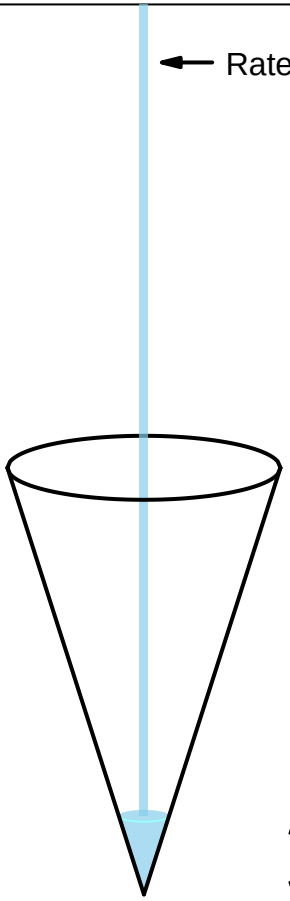
Height = 3.60 cm

Rate at which height increases = 0.2946 cm/sec

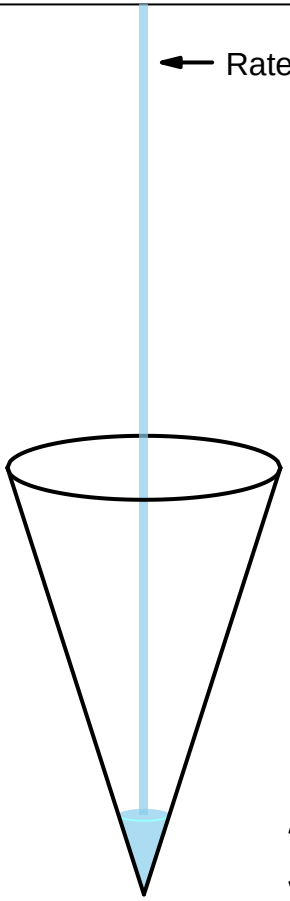
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



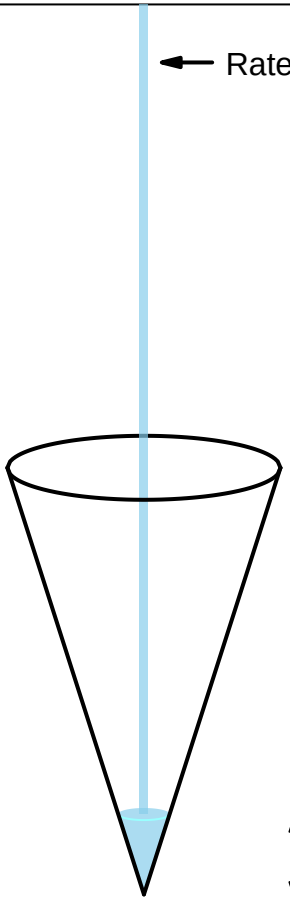
Rate at which water is poured = 3 cm^3/sec

Time: 4.53 seconds

Height = 3.73 cm

Rate at which height increases = 0.2746 cm/sec

Applications of Differentiation



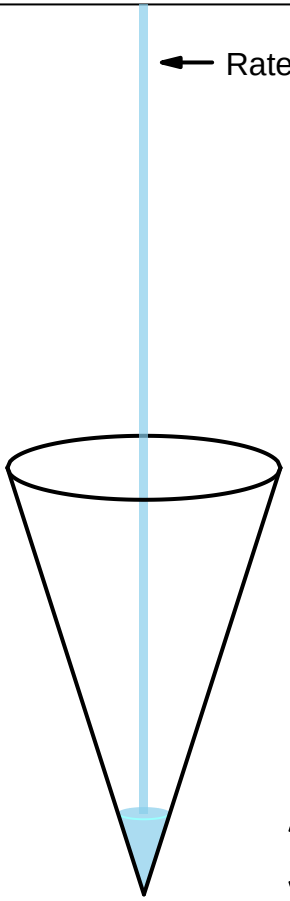
Rate at which water is poured = 3 cm^3/sec

Time: 4.68 seconds

Height = 3.77 cm

Rate at which height increases = 0.2687 cm/sec

Applications of Differentiation



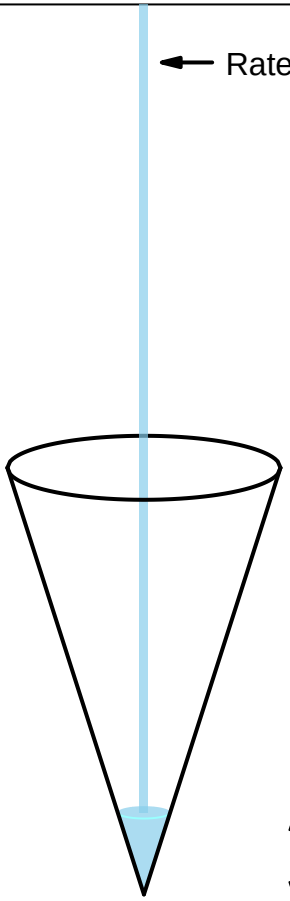
Rate at which water is poured = 3 cm^3/sec

Time: 4.83 seconds

Height = 3.81 cm

Rate at which height increases = 0.2631 cm/sec

Applications of Differentiation



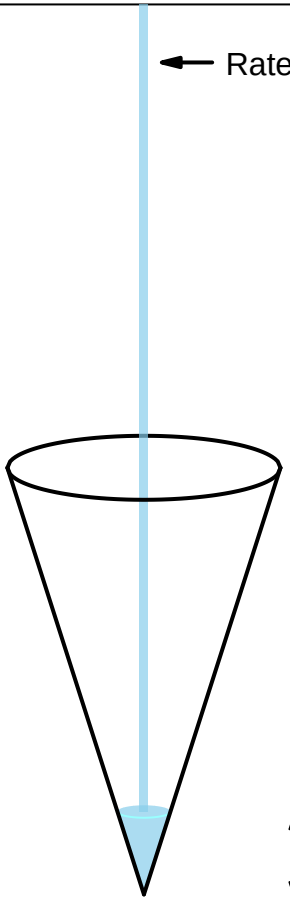
Rate at which water is poured = 3 cm^3/sec

Time: 4.98 seconds

Height = 3.85 cm

Rate at which height increases = 0.2577 cm/sec

Applications of Differentiation



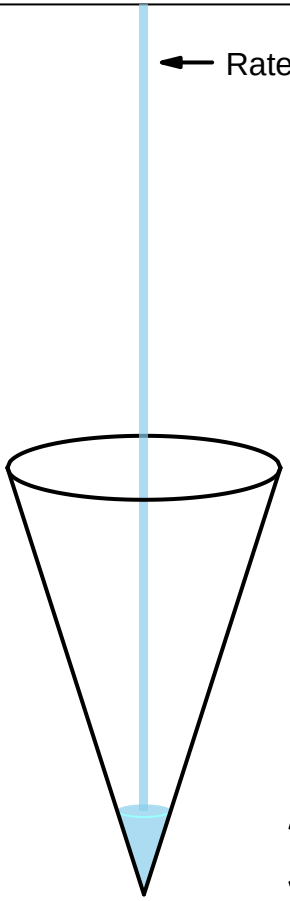
Rate at which water is poured = 3 cm^3/sec

Time: 5.13 seconds

Height = 3.89 cm

Rate at which height increases = 0.2527 cm/sec

Applications of Differentiation



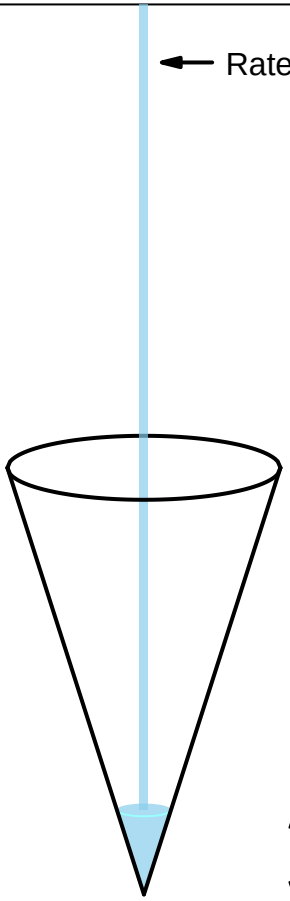
Rate at which water is poured = 3 cm^3/sec

Time: 5.28 seconds

Height = 3.93 cm

Rate at which height increases = 0.2478 cm/sec

Applications of Differentiation



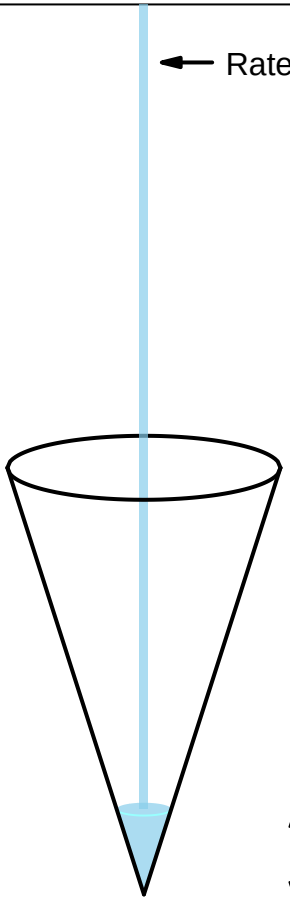
Rate at which water is poured = 3 cm^3/sec

Time: 5.43 seconds

Height = 3.96 cm

Rate at which height increases = 0.2432 cm/sec

Applications of Differentiation



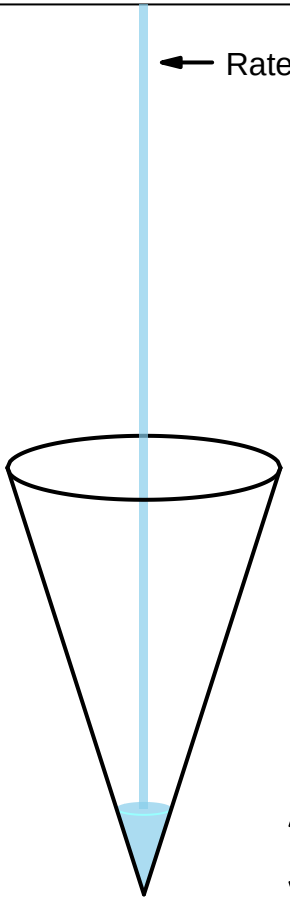
Rate at which water is poured = 3 cm^3/sec

Time: 5.58 seconds

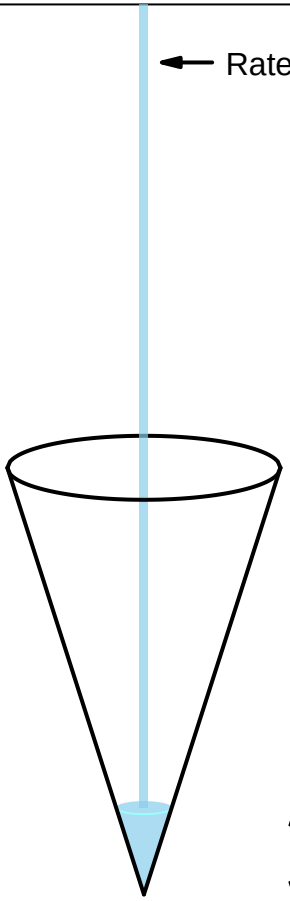
Height = 4.00 cm

Rate at which height increases = 0.2388 cm/sec

Applications of Differentiation

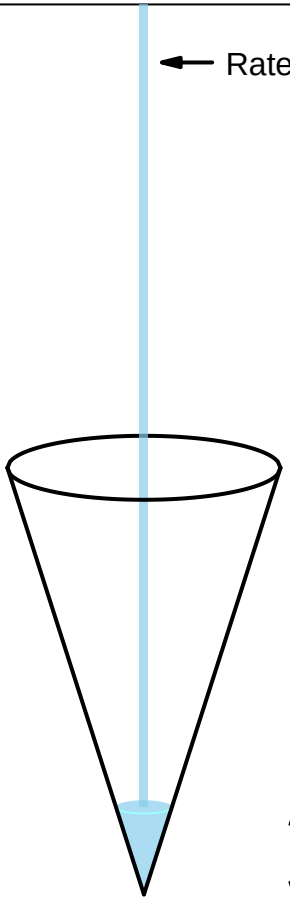


Applications of Differentiation



Time: 5.88 seconds

Applications of Differentiation



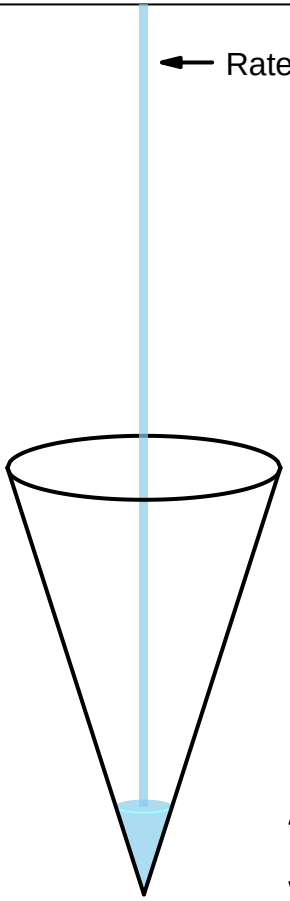
Rate at which water is poured = 3 cm^3/sec

Time: 6.04 seconds

Height = 4.10 cm

Rate at which height increases = 0.2267 cm/sec

Applications of Differentiation



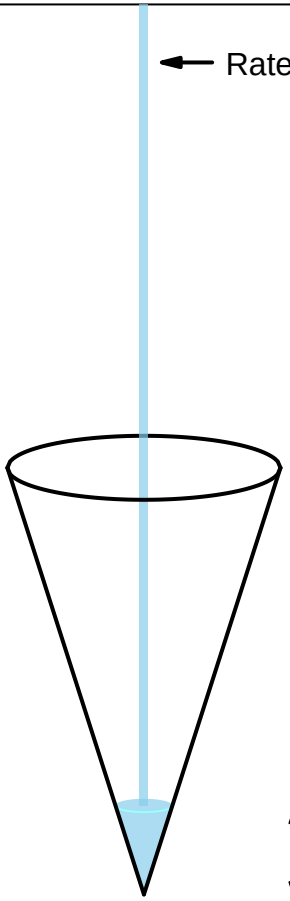
Rate at which water is poured = 3 cm^3/sec

Time: 6.19 seconds

Height = 4.14 cm

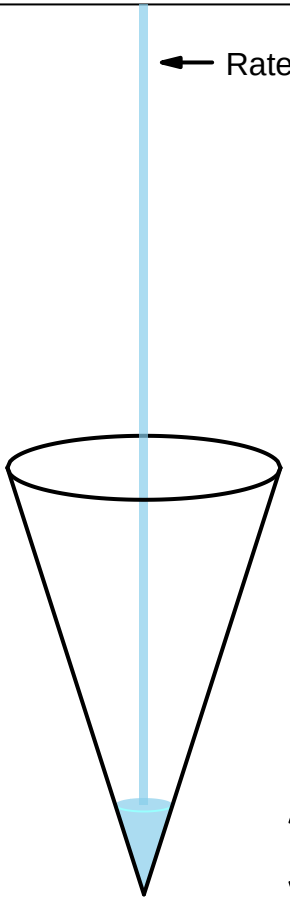
Rate at which height increases = 0.2230 cm/sec

Applications of Differentiation



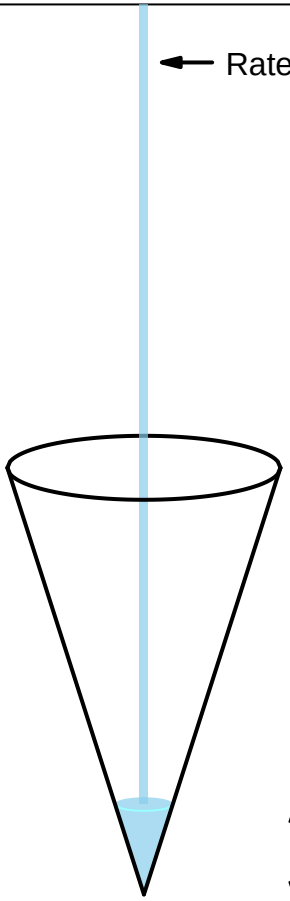
Time: 6.34 seconds

Applications of Differentiation



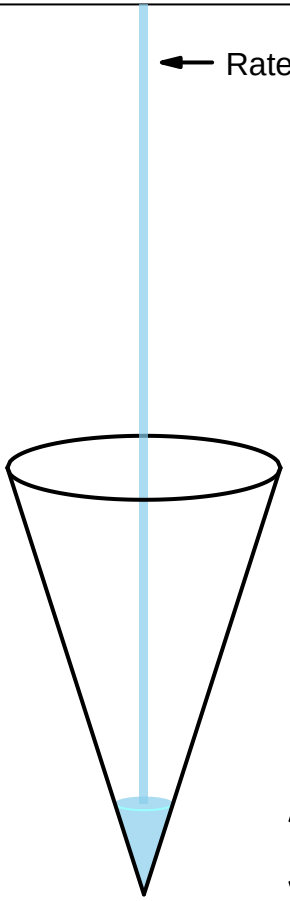
Time: 6.49 seconds

Applications of Differentiation



Time: 6.64 seconds

Applications of Differentiation



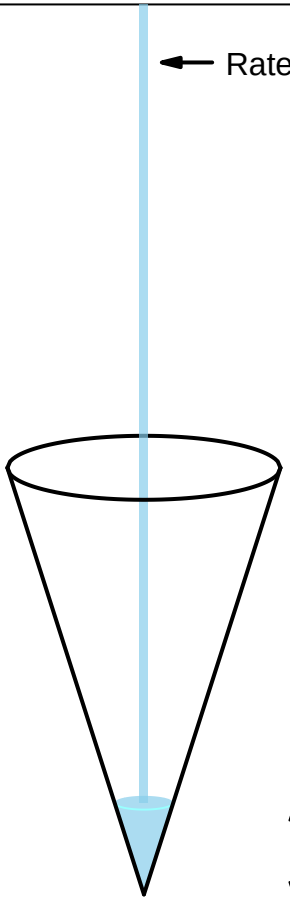
Rate at which water is poured = 3 cm^3/sec

Time: 6.79 seconds

Height = 4.27 cm

Rate at which height increases = 0.2096 cm/sec

Applications of Differentiation



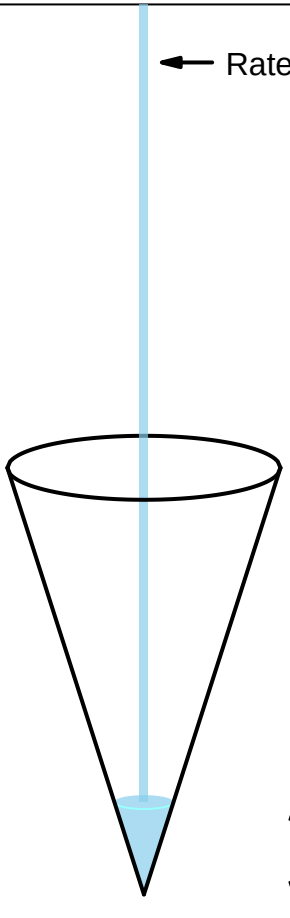
Rate at which water is poured = 3 cm^3/sec

Time: 6.94 seconds

Height = 4.30 cm

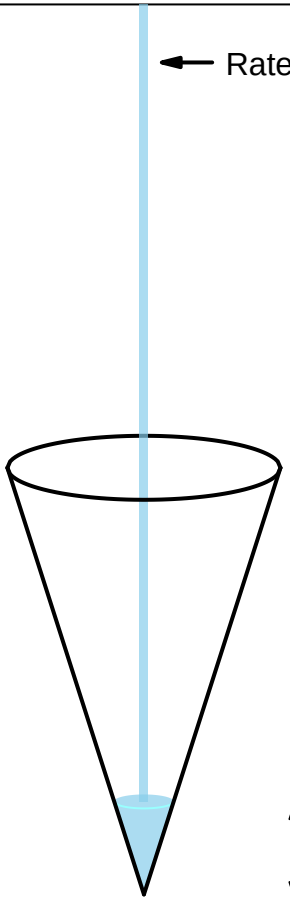
Rate at which height increases = 0.2065 cm/sec

Applications of Differentiation



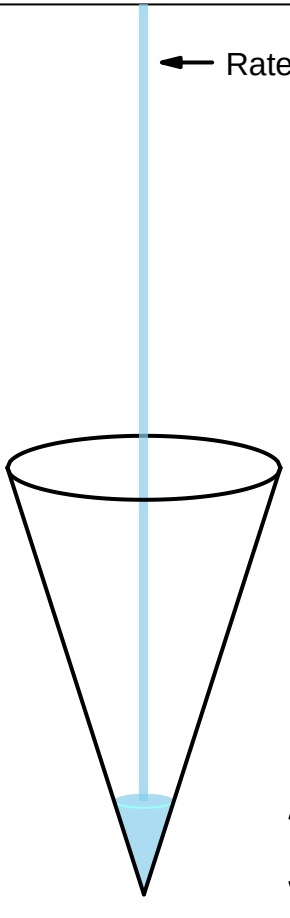
Time: 7.09 seconds

Applications of Differentiation



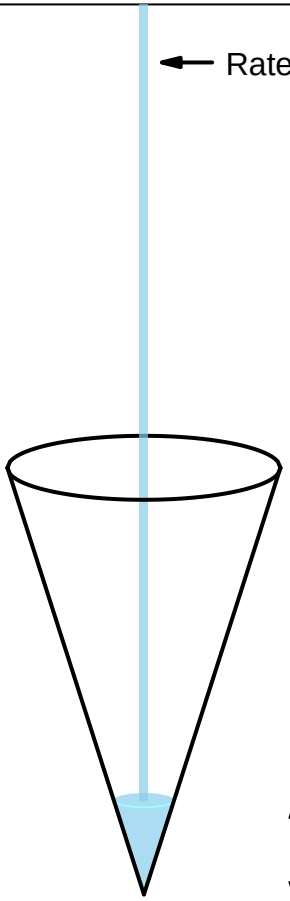
Time: 7.24 seconds

Applications of Differentiation



Time: 7.39 seconds

Applications of Differentiation



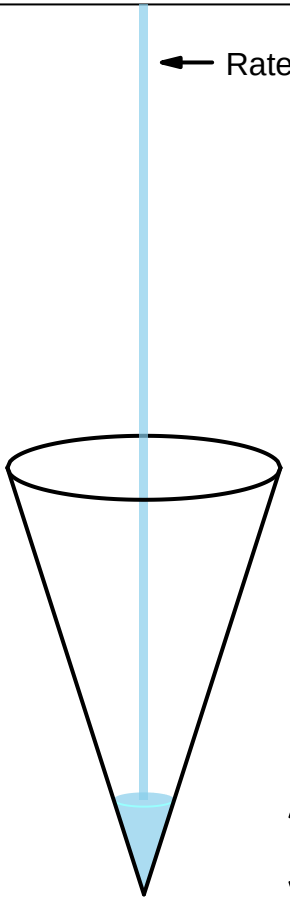
Rate at which water is poured = 3 cm^3/sec

Time: 7.54 seconds

Height = 4.42 cm

Rate at which height increases = 0.1954 cm/sec

Applications of Differentiation



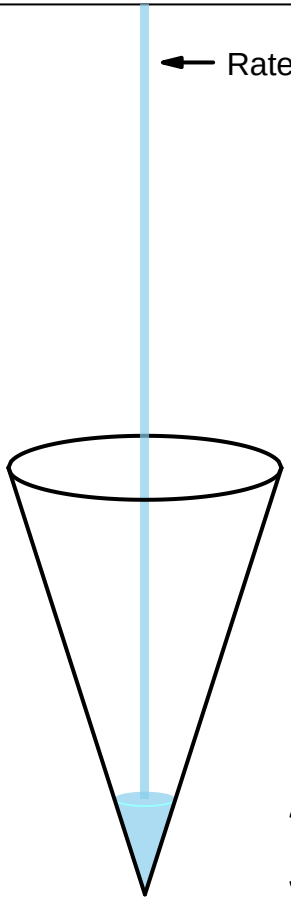
Rate at which water is poured = 3 cm^3/sec

Time: 7.69 seconds

Height = 4.45 cm

Rate at which height increases = 0.1928 cm/sec

Applications of Differentiation



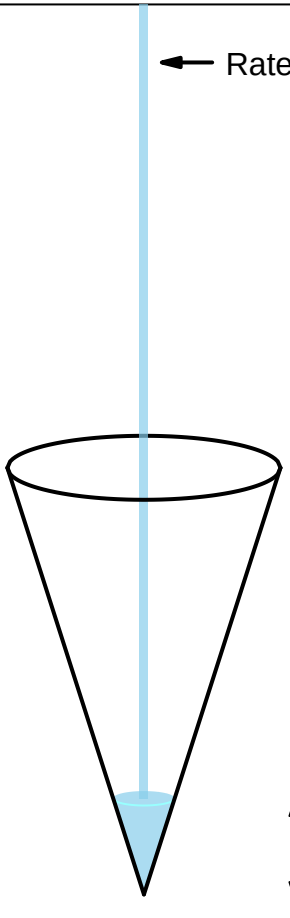
Rate at which water is poured = 3 cm^3/sec

Time: 7.85 seconds

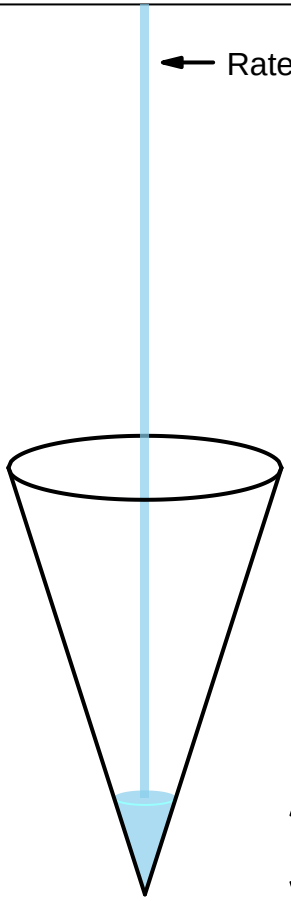
Height = 4.48 cm

Rate at which height increases = 0.1903 cm/sec

Applications of Differentiation



Applications of Differentiation



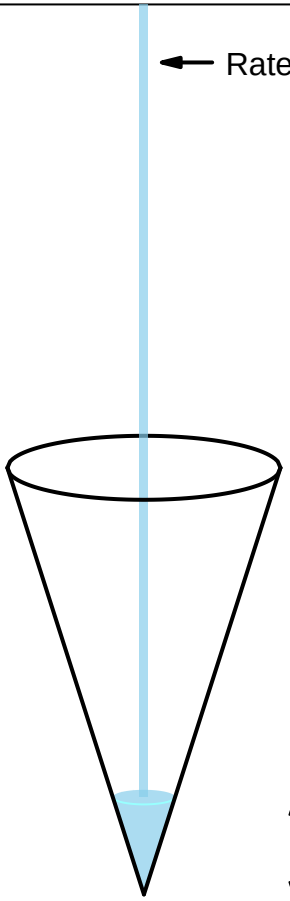
Rate at which water is poured = 3 cm^3/sec

Time: 8.15 seconds

Height = 4.54 cm

Rate at which height increases = 0.1856 cm/sec

Applications of Differentiation



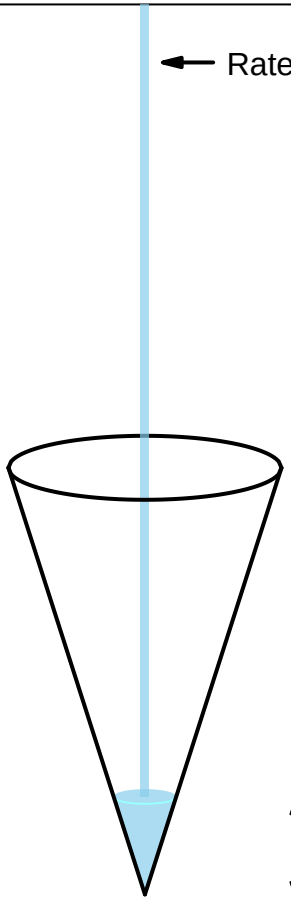
Rate at which water is poured = 3 cm^3/sec

Time: 8.30 seconds

Height = 4.56 cm

Rate at which height increases = 0.1833 cm/sec

Applications of Differentiation



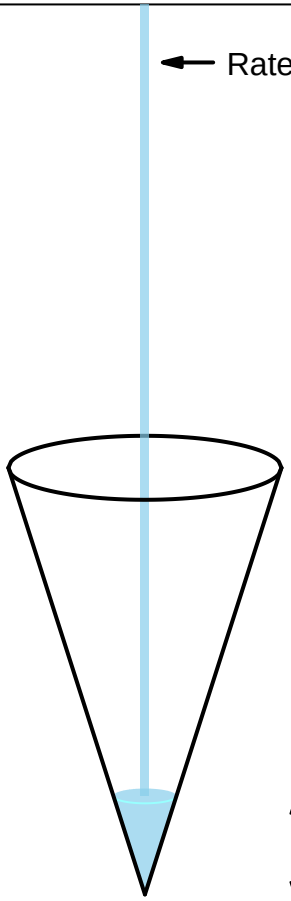
Rate at which water is poured = 3 cm^3/sec

Time: 8.45 seconds

Height = 4.59 cm

Rate at which height increases = 0.1812 cm/sec

Applications of Differentiation



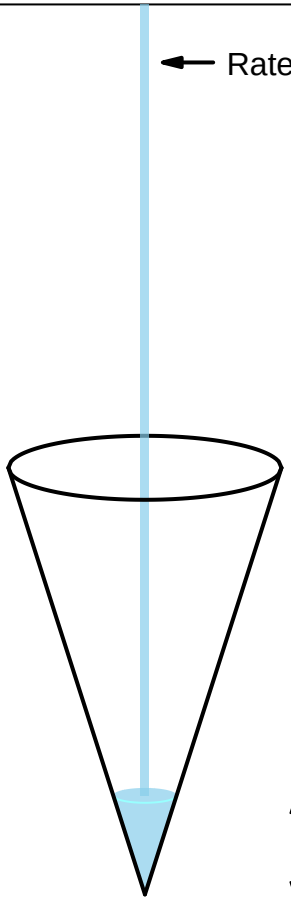
Rate at which water is poured = 3 cm^3/sec

Time: 8.60 seconds

Height = 4.62 cm

Rate at which height increases = 0.1790 cm/sec

Applications of Differentiation



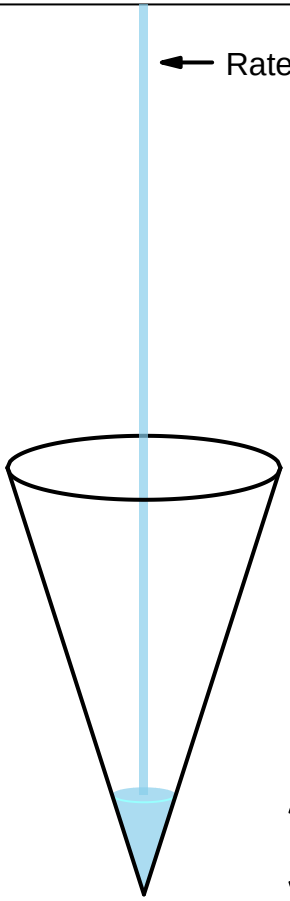
Rate at which water is poured = 3 cm^3/sec

Time: 8.75 seconds

Height = 4.65 cm

Rate at which height increases = 0.1770 cm/sec

Applications of Differentiation



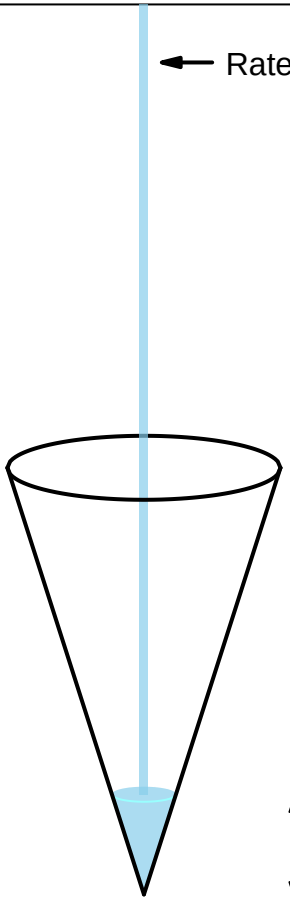
Rate at which water is poured = 3 cm^3/sec

Time: 8.90 seconds

Height = 4.67 cm

Rate at which height increases = 0.1750 cm/sec

Applications of Differentiation



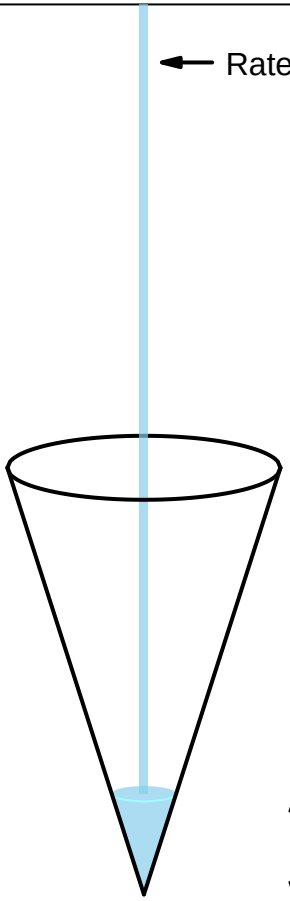
Rate at which water is poured = 3 cm^3/sec

Time: 9.05 seconds

Height = 4.70 cm

Rate at which height increases = 0.1730 cm/sec

Applications of Differentiation



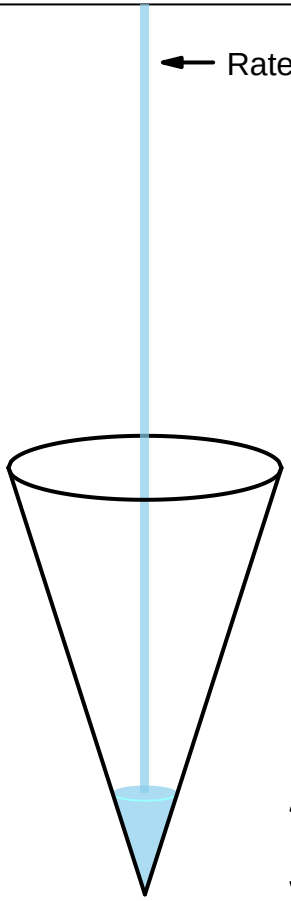
Rate at which water is poured = 3 cm^3/sec

Time: 9.20 seconds

Height = 4.72 cm

Rate at which height increases = 0.1711 cm/sec

Applications of Differentiation



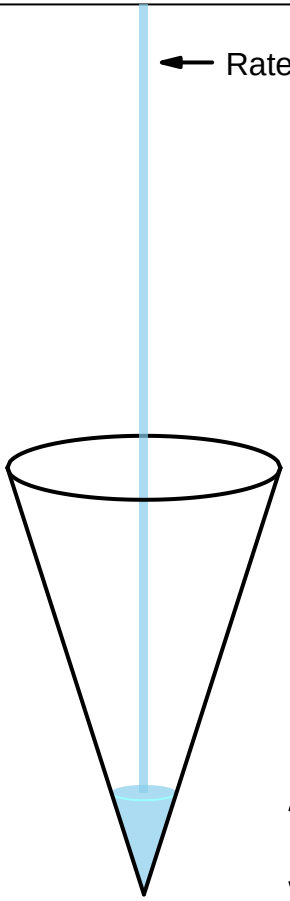
Rate at which water is poured = 3 cm^3/sec

Time: 9.35 seconds

Height = 4.75 cm

Rate at which height increases = 0.1693 cm/sec

Applications of Differentiation



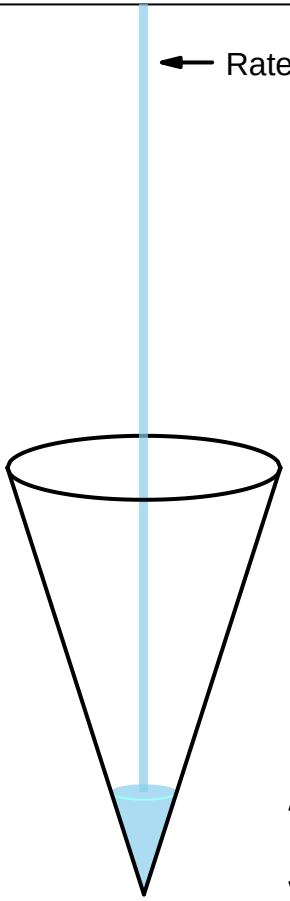
Rate at which water is poured = 3 cm^3/sec

Time: 9.51 seconds

Height = 4.78 cm

Rate at which height increases = 0.1675 cm/sec

Applications of Differentiation



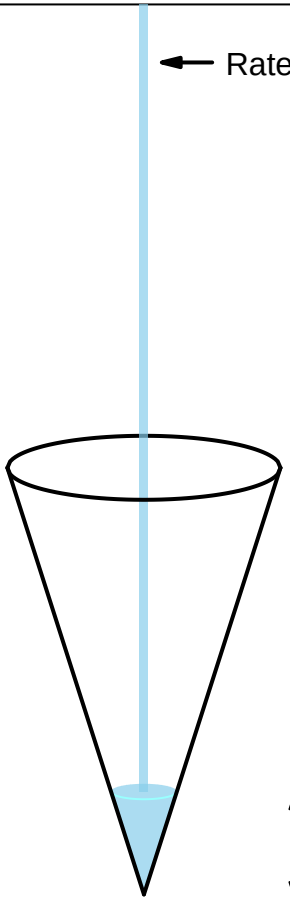
Rate at which water is poured = 3 cm^3/sec

Time: 9.66 seconds

Height = 4.80 cm

Rate at which height increases = 0.1657 cm/sec

Applications of Differentiation



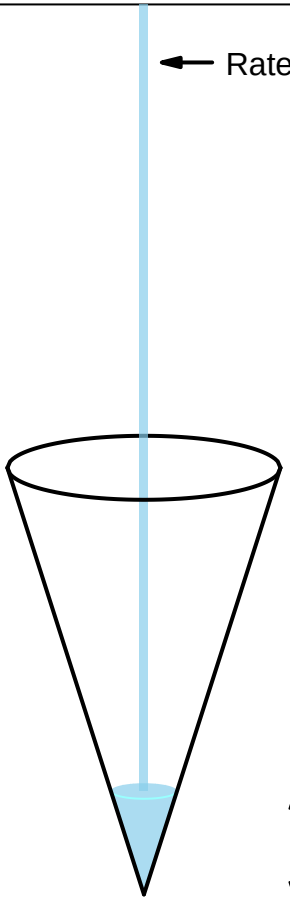
Rate at which water is poured = 3 cm^3/sec

Time: 9.81 seconds

Height = 4.83 cm

Rate at which height increases = 0.1640 cm/sec

Applications of Differentiation



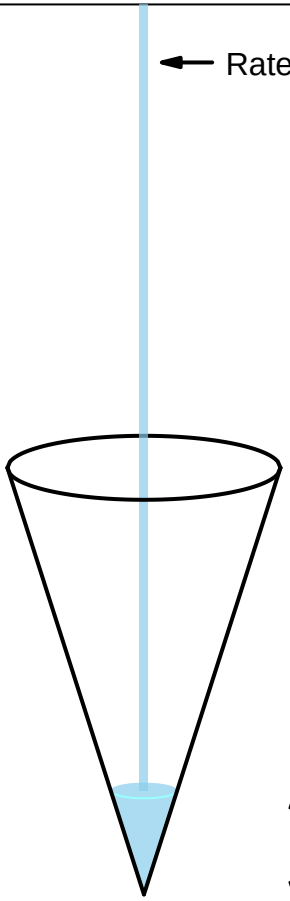
Rate at which water is poured = 3 cm^3/sec

Time: 9.96 seconds

Height = 4.85 cm

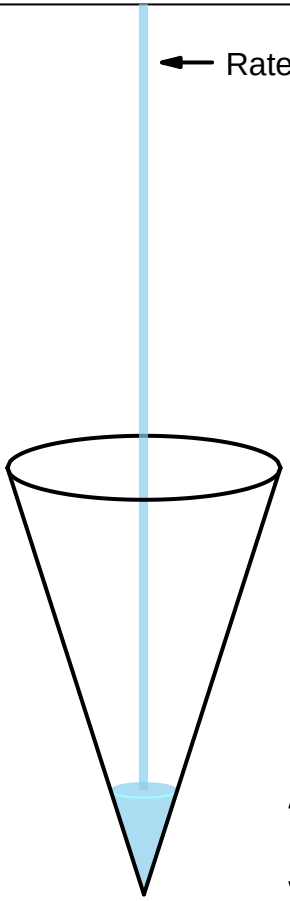
Rate at which height increases = 0.1624 cm/sec

Applications of Differentiation



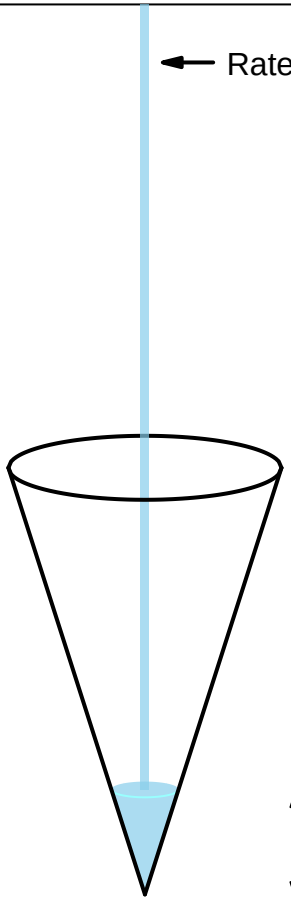
Time: 10.11 seconds

Applications of Differentiation



Time: 10.26 seconds

Applications of Differentiation



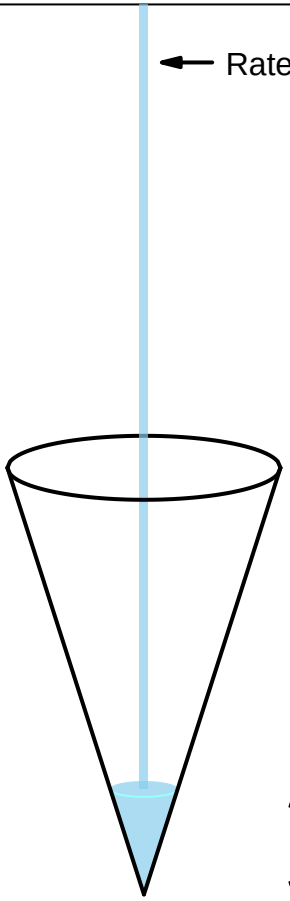
Rate at which water is poured = 3 cm^3/sec

Time: 10.41 seconds

Height = 4.92 cm

Rate at which height increases = 0.1576 cm/sec

Applications of Differentiation



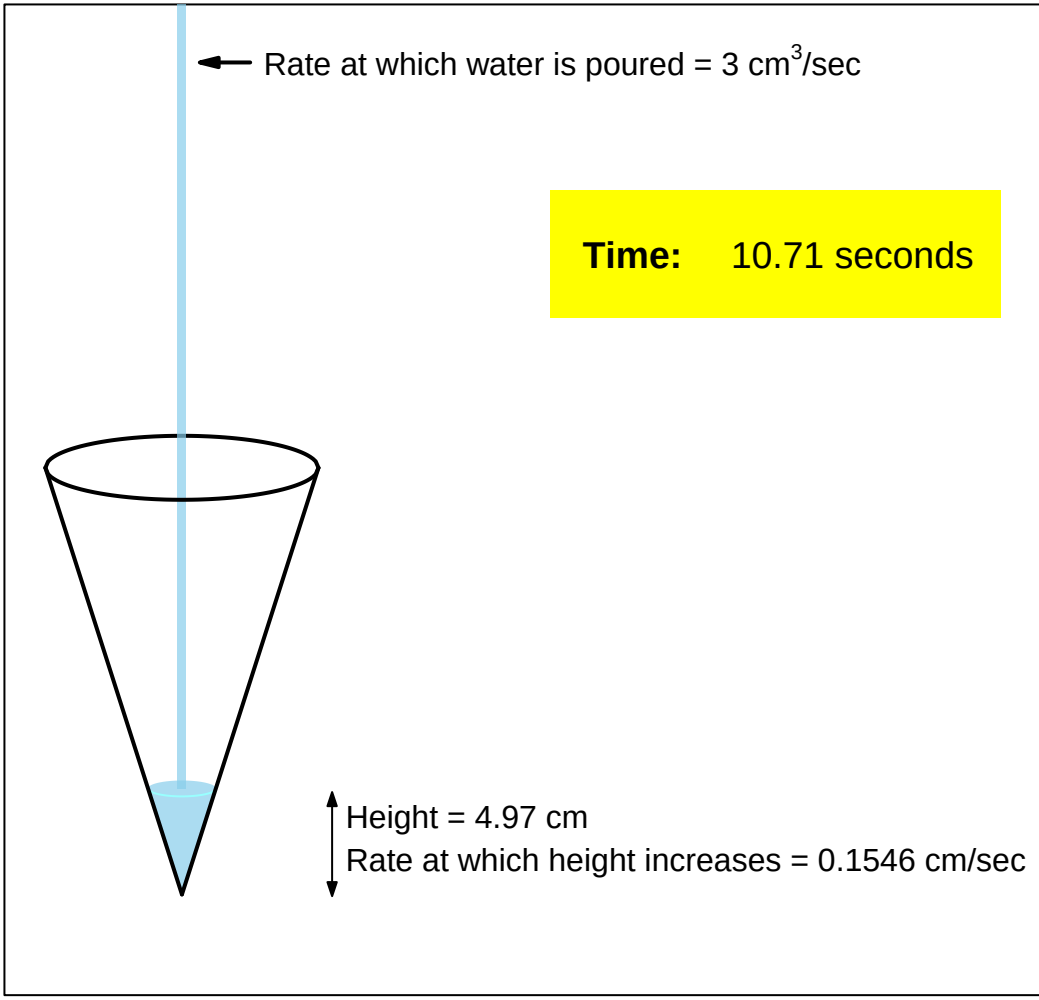
Rate at which water is poured = 3 cm^3/sec

Time: 10.56 seconds

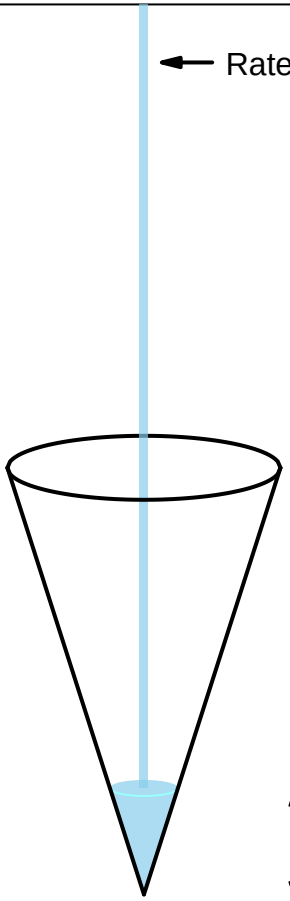
Height = 4.95 cm

Rate at which height increases = 0.1561 cm/sec

Applications of Differentiation

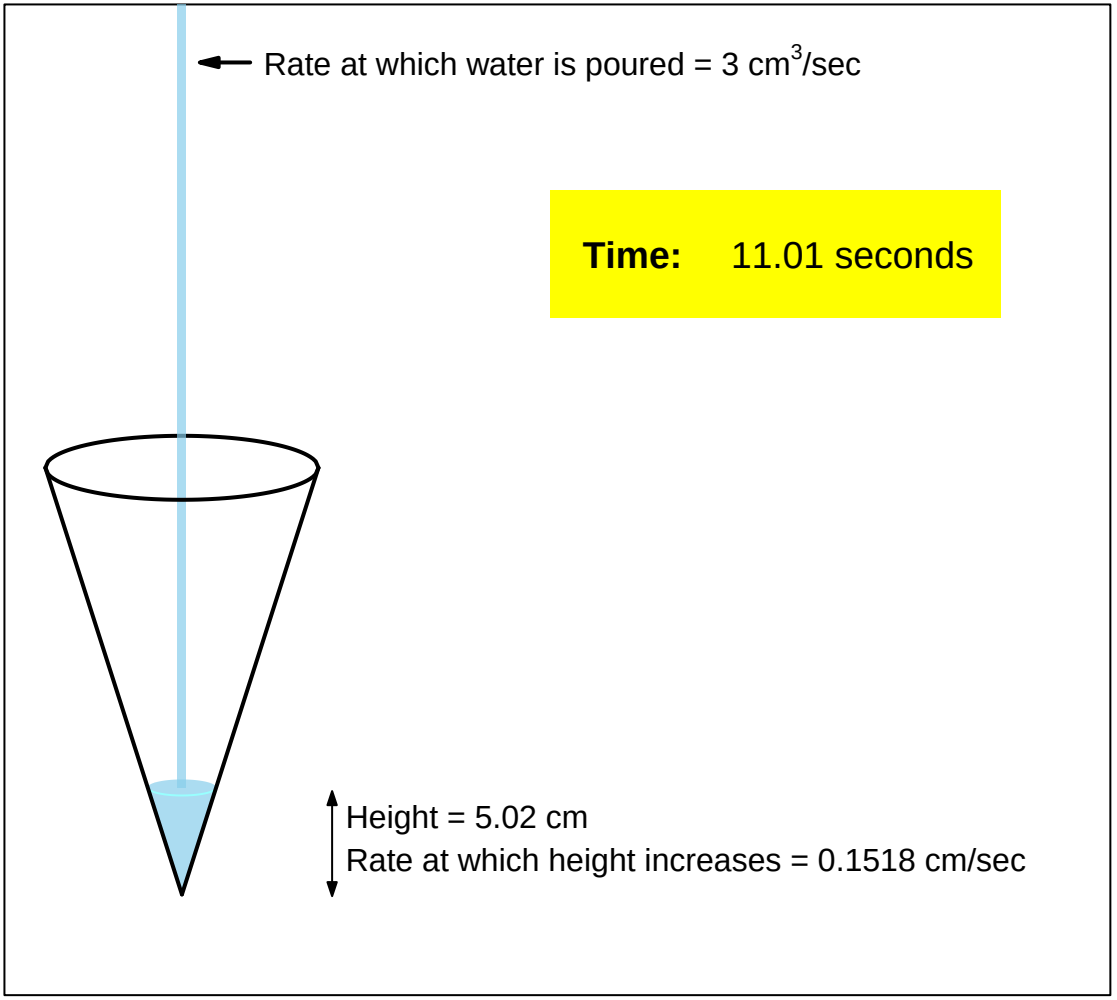


Applications of Differentiation

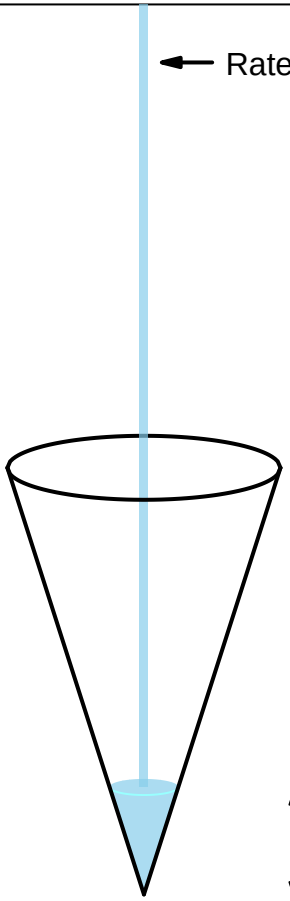


Time: 10.86 seconds

Applications of Differentiation

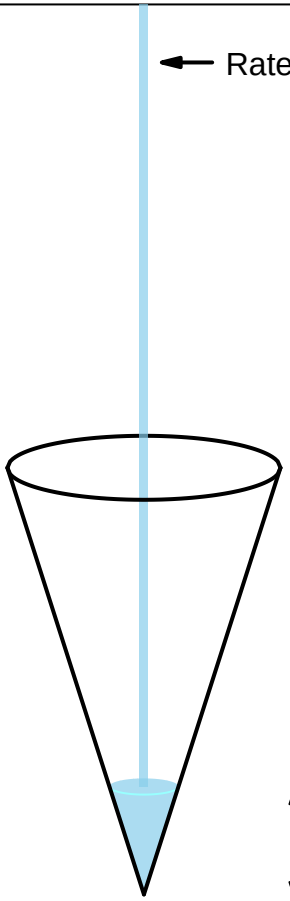


Applications of Differentiation



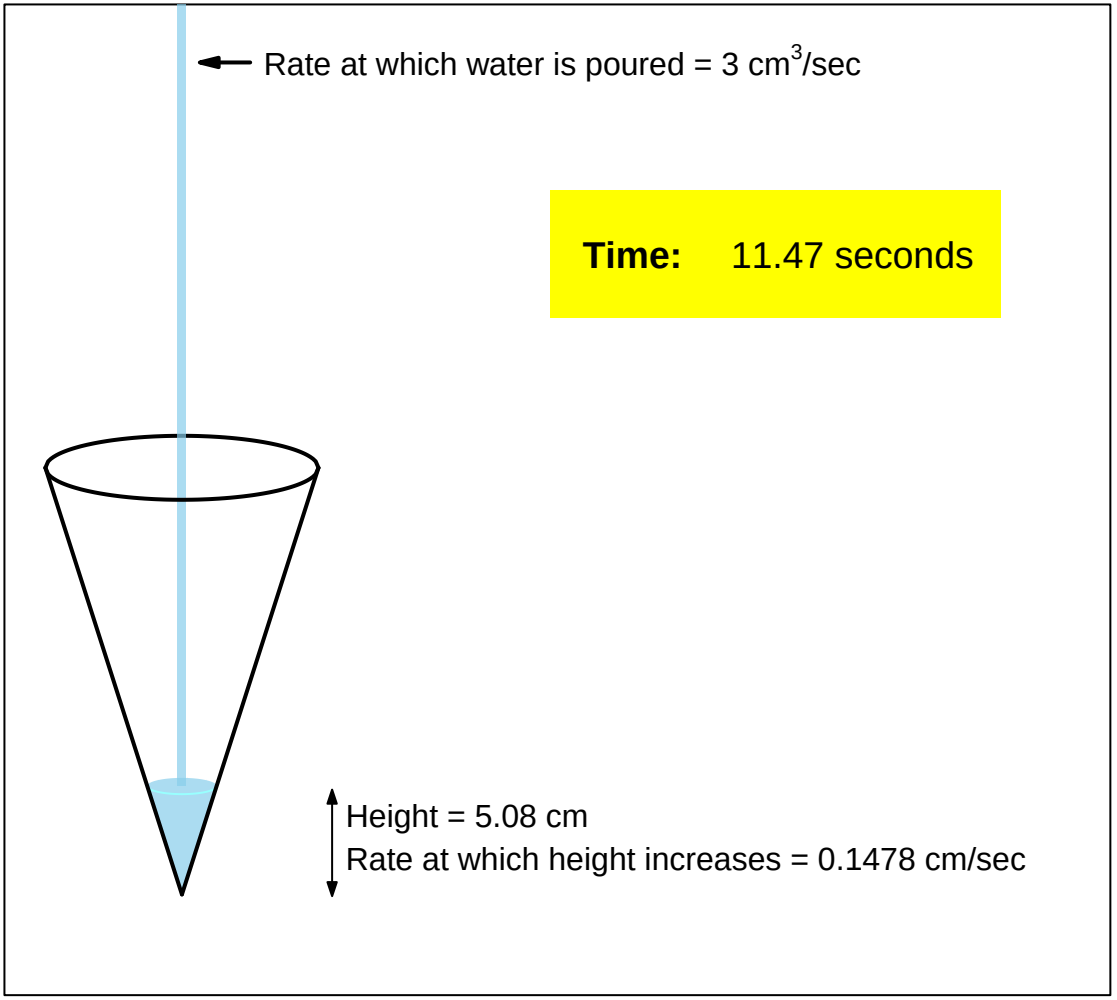
Time: 11.17 seconds

Applications of Differentiation

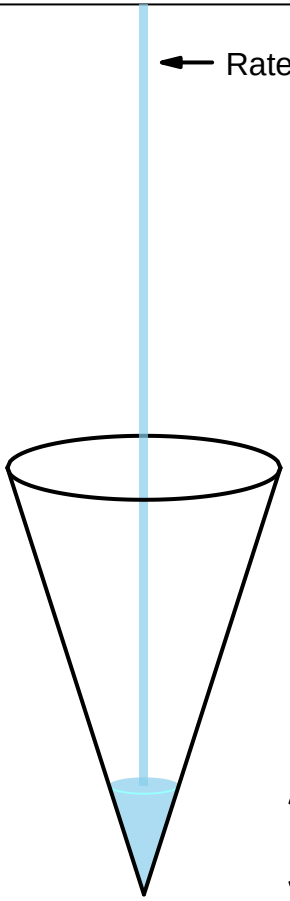


Time: 11.32 seconds

Applications of Differentiation



Applications of Differentiation



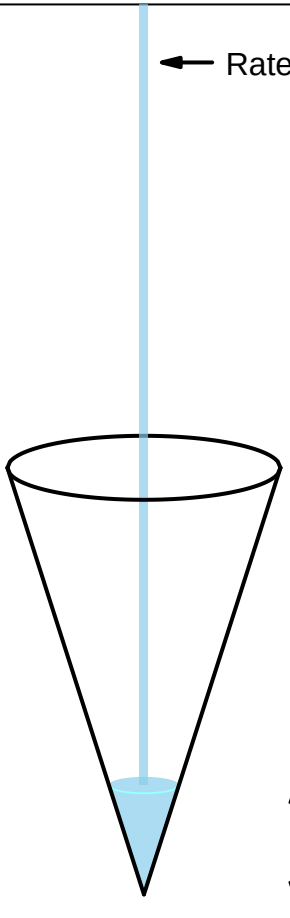
Rate at which water is poured = 3 cm^3/sec

Time: 11.62 seconds

Height = 5.11 cm

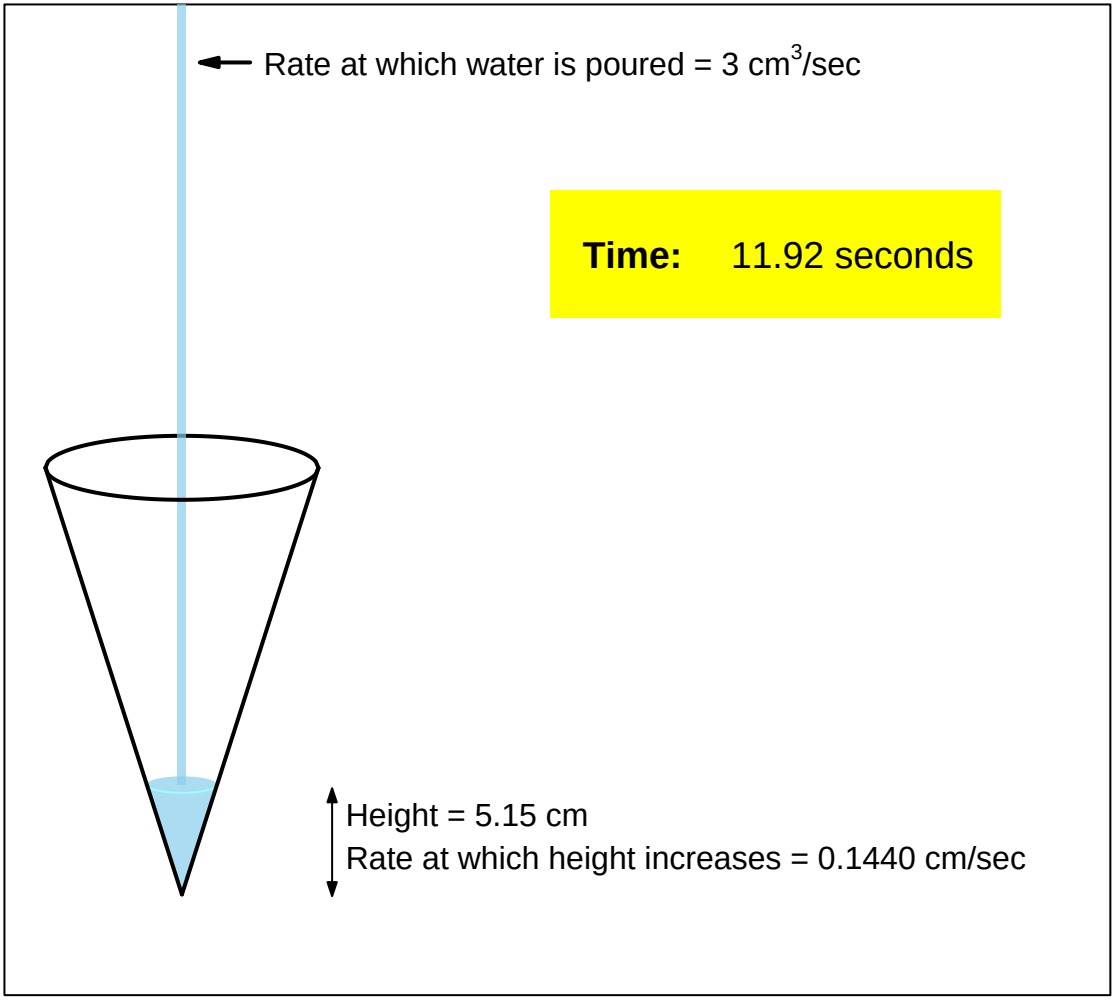
Rate at which height increases = 0.1465 cm/sec

Applications of Differentiation

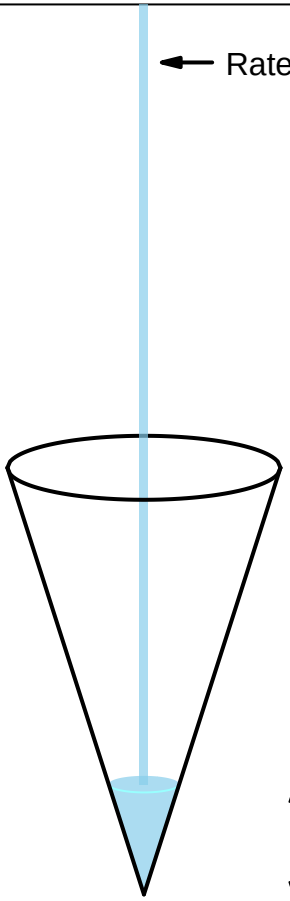


Time: 11.77 seconds

Applications of Differentiation



Applications of Differentiation



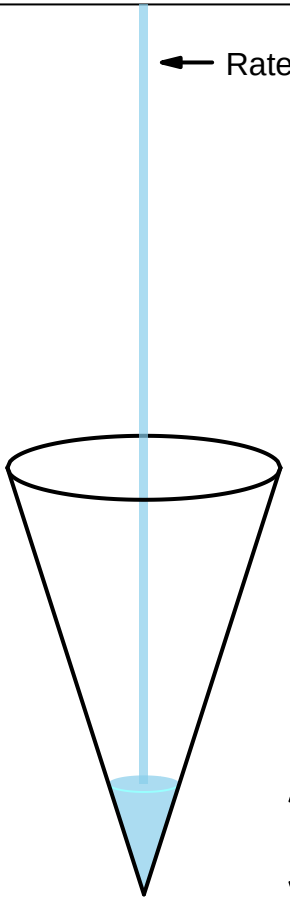
Rate at which water is poured = 3 cm^3/sec

Time: 12.07 seconds

Height = 5.17 cm

Rate at which height increases = 0.1428 cm/sec

Applications of Differentiation



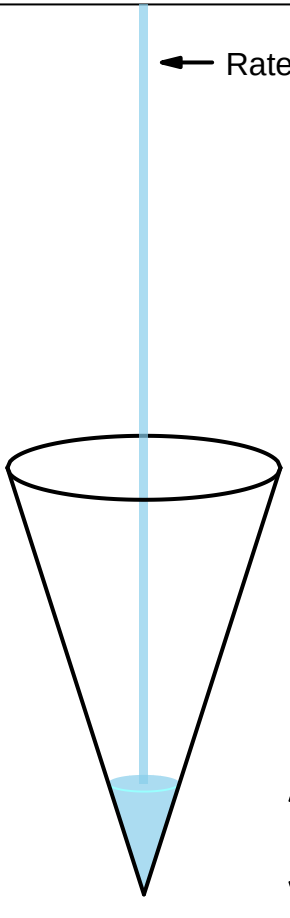
Rate at which water is poured = 3 cm^3/sec

Time: 12.22 seconds

Height = 5.19 cm

Rate at which height increases = 0.1416 cm/sec

Applications of Differentiation



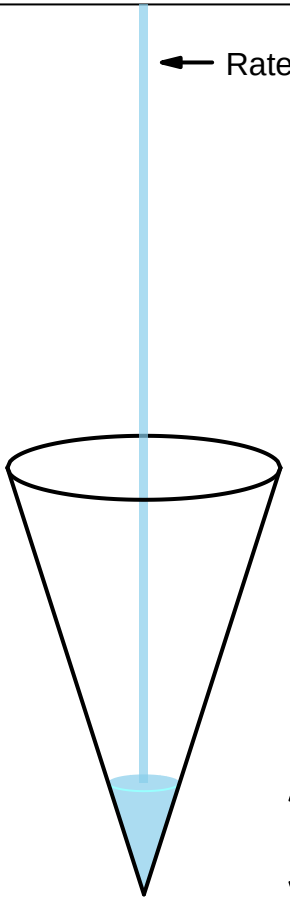
Rate at which water is poured = 3 cm^3/sec

Time: 12.37 seconds

Height = 5.21 cm

Rate at which height increases = 0.1405 cm/sec

Applications of Differentiation



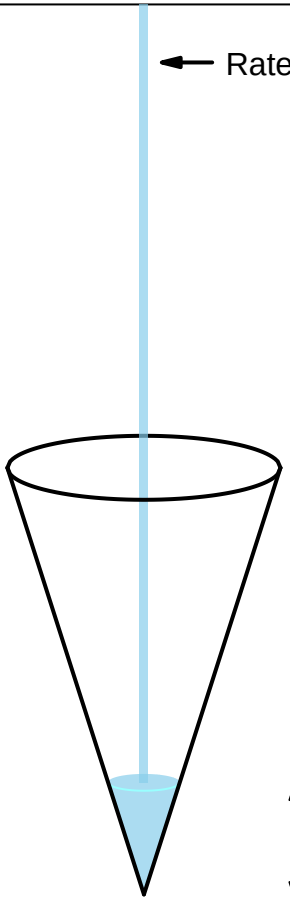
Rate at which water is poured = 3 cm^3/sec

Time: 12.52 seconds

Height = 5.24 cm

Rate at which height increases = 0.1394 cm/sec

Applications of Differentiation



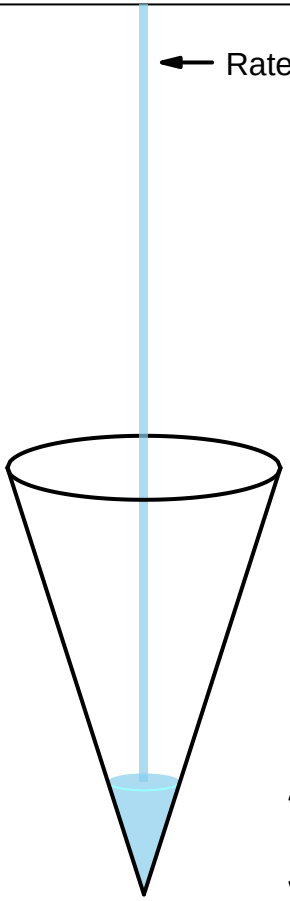
Rate at which water is poured = 3 cm^3/sec

Time: 12.67 seconds

Height = 5.26 cm

Rate at which height increases = 0.1382 cm/sec

Applications of Differentiation



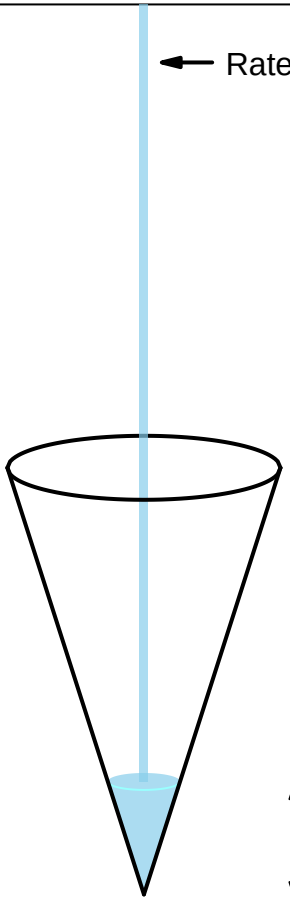
Rate at which water is poured = 3 cm^3/sec

Time: 12.82 seconds

Height = 5.28 cm

Rate at which height increases = 0.1372 cm/sec

Applications of Differentiation



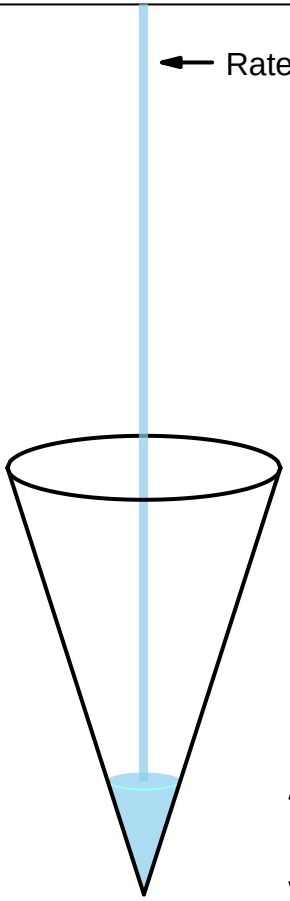
Rate at which water is poured = 3 cm^3/sec

Time: 12.98 seconds

Height = 5.30 cm

Rate at which height increases = 0.1361 cm/sec

Applications of Differentiation



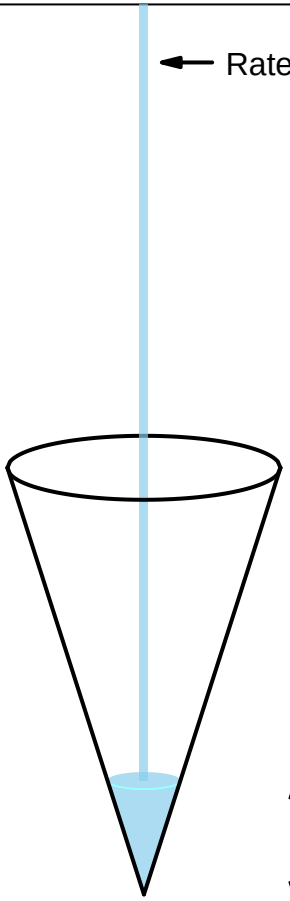
Rate at which water is poured = 3 cm^3/sec

Time: 13.13 seconds

Height = 5.32 cm

Rate at which height increases = 0.1351 cm/sec

Applications of Differentiation



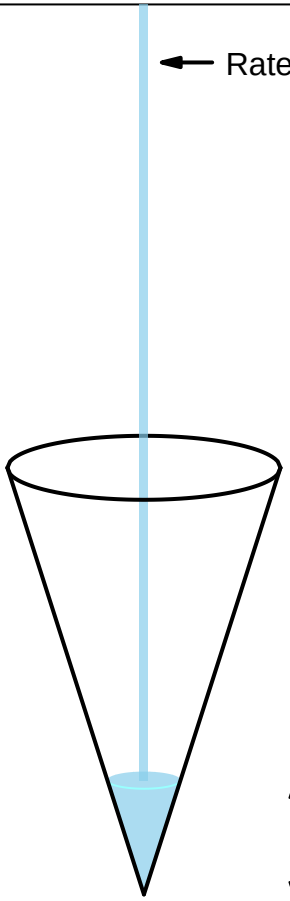
Rate at which water is poured = 3 cm^3/sec

Time: 13.28 seconds

Height = 5.34 cm

Rate at which height increases = 0.1340 cm/sec

Applications of Differentiation



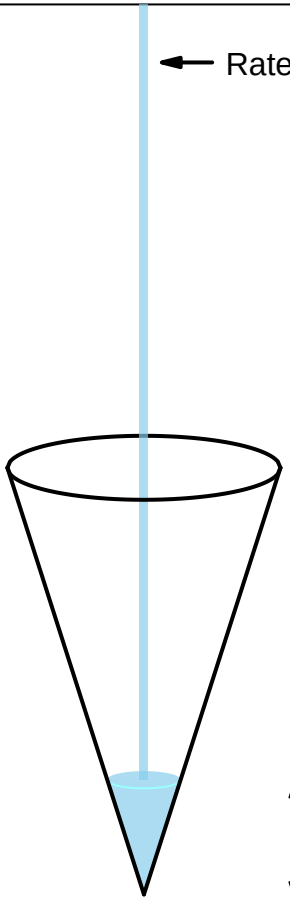
Rate at which water is poured = 3 cm^3/sec

Time: 13.43 seconds

Height = 5.36 cm

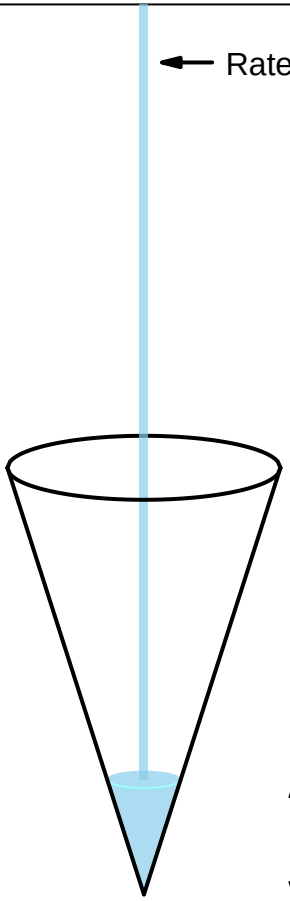
Rate at which height increases = 0.1330 cm/sec

Applications of Differentiation



Time: 13.58 seconds

Applications of Differentiation



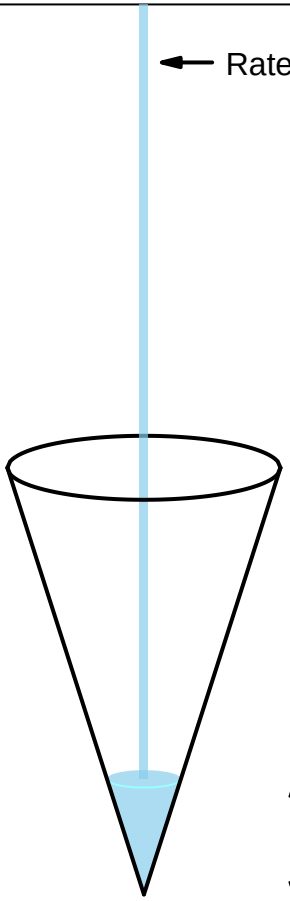
Rate at which water is poured = 3 cm^3/sec

Time: 13.73 seconds

Height = 5.40 cm

Rate at which height increases = 0.1311 cm/sec

Applications of Differentiation



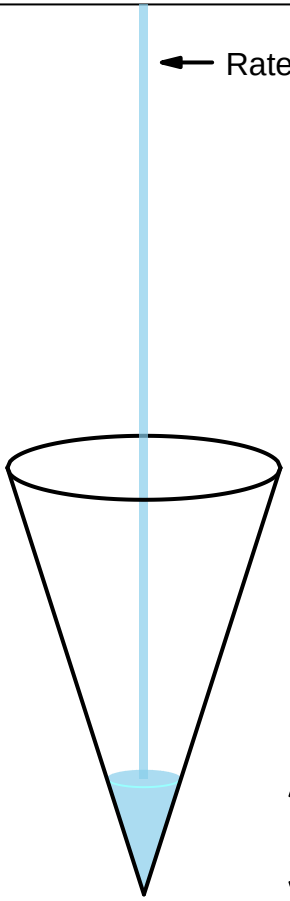
Rate at which water is poured = 3 cm^3/sec

Time: 13.88 seconds

Height = 5.42 cm

Rate at which height increases = 0.1301 cm/sec

Applications of Differentiation



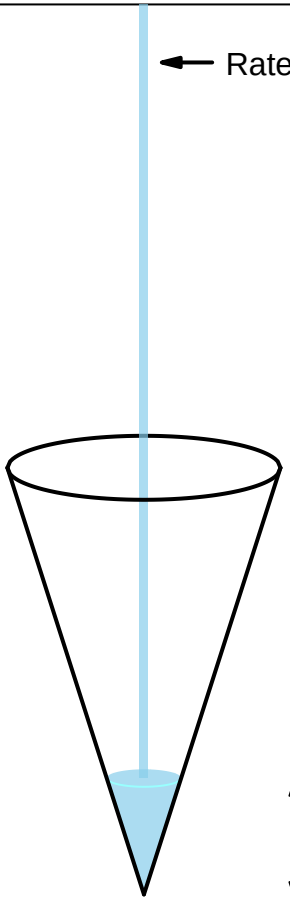
Rate at which water is poured = 3 cm^3/sec

Time: 14.03 seconds

Height = 5.44 cm

Rate at which height increases = 0.1292 cm/sec

Applications of Differentiation



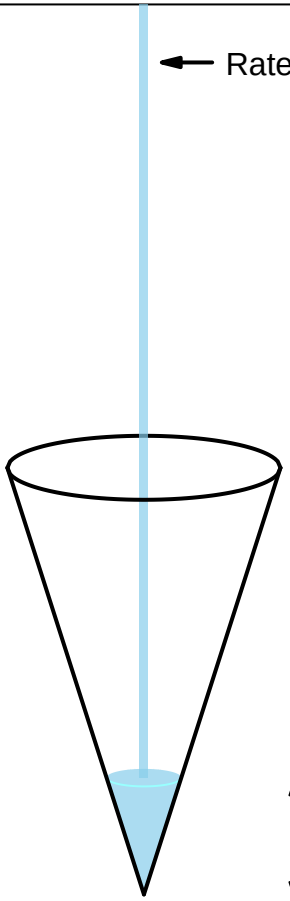
Rate at which water is poured = 3 cm^3/sec

Time: 14.18 seconds

Height = 5.46 cm

Rate at which height increases = 0.1283 cm/sec

Applications of Differentiation



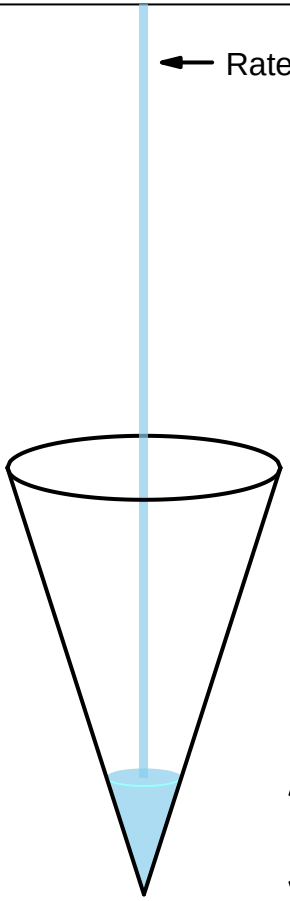
Rate at which water is poured = 3 cm^3/sec

Time: 14.33 seconds

Height = 5.48 cm

Rate at which height increases = 0.1274 cm/sec

Applications of Differentiation



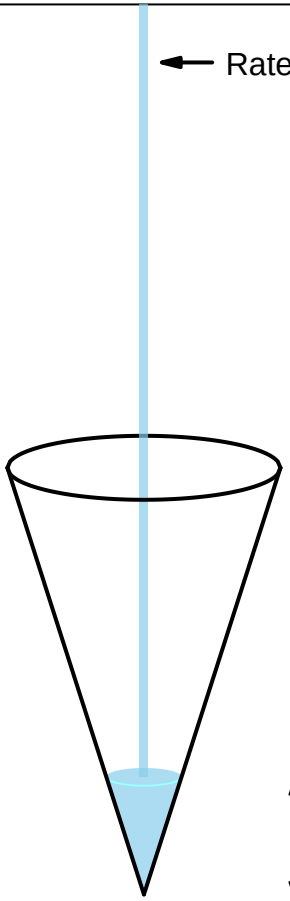
Rate at which water is poured = 3 cm^3/sec

Time: 14.48 seconds

Height = 5.50 cm

Rate at which height increases = 0.1265 cm/sec

Applications of Differentiation



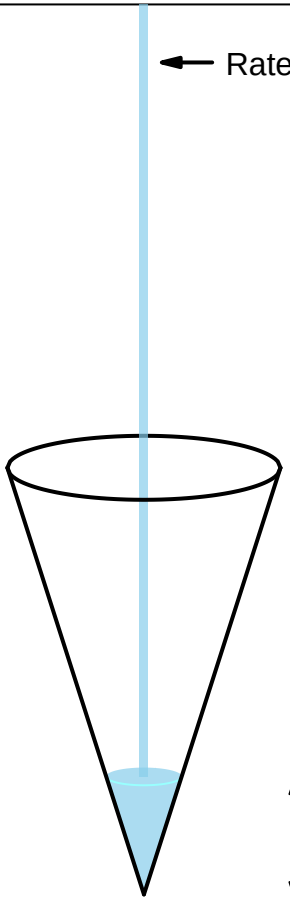
Rate at which water is poured = 3 cm^3/sec

Time: 14.64 seconds

Height = 5.51 cm

Rate at which height increases = 0.1256 cm/sec

Applications of Differentiation



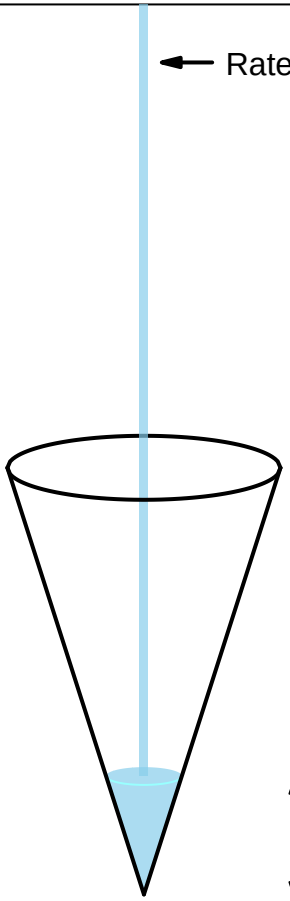
Rate at which water is poured = 3 cm^3/sec

Time: 14.79 seconds

Height = 5.53 cm

Rate at which height increases = 0.1247 cm/sec

Applications of Differentiation



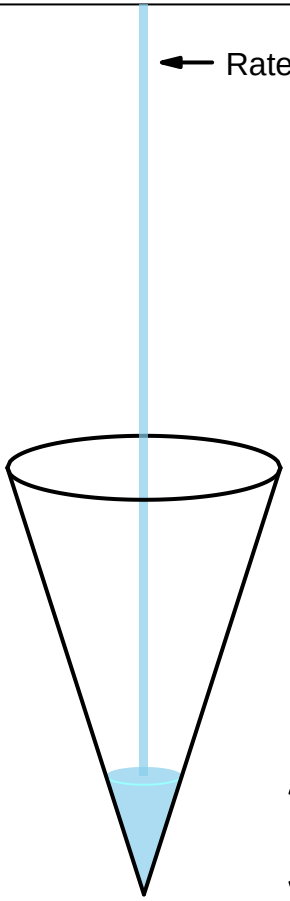
Rate at which water is poured = 3 cm^3/sec

Time: 14.94 seconds

Height = 5.55 cm

Rate at which height increases = 0.1239 cm/sec

Applications of Differentiation



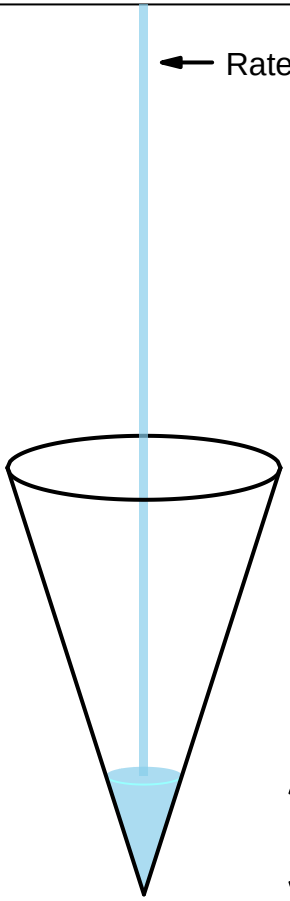
Rate at which water is poured = 3 cm^3/sec

Time: 15.00 seconds

Height = 5.56 cm

Rate at which height increases = 0.1236 cm/sec

Applications of Differentiation



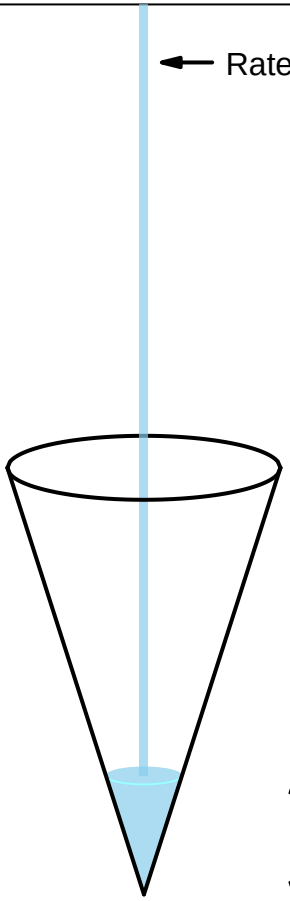
Rate at which water is poured = 3 cm^3/sec

Time: 15.08 seconds

Height = 5.57 cm

Rate at which height increases = 0.1231 cm/sec

Applications of Differentiation



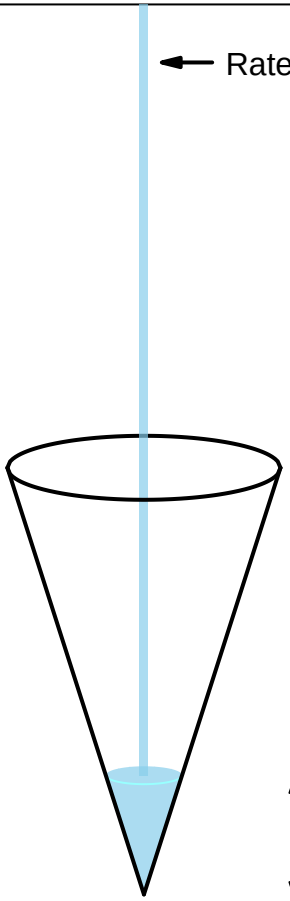
Rate at which water is poured = 3 cm^3/sec

Time: 15.16 seconds

Height = 5.58 cm

Rate at which height increases = 0.1227 cm/sec

Applications of Differentiation



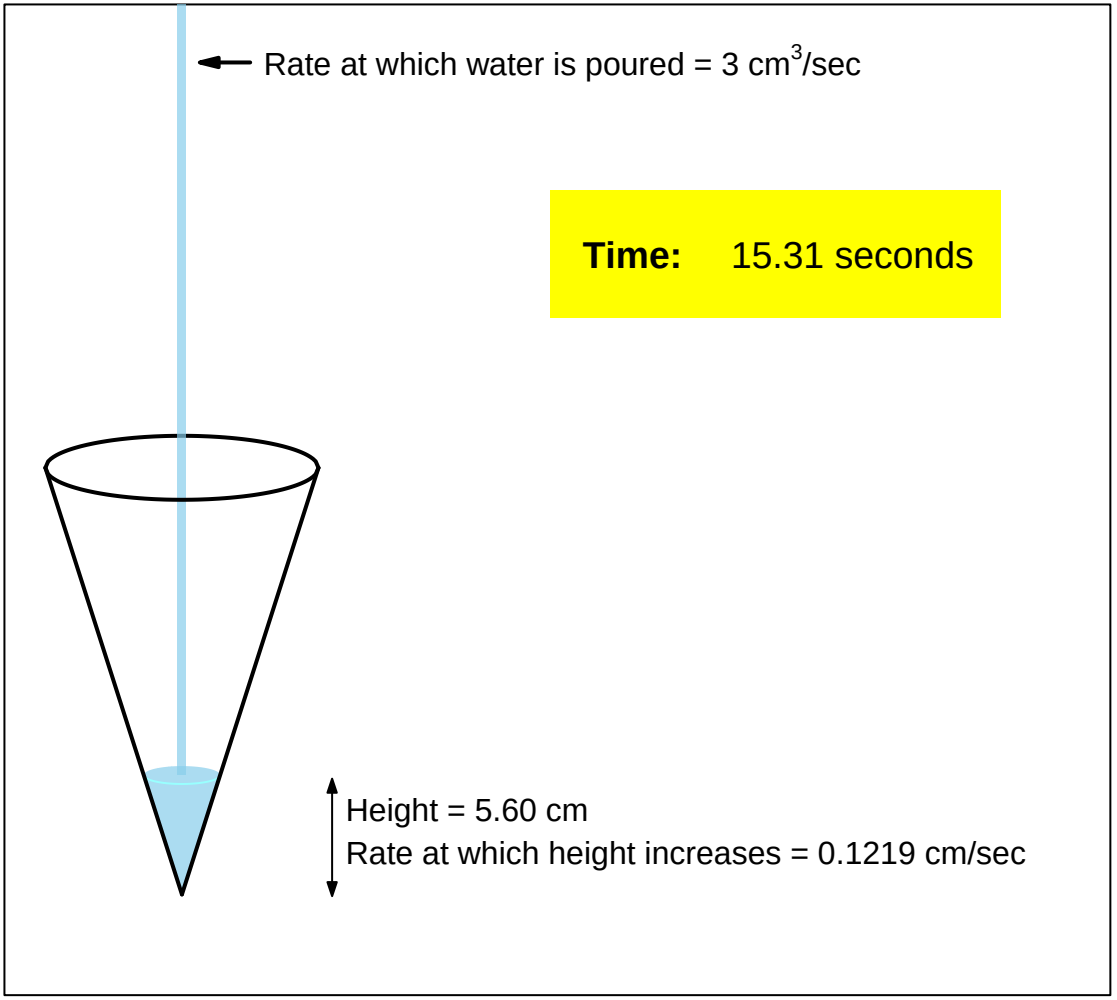
Rate at which water is poured = 3 cm^3/sec

Time: 15.24 seconds

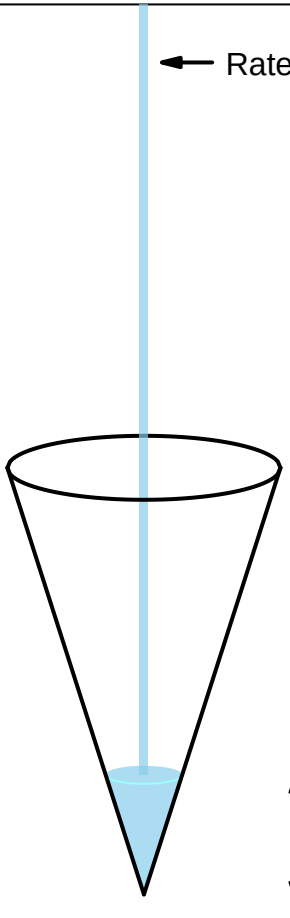
Height = 5.59 cm

Rate at which height increases = 0.1223 cm/sec

Applications of Differentiation



Applications of Differentiation



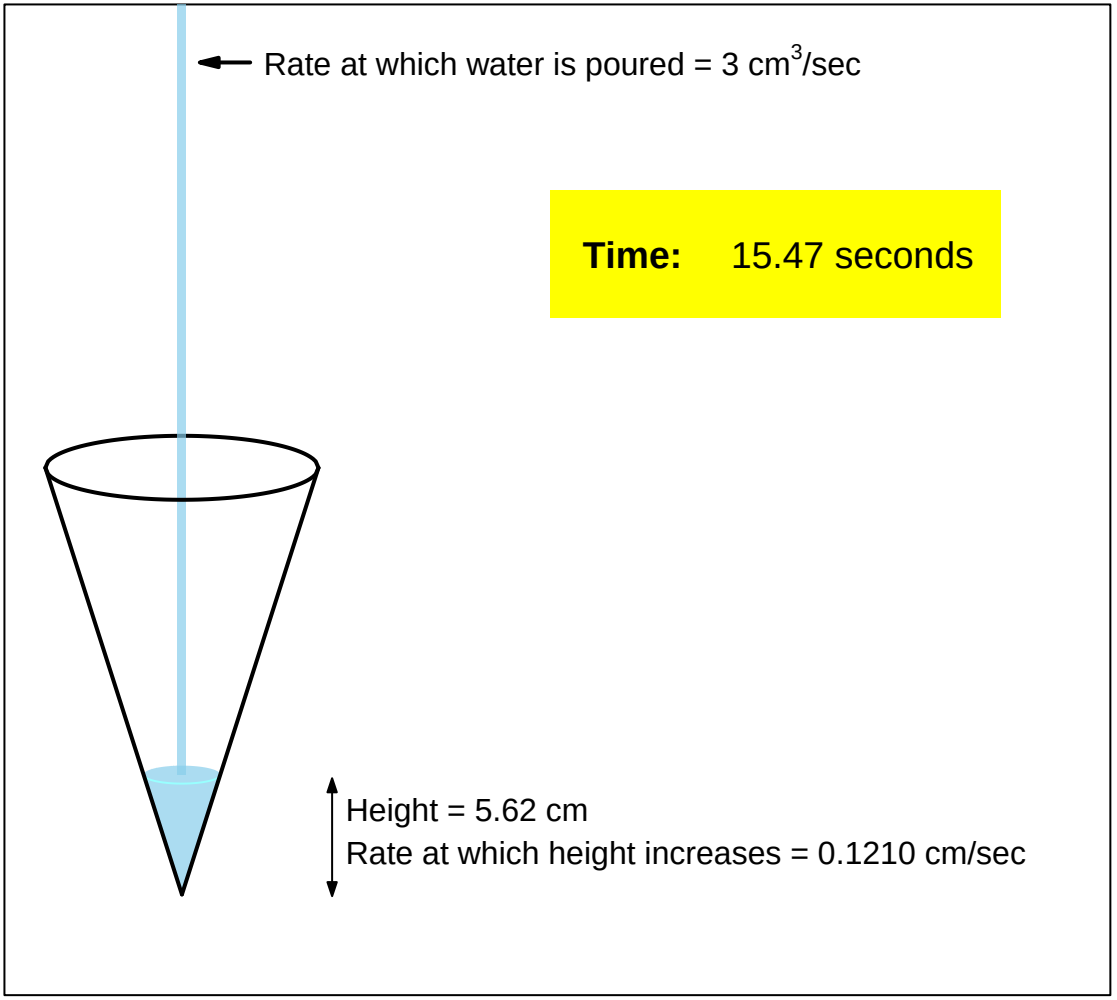
Rate at which water is poured = 3 cm^3/sec

Time: 15.39 seconds

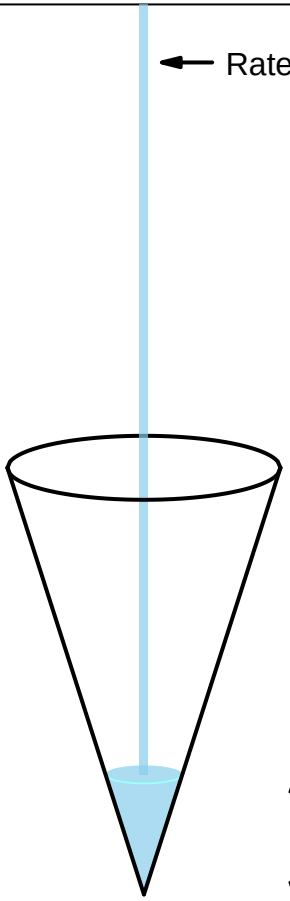
Height = 5.61 cm

Rate at which height increases = 0.1214 cm/sec

Applications of Differentiation



Applications of Differentiation



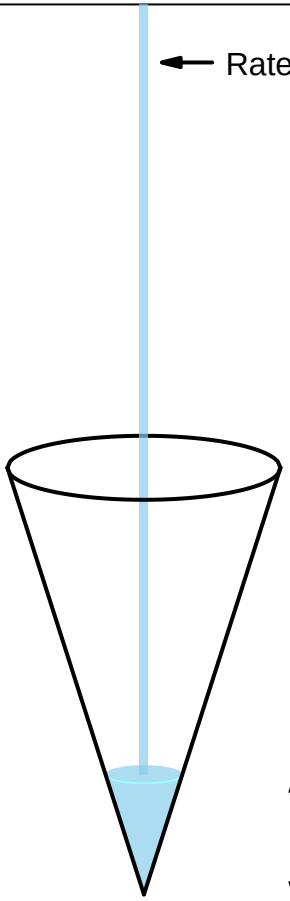
Rate at which water is poured = 3 cm^3/sec

Time: 15.55 seconds

Height = 5.63 cm

Rate at which height increases = 0.1206 cm/sec

Applications of Differentiation



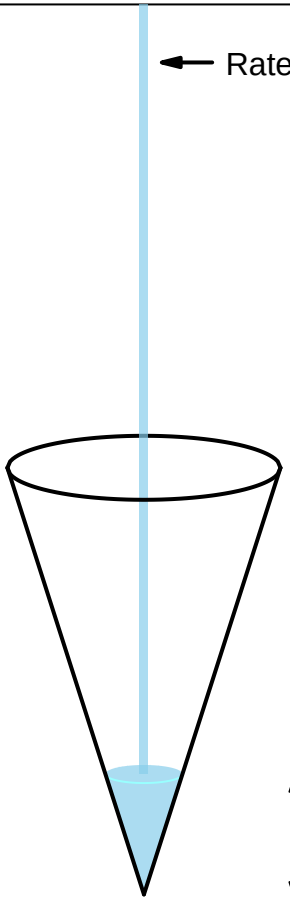
Rate at which water is poured = 3 cm^3/sec

Time: 15.63 seconds

Height = 5.64 cm

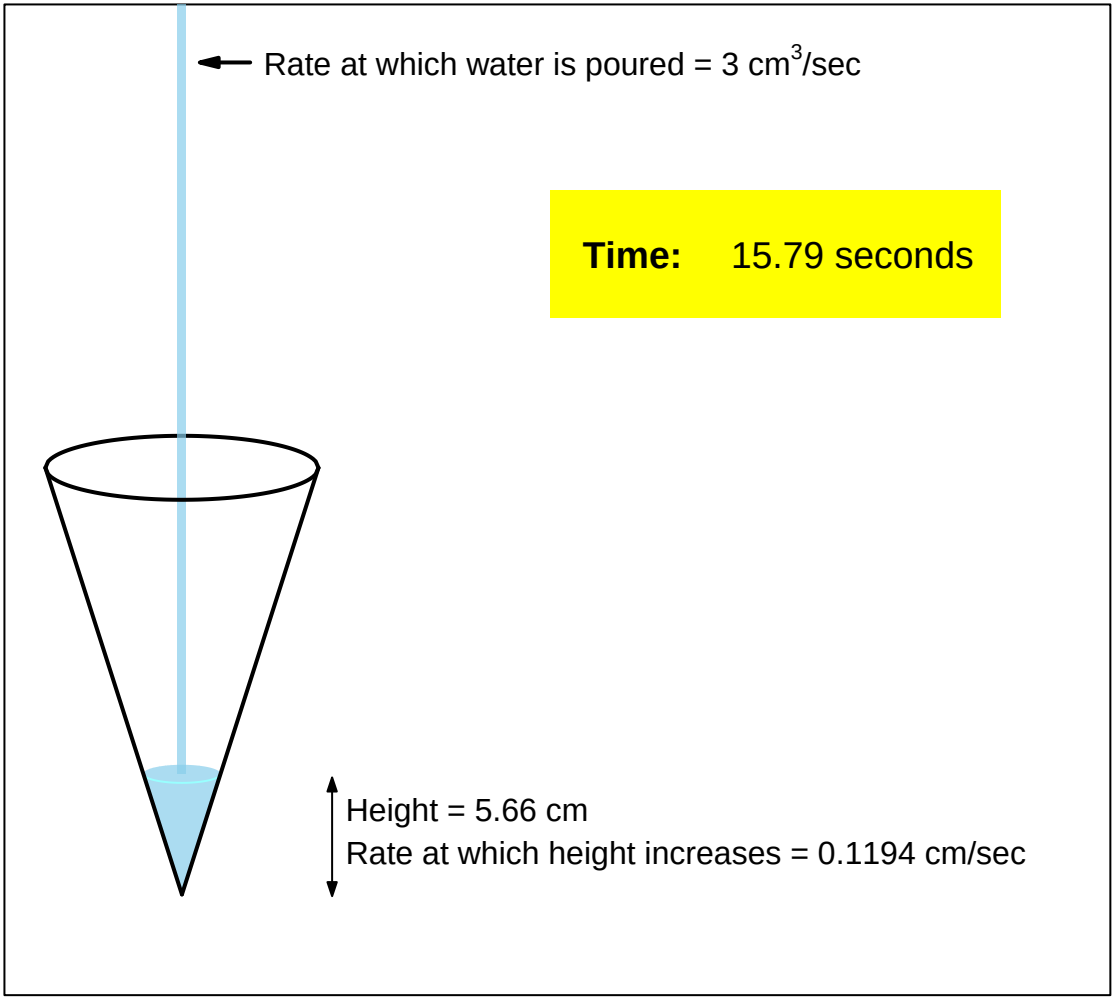
Rate at which height increases = 0.1202 cm/sec

Applications of Differentiation

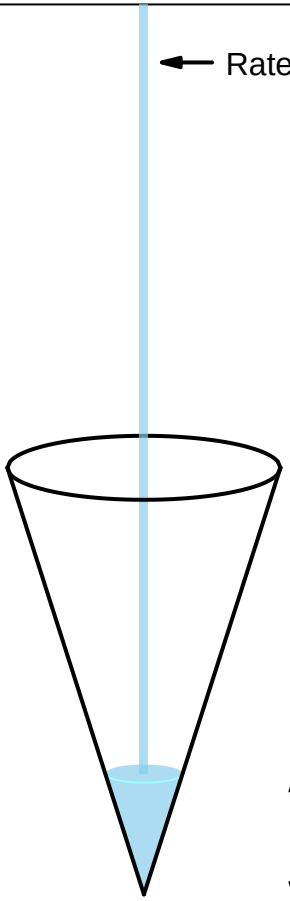


Time: 15.71 seconds

Applications of Differentiation



Applications of Differentiation



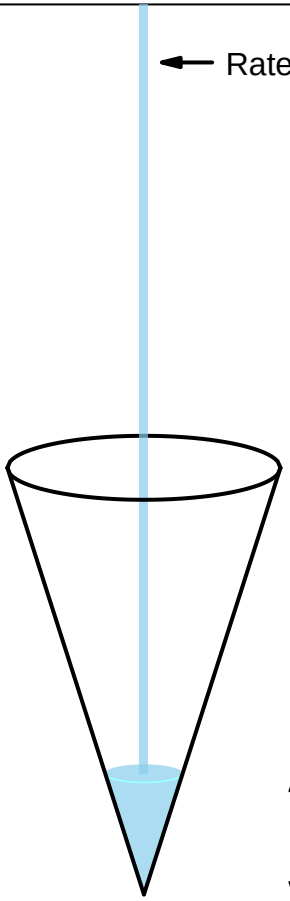
Rate at which water is poured = 3 cm^3/sec

Time: 15.86 seconds

Height = 5.66 cm

Rate at which height increases = 0.1190 cm/sec

Applications of Differentiation



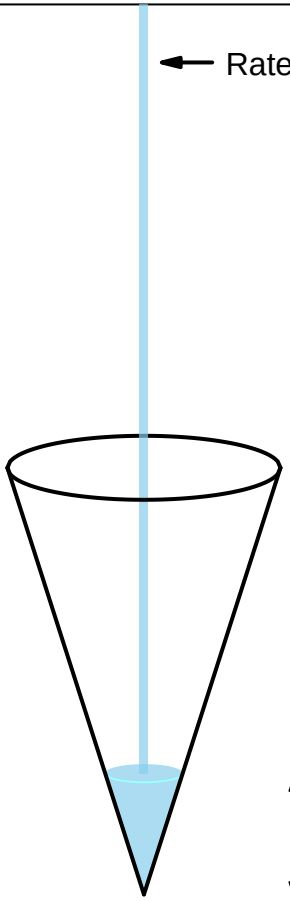
Rate at which water is poured = 3 cm^3/sec

Time: 15.94 seconds

Height = 5.67 cm

Rate at which height increases = 0.1186 cm/sec

Applications of Differentiation



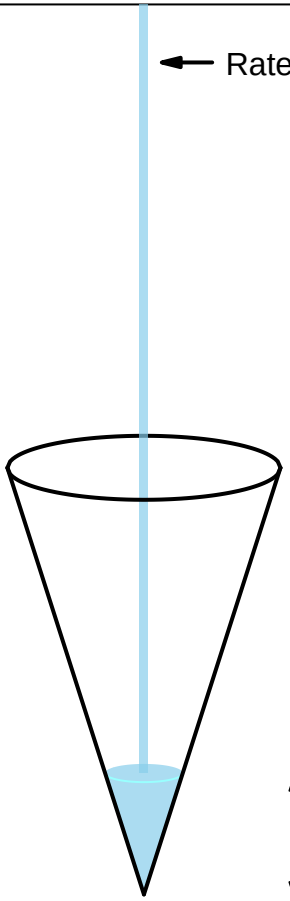
Rate at which water is poured = 3 cm^3/sec

Time: 16.02 seconds

Height = 5.68 cm

Rate at which height increases = 0.1182 cm/sec

Applications of Differentiation



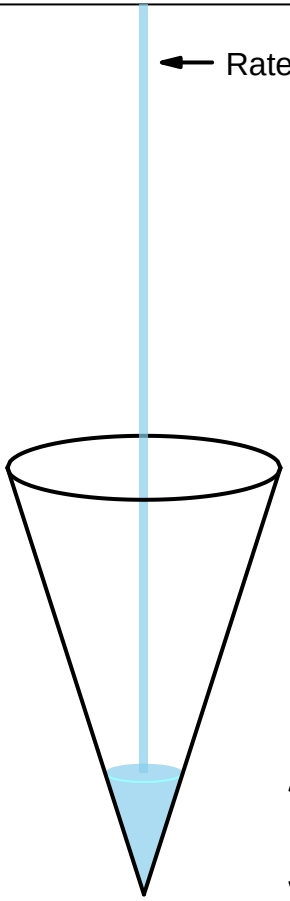
Rate at which water is poured = 3 cm^3/sec

Time: 16.10 seconds

Height = 5.69 cm

Rate at which height increases = 0.1179 cm/sec

Applications of Differentiation



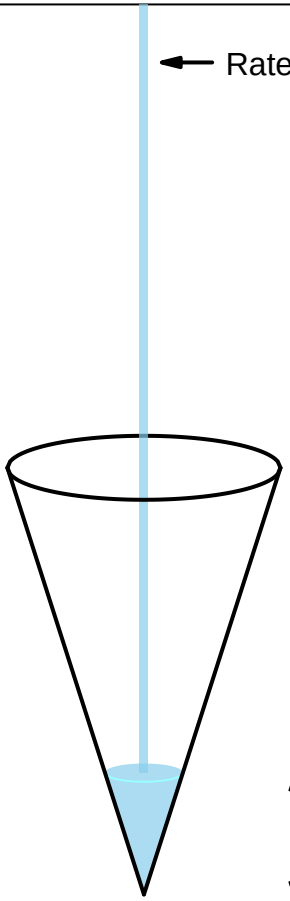
Rate at which water is poured = 3 cm^3/sec

Time: 16.18 seconds

Height = 5.70 cm

Rate at which height increases = 0.1175 cm/sec

Applications of Differentiation



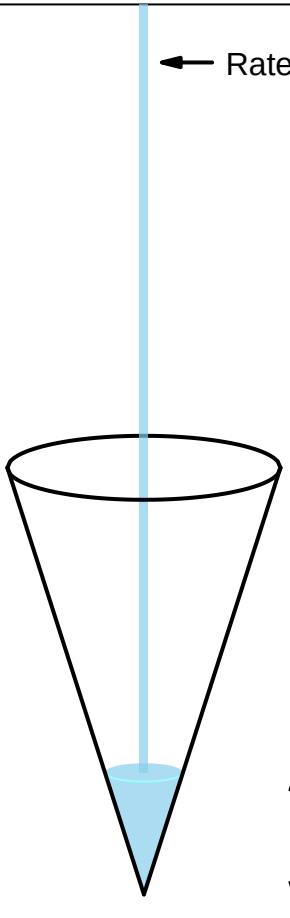
Rate at which water is poured = 3 cm^3/sec

Time: 16.26 seconds

Height = 5.71 cm

Rate at which height increases = 0.1171 cm/sec

Applications of Differentiation



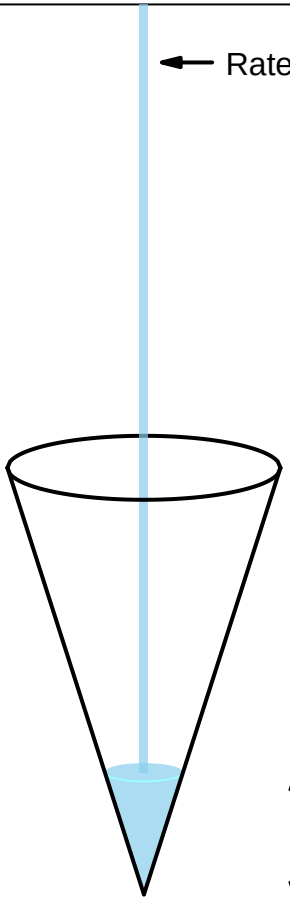
Rate at which water is poured = 3 cm^3/sec

Time: 16.34 seconds

Height = 5.72 cm

Rate at which height increases = 0.1167 cm/sec

Applications of Differentiation



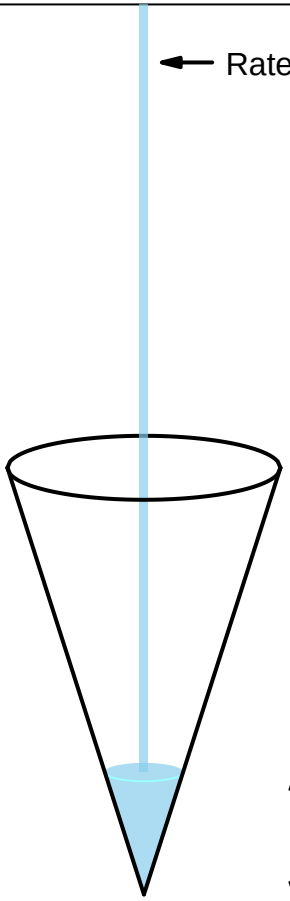
Rate at which water is poured = 3 cm^3/sec

Time: 16.41 seconds

Height = 5.73 cm

Rate at which height increases = 0.1164 cm/sec

Applications of Differentiation



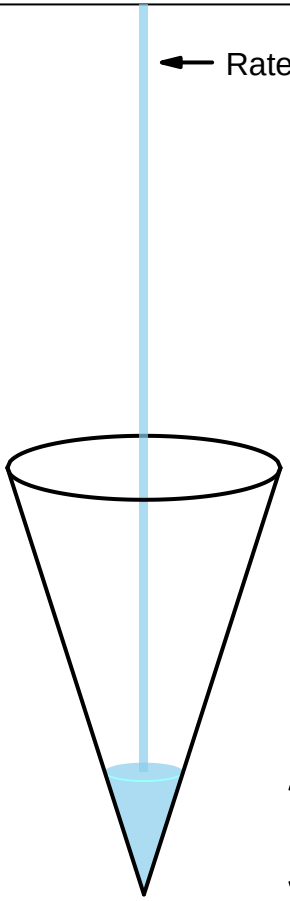
Rate at which water is poured = 3 cm^3/sec

Time: 16.49 seconds

Height = 5.74 cm

Rate at which height increases = 0.1160 cm/sec

Applications of Differentiation



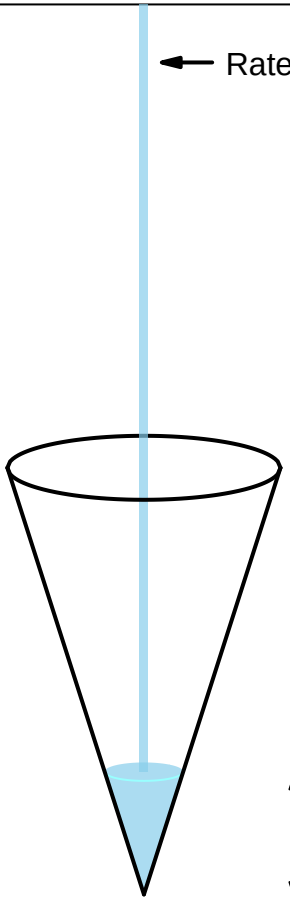
Rate at which water is poured = 3 cm^3/sec

Time: 16.57 seconds

Height = 5.75 cm

Rate at which height increases = 0.1156 cm/sec

Applications of Differentiation



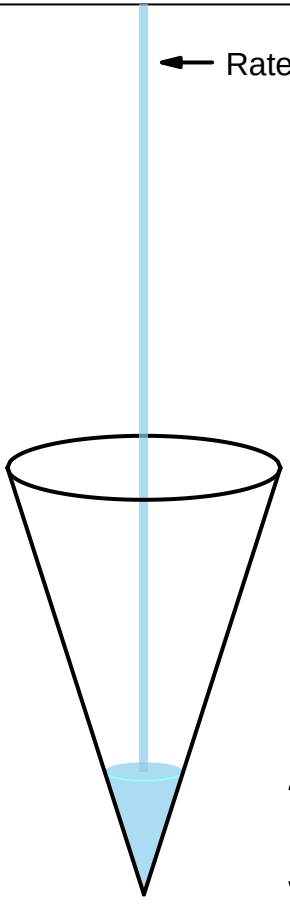
Rate at which water is poured = 3 cm^3/sec

Time: 16.65 seconds

Height = 5.76 cm

Rate at which height increases = 0.1153 cm/sec

Applications of Differentiation



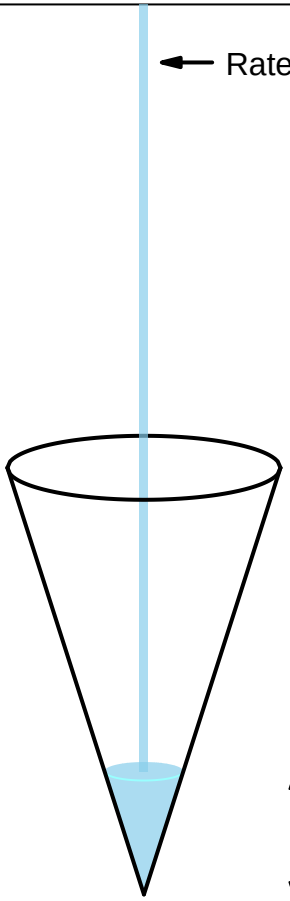
Rate at which water is poured = 3 cm^3/sec

Time: 16.73 seconds

Height = 5.77 cm

Rate at which height increases = 0.1149 cm/sec

Applications of Differentiation



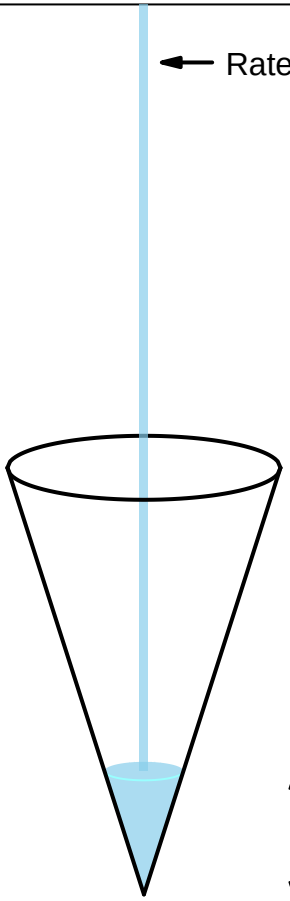
Rate at which water is poured = 3 cm^3/sec

Time: 16.81 seconds

Height = 5.77 cm

Rate at which height increases = 0.1145 cm/sec

Applications of Differentiation



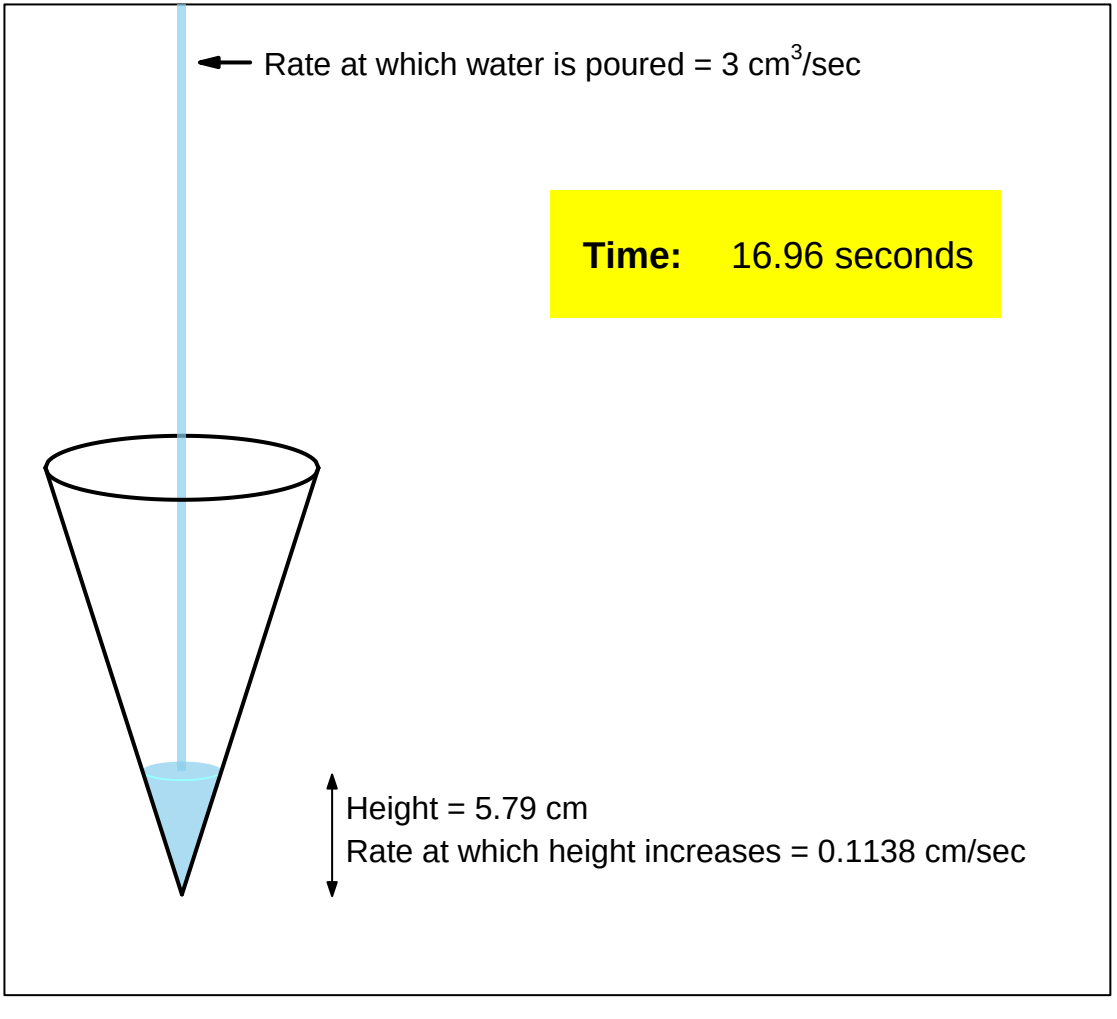
Rate at which water is poured = 3 cm^3/sec

Time: 16.89 seconds

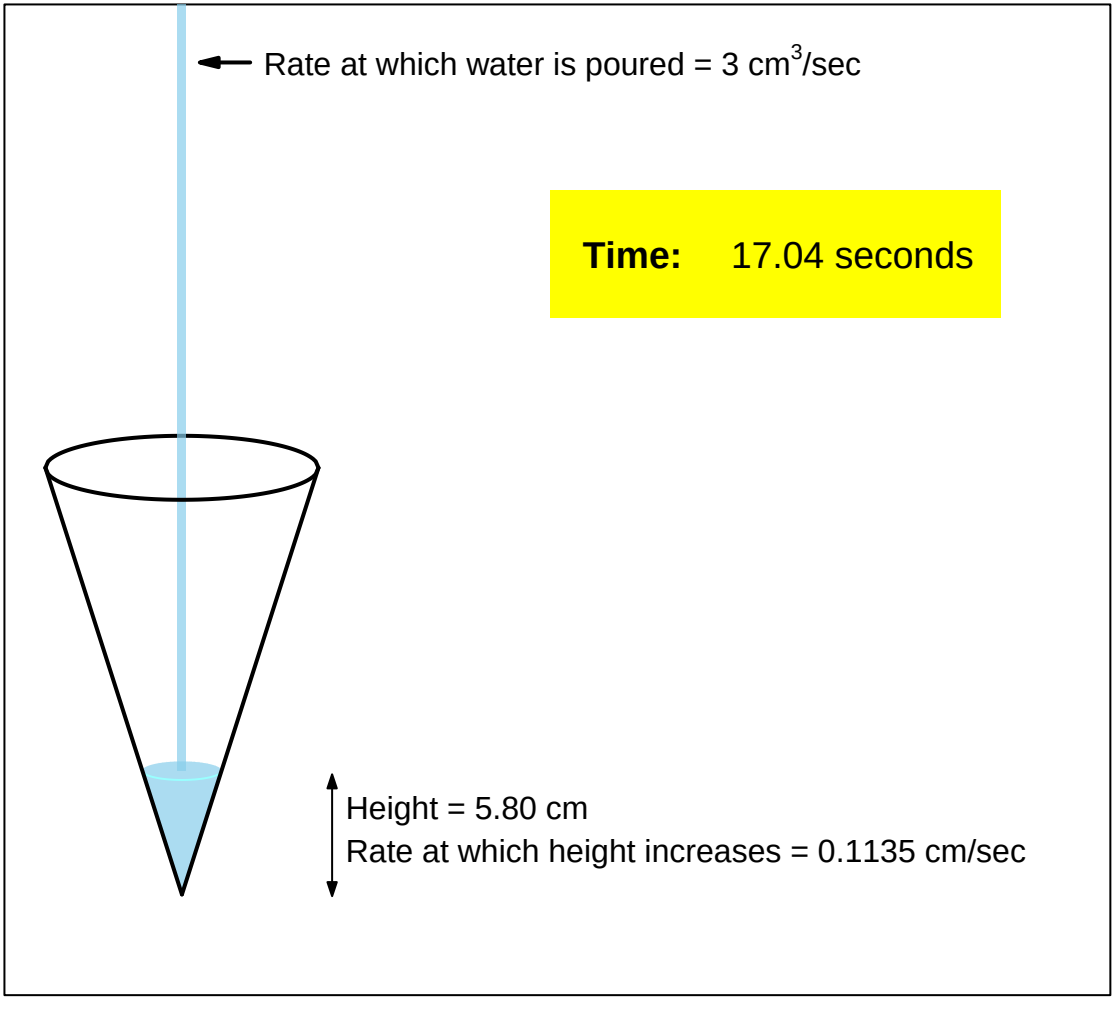
Height = 5.78 cm

Rate at which height increases = 0.1142 cm/sec

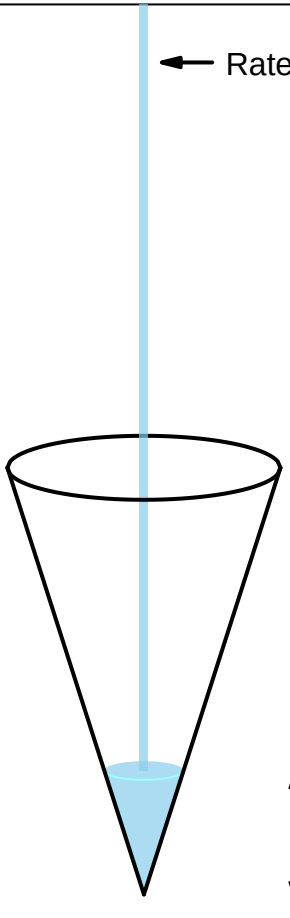
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



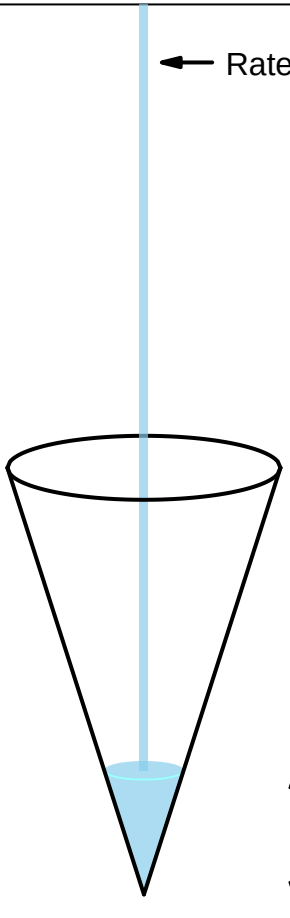
Rate at which water is poured = 3 cm^3/sec

Time: 17.12 seconds

Height = 5.81 cm

Rate at which height increases = 0.1131 cm/sec

Applications of Differentiation



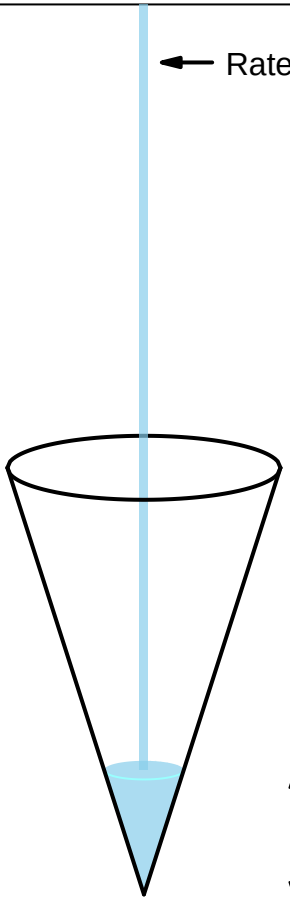
Rate at which water is poured = 3 cm^3/sec

Time: 17.20 seconds

Height = 5.82 cm

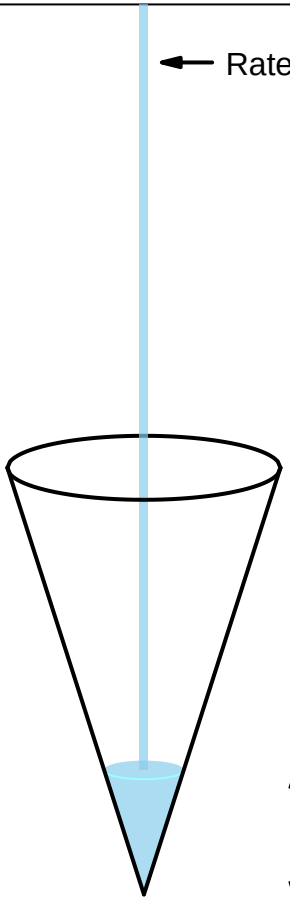
Rate at which height increases = 0.1128 cm/sec

Applications of Differentiation



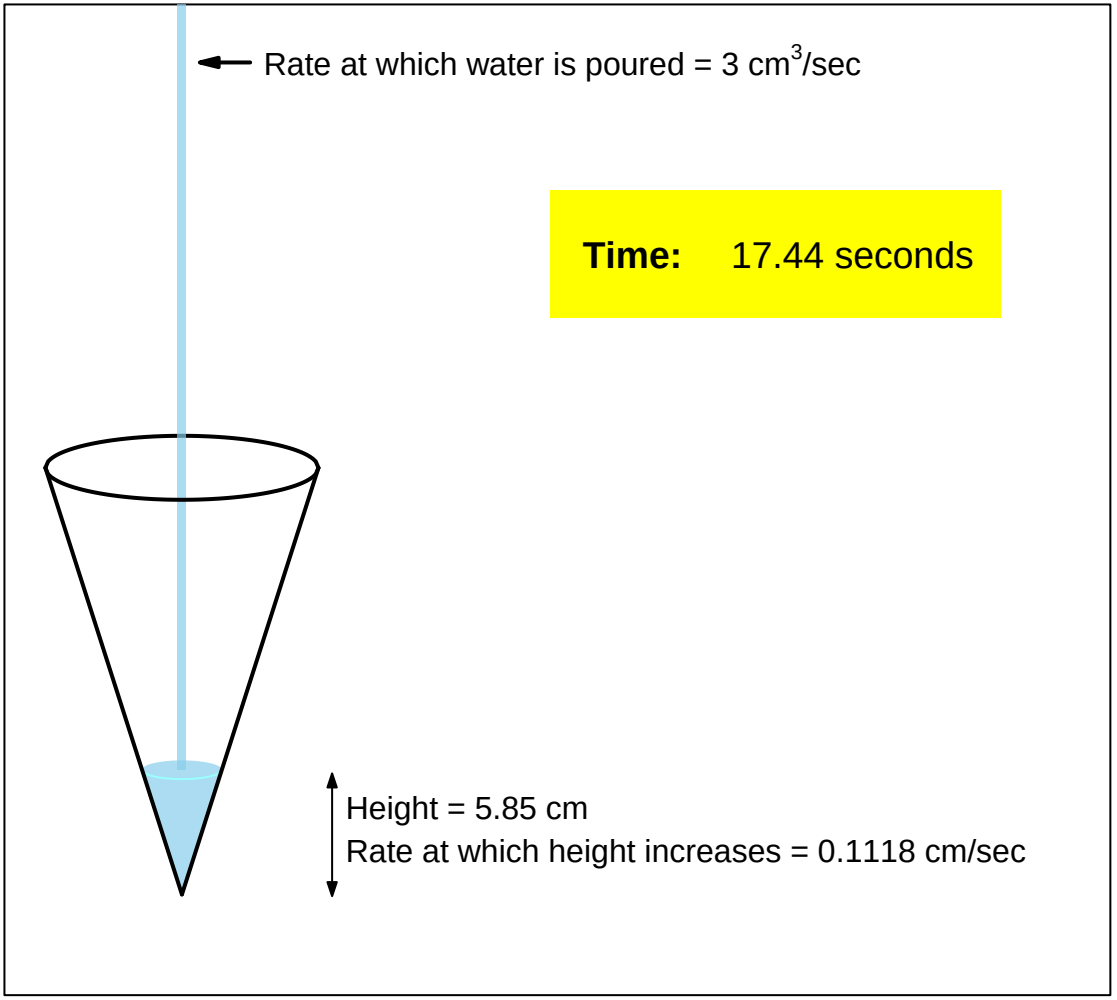
Time: 17.28 seconds

Applications of Differentiation

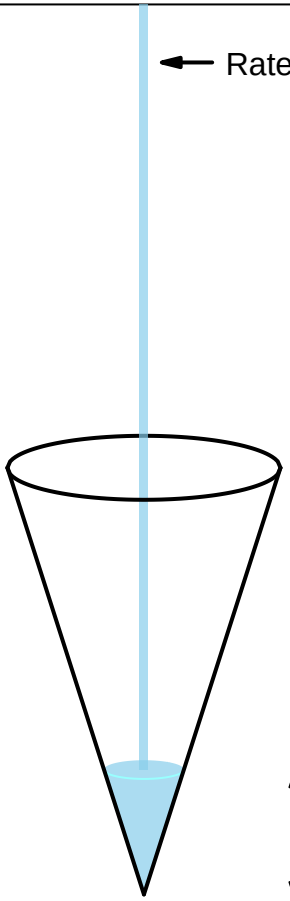


Time: 17.36 seconds

Applications of Differentiation



Applications of Differentiation



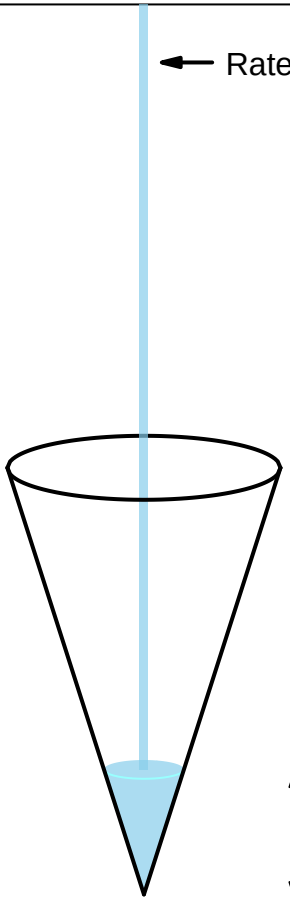
Rate at which water is poured = 3 cm^3/sec

Time: 17.51 seconds

Height = 5.85 cm

Rate at which height increases = 0.1114 cm/sec

Applications of Differentiation



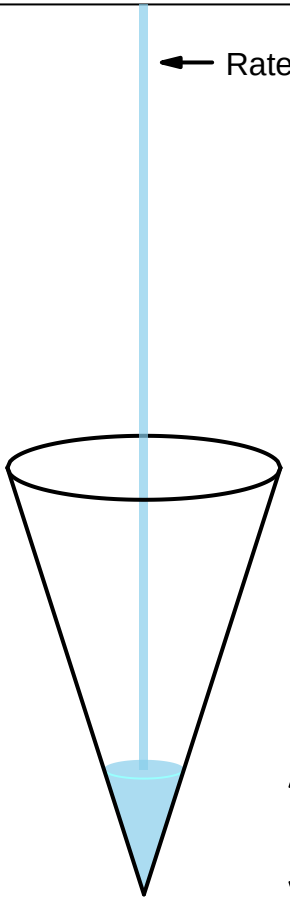
Rate at which water is poured = 3 cm^3/sec

Time: 17.59 seconds

Height = 5.86 cm

Rate at which height increases = 0.1111 cm/sec

Applications of Differentiation



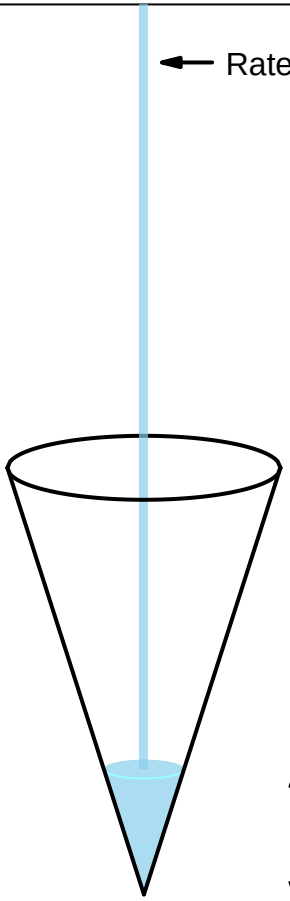
Rate at which water is poured = 3 cm^3/sec

Time: 17.67 seconds

Height = 5.87 cm

Rate at which height increases = 0.1108 cm/sec

Applications of Differentiation



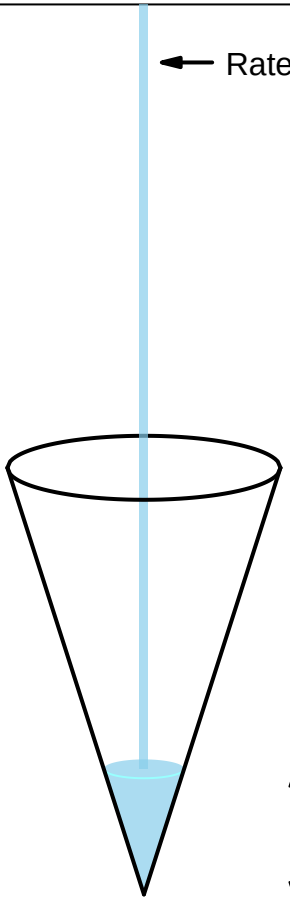
Rate at which water is poured = 3 cm^3/sec

Time: 17.75 seconds

Height = 5.88 cm

Rate at which height increases = 0.1104 cm/sec

Applications of Differentiation



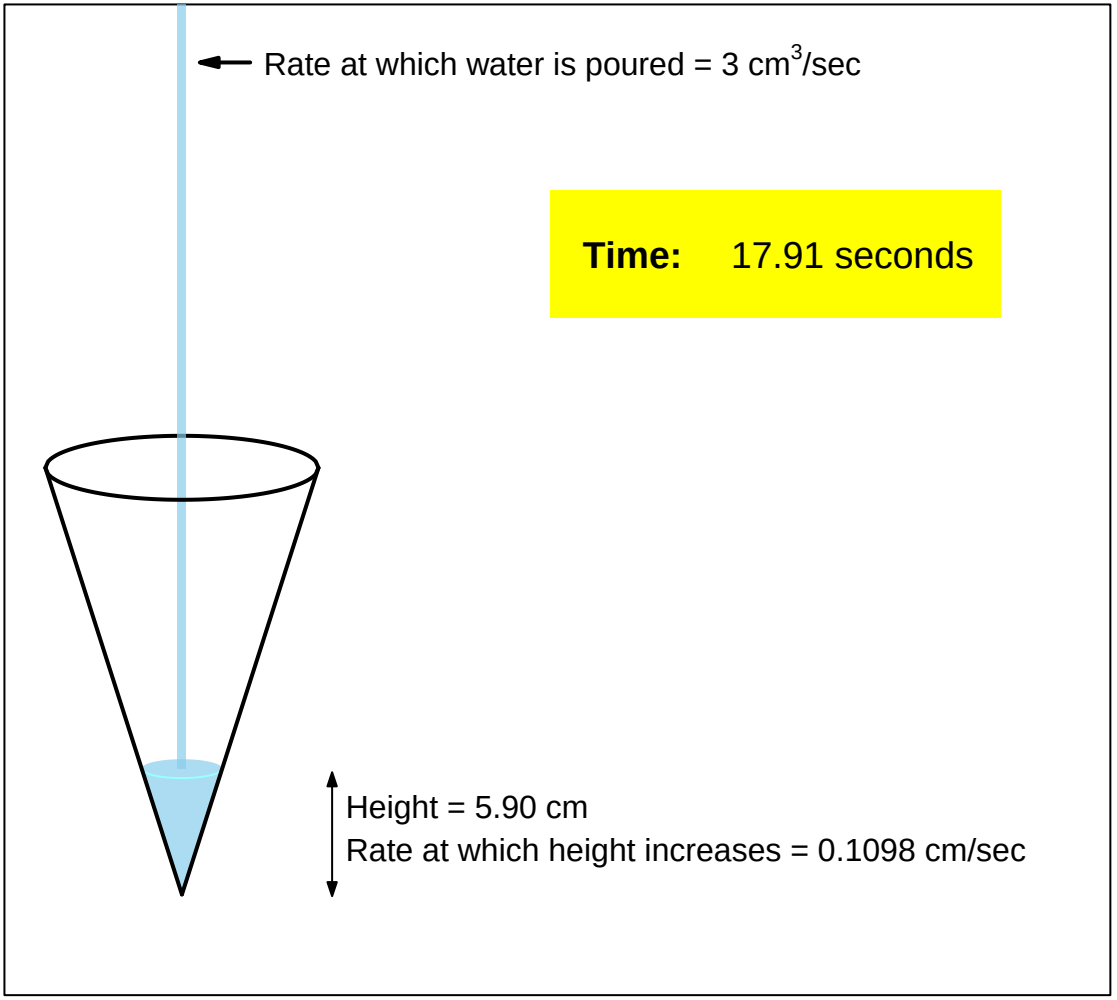
Rate at which water is poured = 3 cm^3/sec

Time: 17.83 seconds

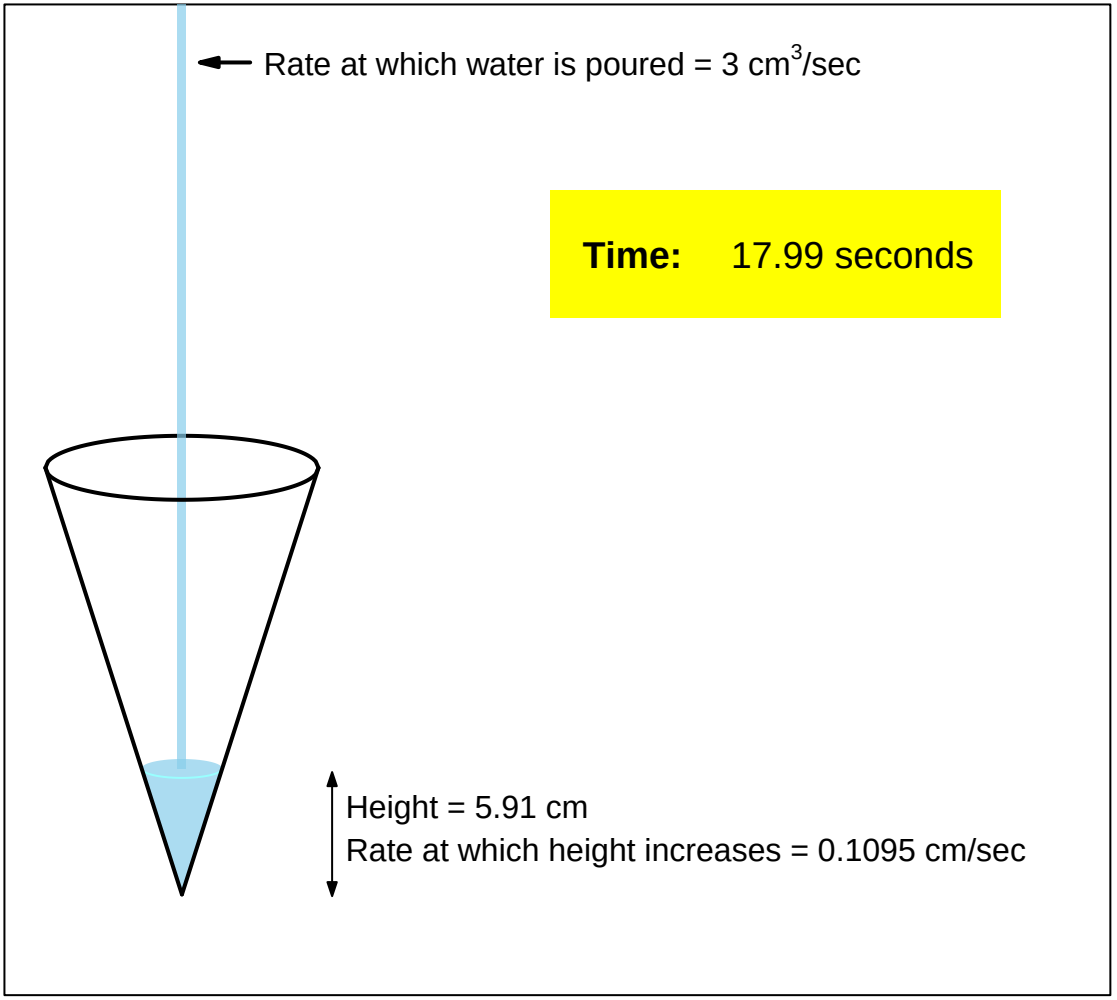
Height = 5.89 cm

Rate at which height increases = 0.1101 cm/sec

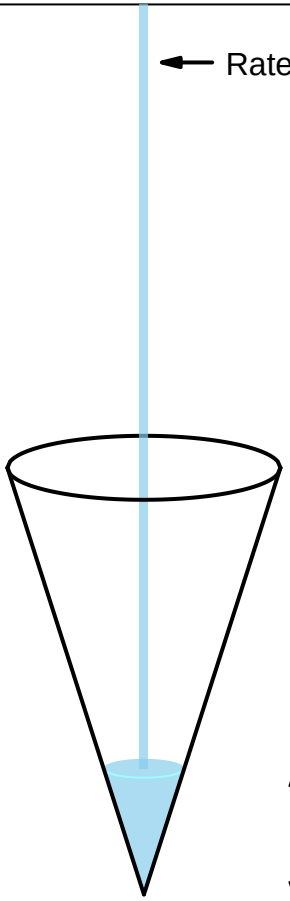
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



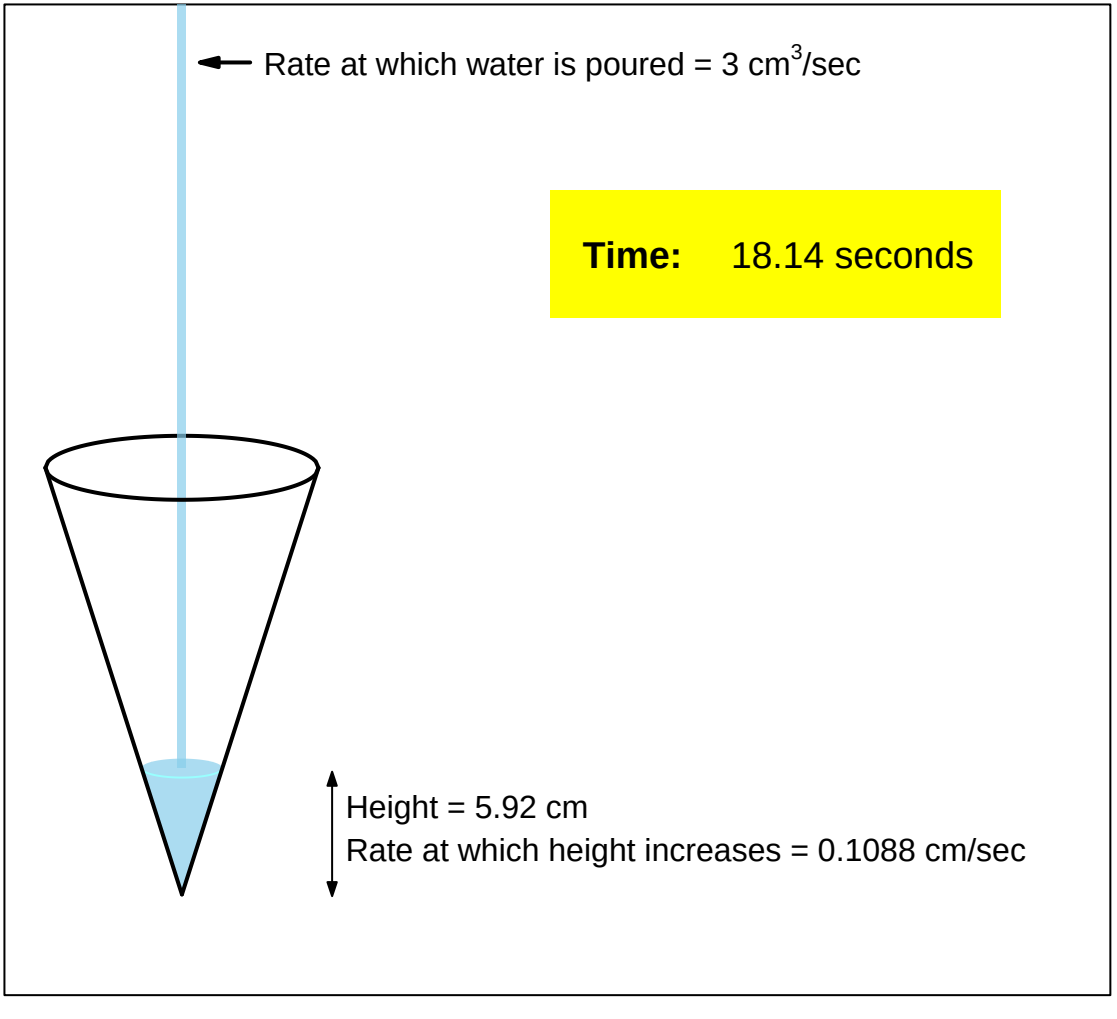
Rate at which water is poured = 3 cm^3/sec

Time: 18.06 seconds

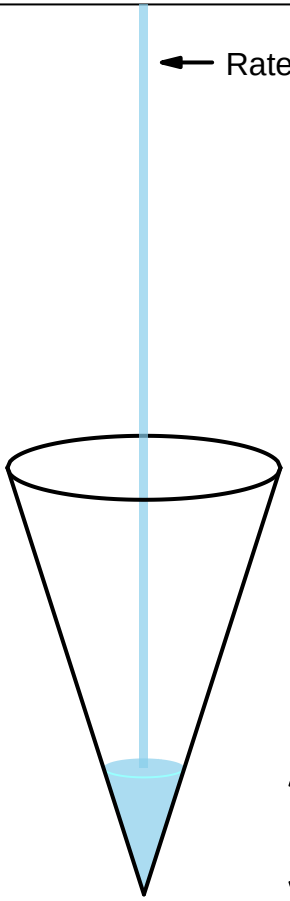
Height = 5.92 cm

Rate at which height increases = 0.1092 cm/sec

Applications of Differentiation

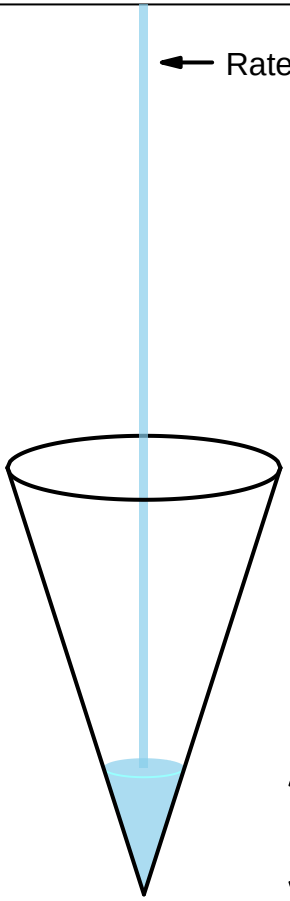


Applications of Differentiation



Time: 18.22 seconds

Applications of Differentiation



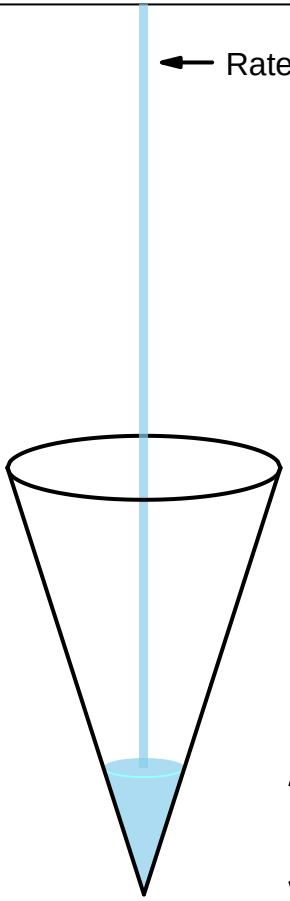
Rate at which water is poured = 3 cm^3/sec

Time: 18.30 seconds

Height = 5.94 cm

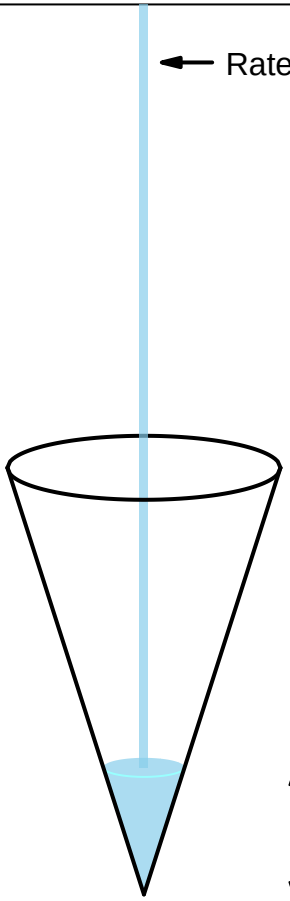
Rate at which height increases = 0.1082 cm/sec

Applications of Differentiation



Time: 18.38 seconds

Applications of Differentiation



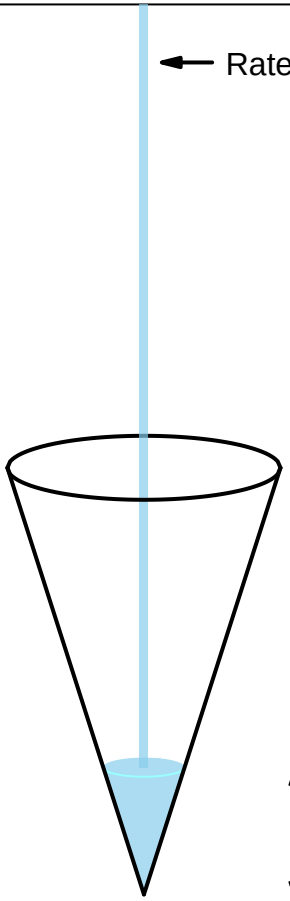
Rate at which water is poured = 3 cm^3/sec

Time: 18.46 seconds

Height = 5.96 cm

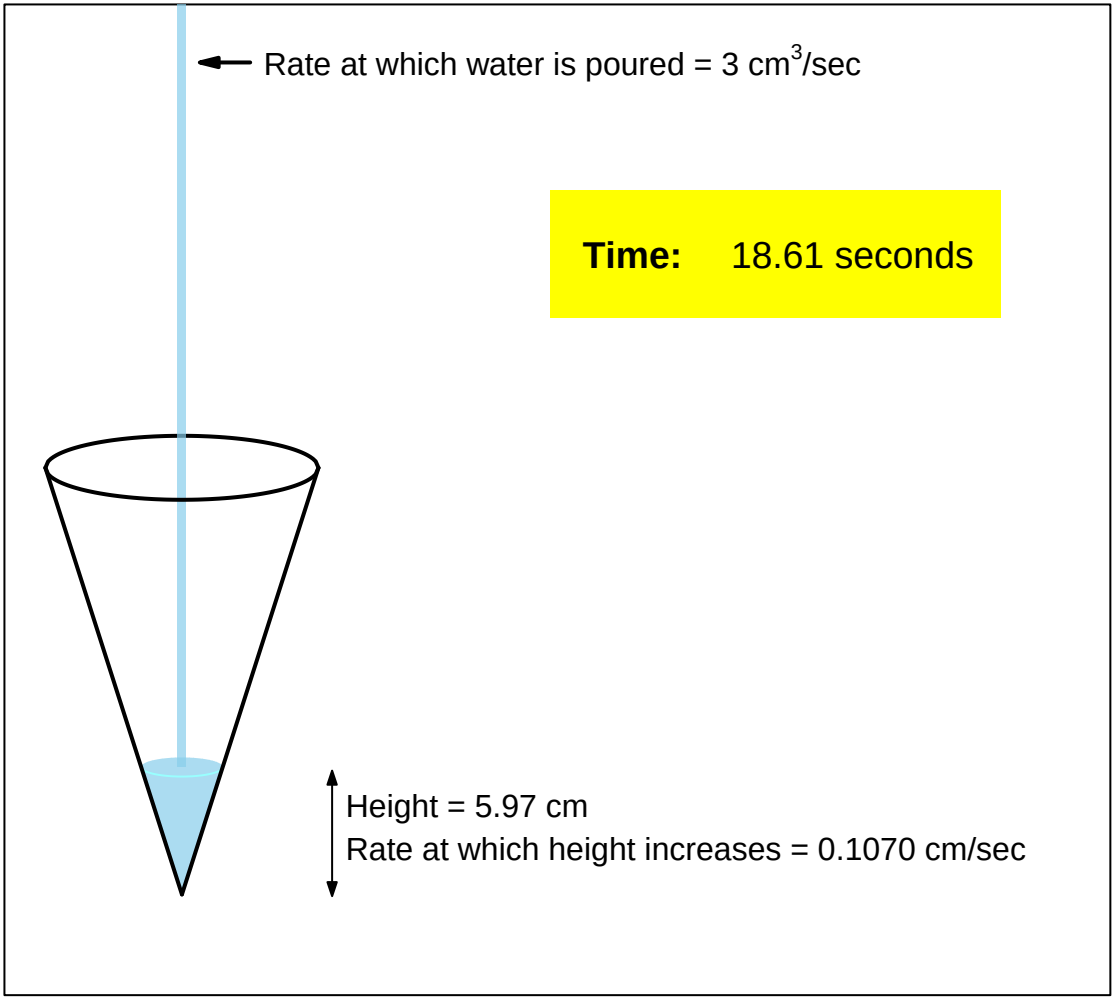
Rate at which height increases = 0.1076 cm/sec

Applications of Differentiation

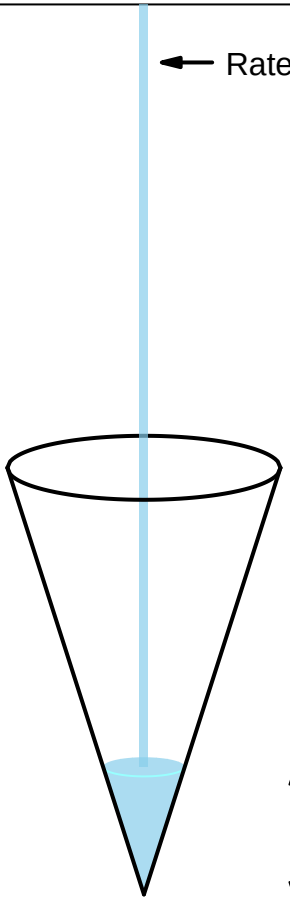


Time: 18.54 seconds

Applications of Differentiation



Applications of Differentiation



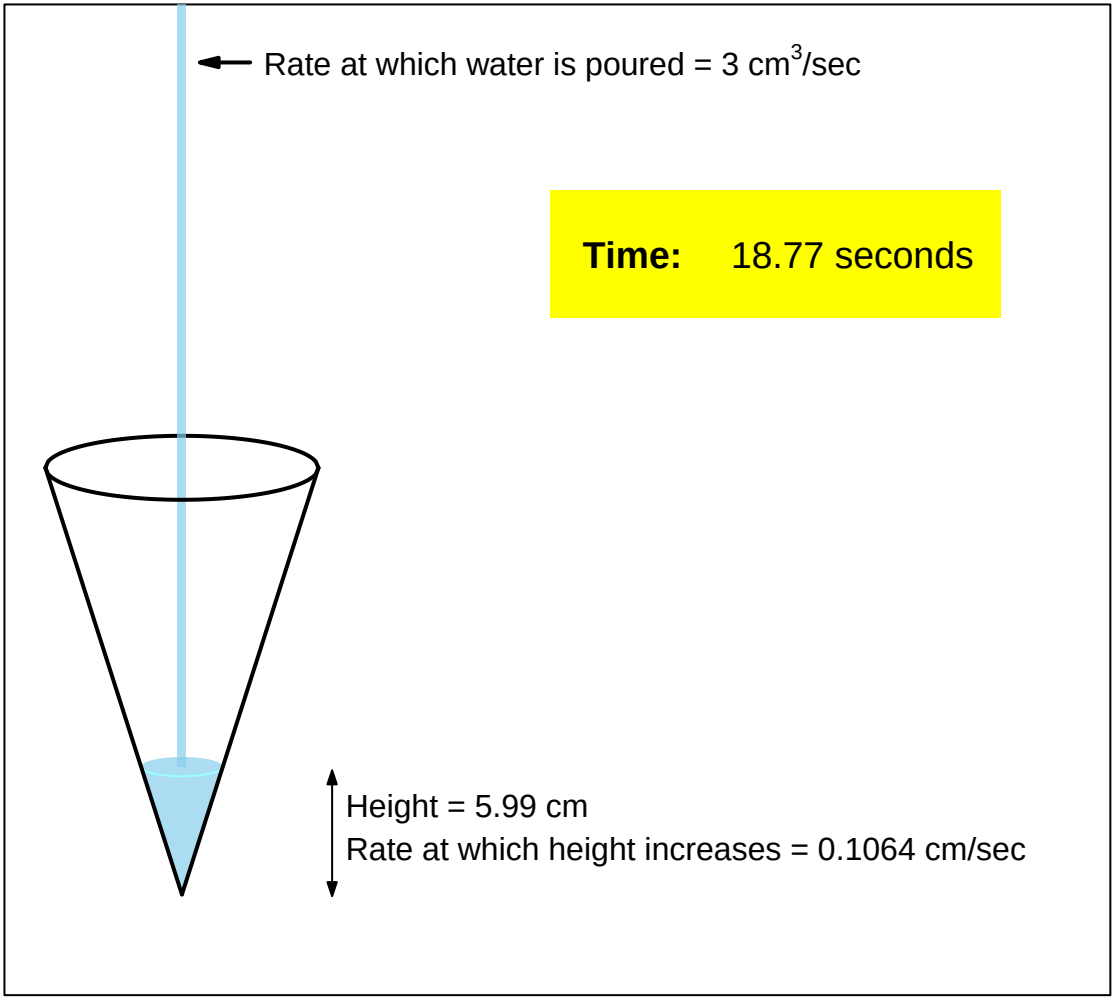
Rate at which water is poured = 3 cm^3/sec

Time: 18.69 seconds

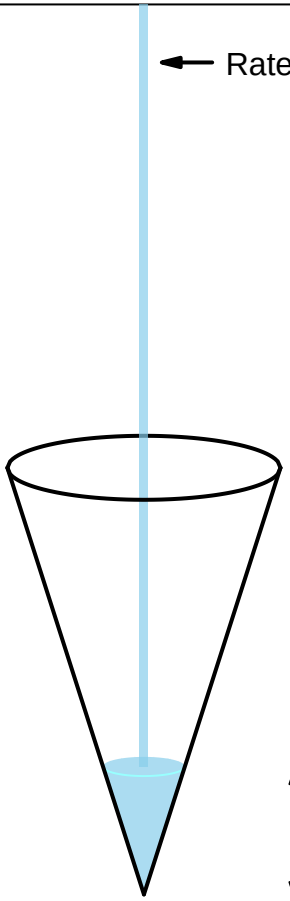
Height = 5.98 cm

Rate at which height increases = 0.1067 cm/sec

Applications of Differentiation



Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

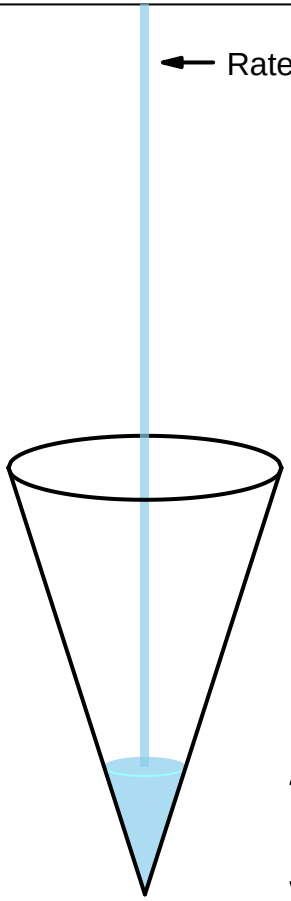
Time: 18.85 seconds

When the height reaches 6 cm, the speed at which height increases is exactly 1/3π cm/sec!

Height = 6.00 cm

Rate at which height increases = 0.1061 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

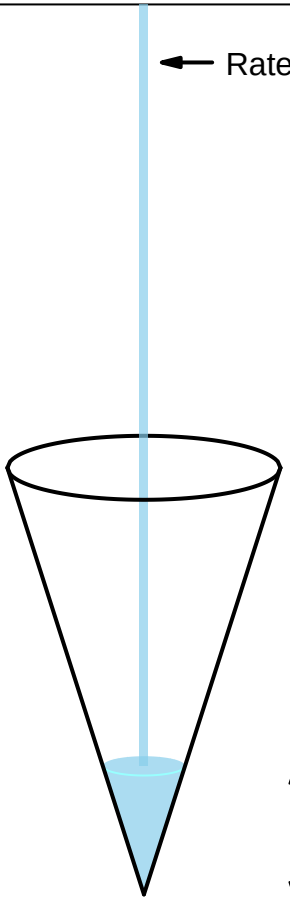
Time: 18.85 seconds

Question: How long does it take to fill up the container?

Height = 6.00 cm

Rate at which height increases = 0.1061 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

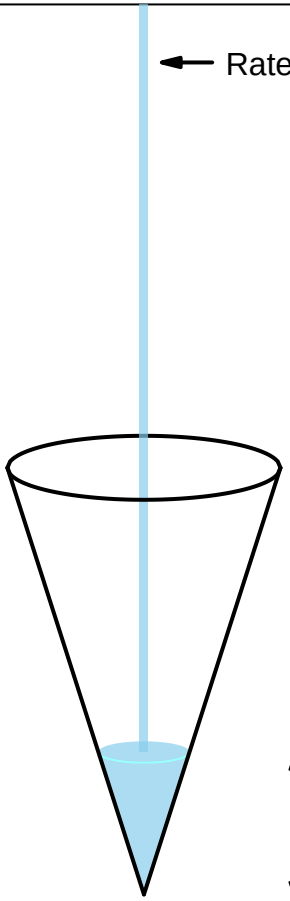
Time: 19.12 seconds

SPEED UP...

Height = 6.03 cm

Rate at which height increases = 0.1051 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

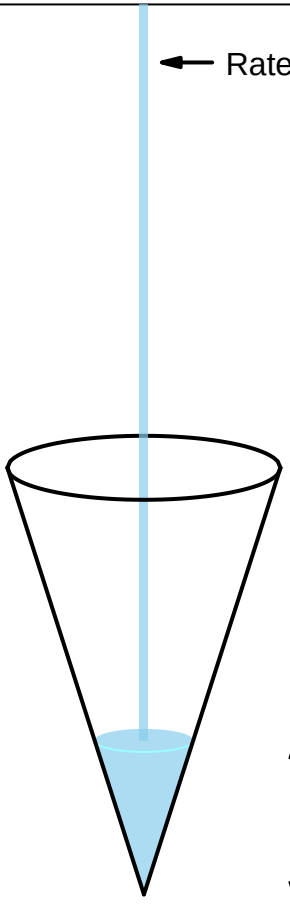
Time: 25.98 seconds

SPEED UP...

Height = 6.68 cm

Rate at which height increases = 0.0857 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

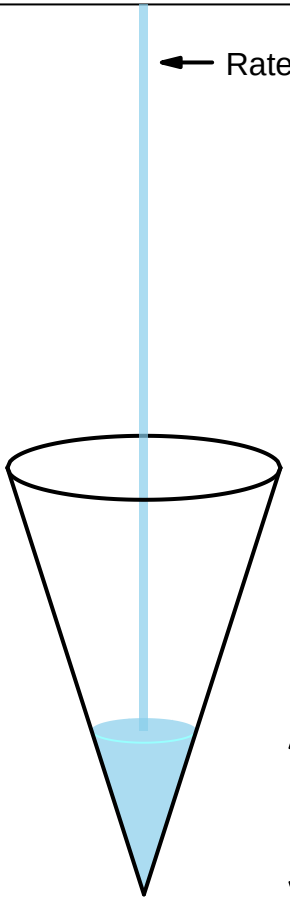
Time: 32.84 seconds

SPEED UP...

Height = 7.22 cm

Rate at which height increases = 0.0733 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

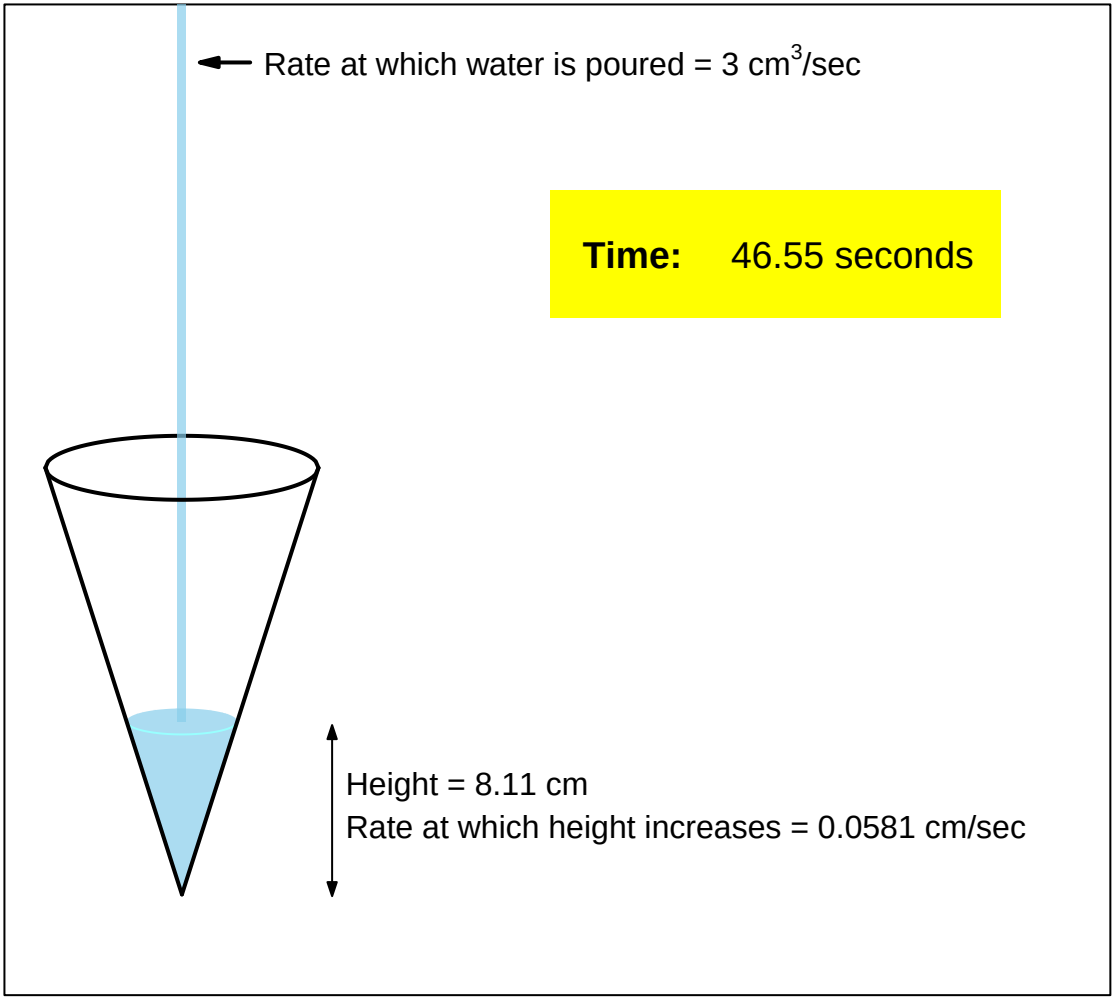
Time: 39.70 seconds

SPEED UP...

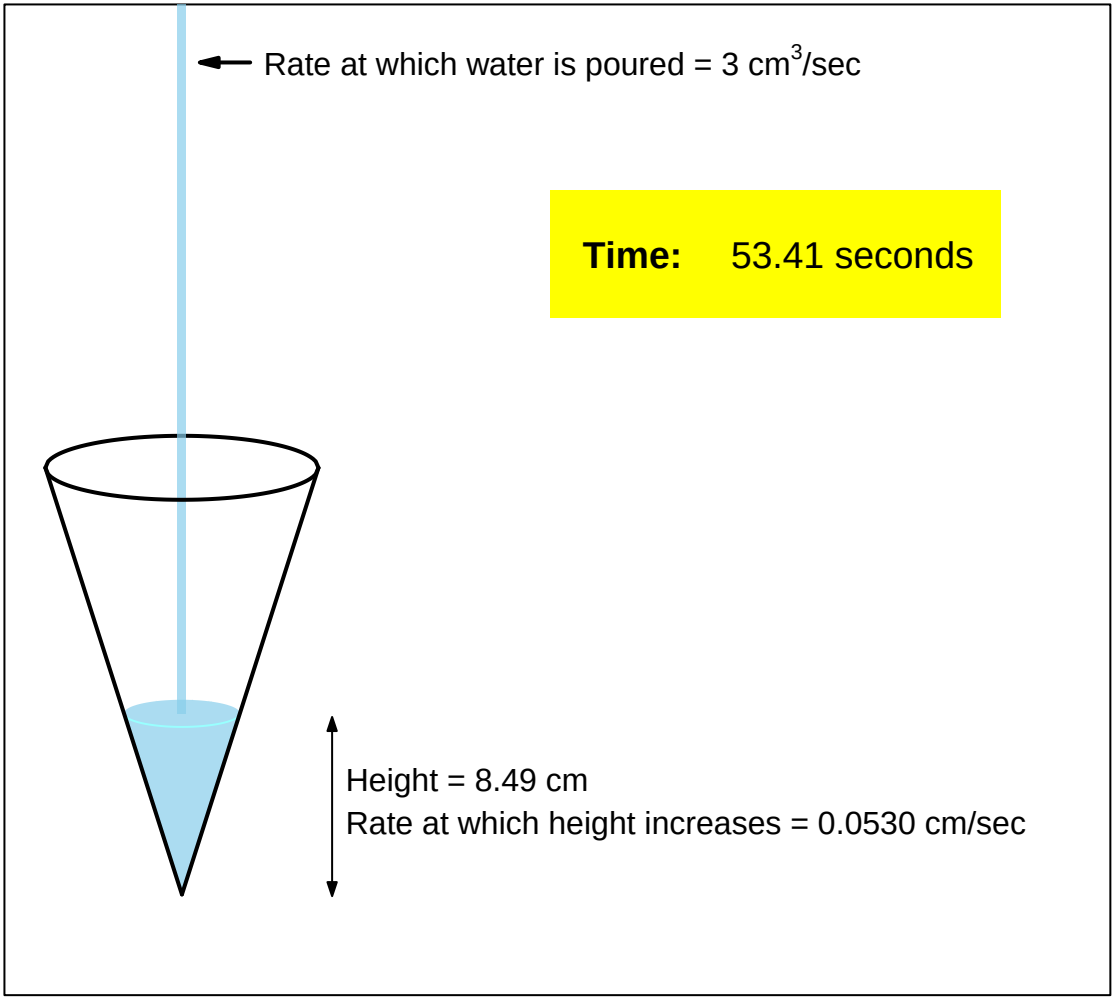
Height = 7.69 cm

Rate at which height increases = 0.0646 cm/sec

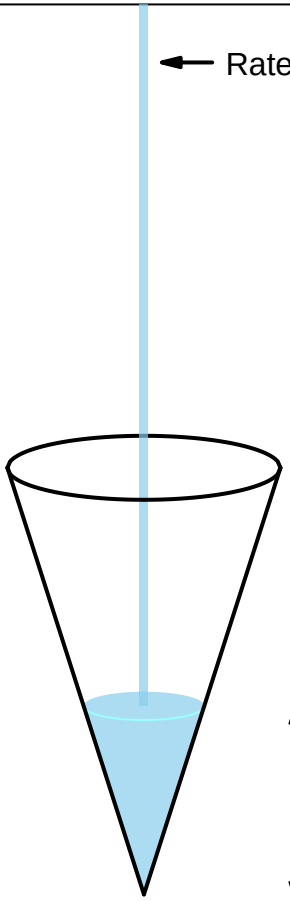
Applications of Differentiation



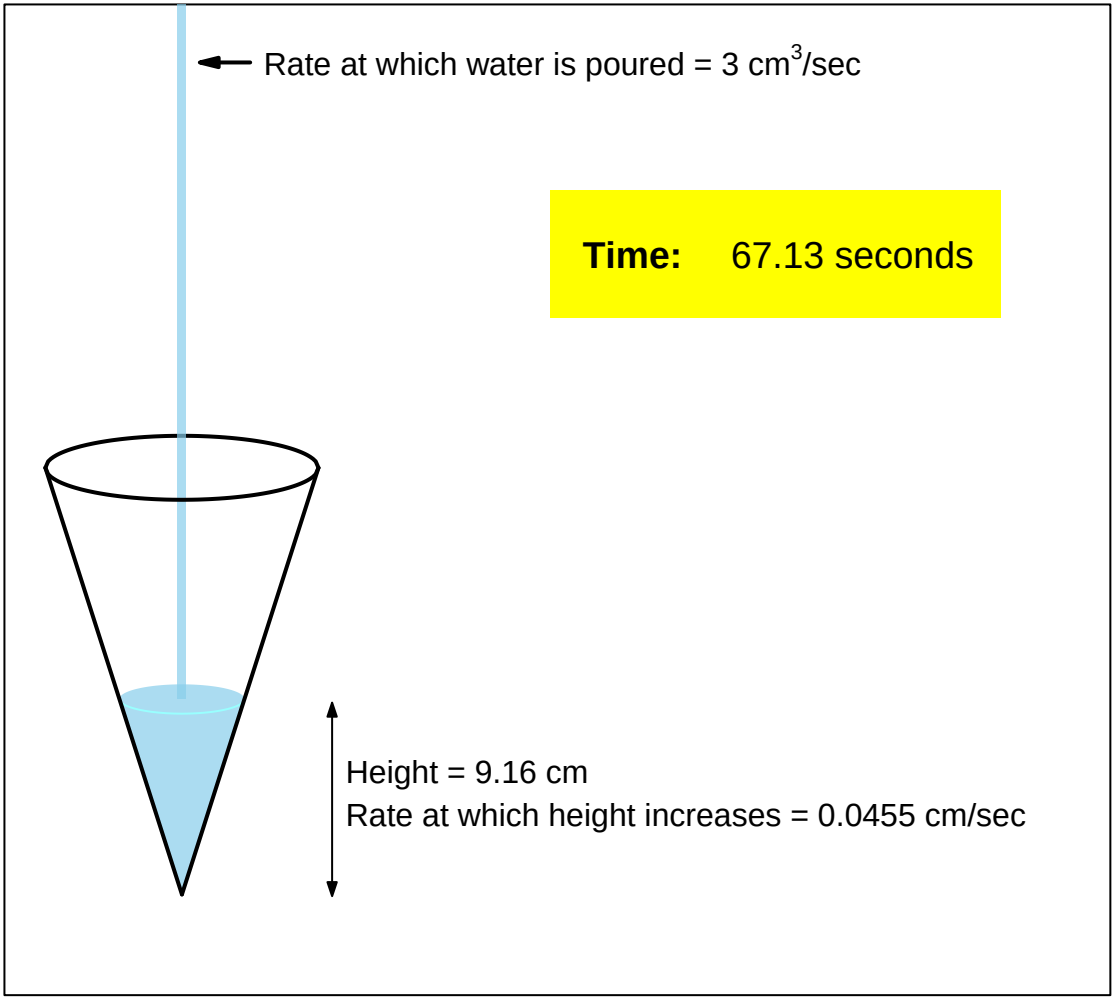
Applications of Differentiation



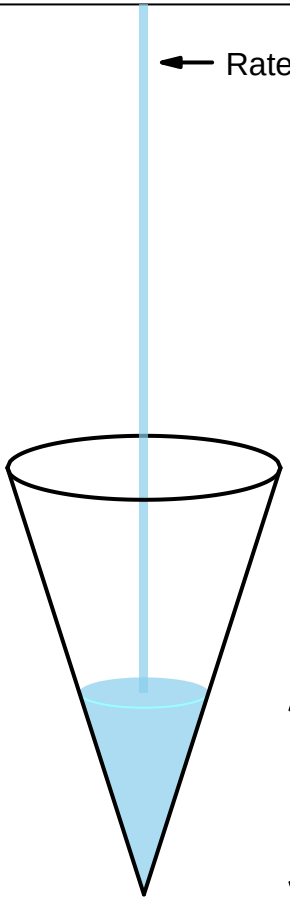
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

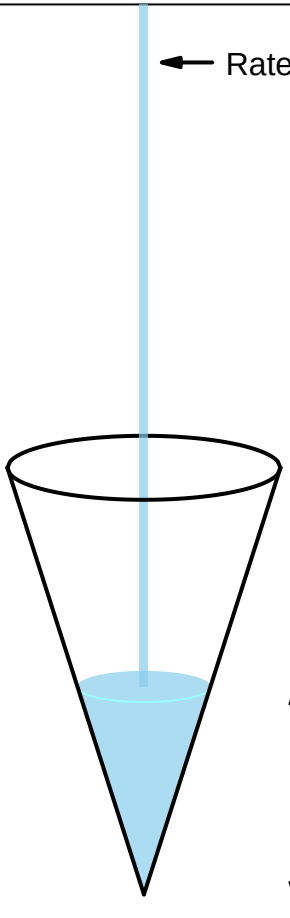
Time: 73.99 seconds

SPEED UP...

Height = 9.46 cm

Rate at which height increases = 0.0426 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

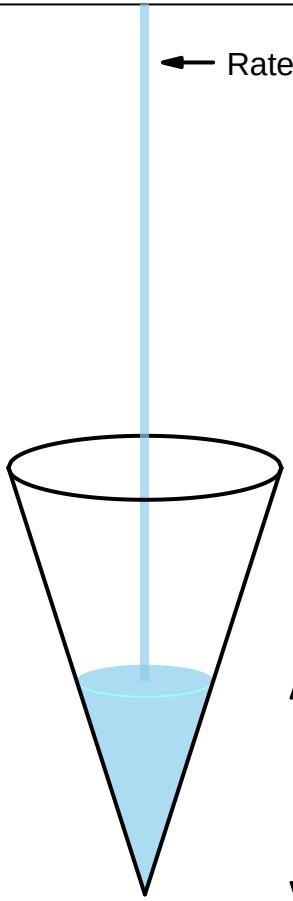
Time: 80.85 seconds

SPEED UP...

Height = 9.75 cm

Rate at which height increases = 0.0402 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

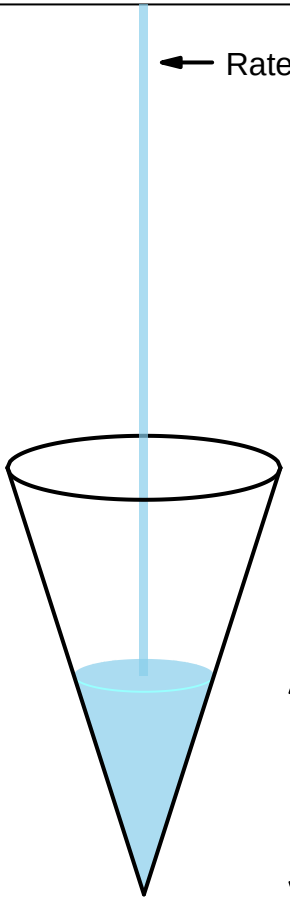
Time: 87.71 seconds

SPEED UP...

Height = 10.02 cm

Rate at which height increases = 0.0381 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

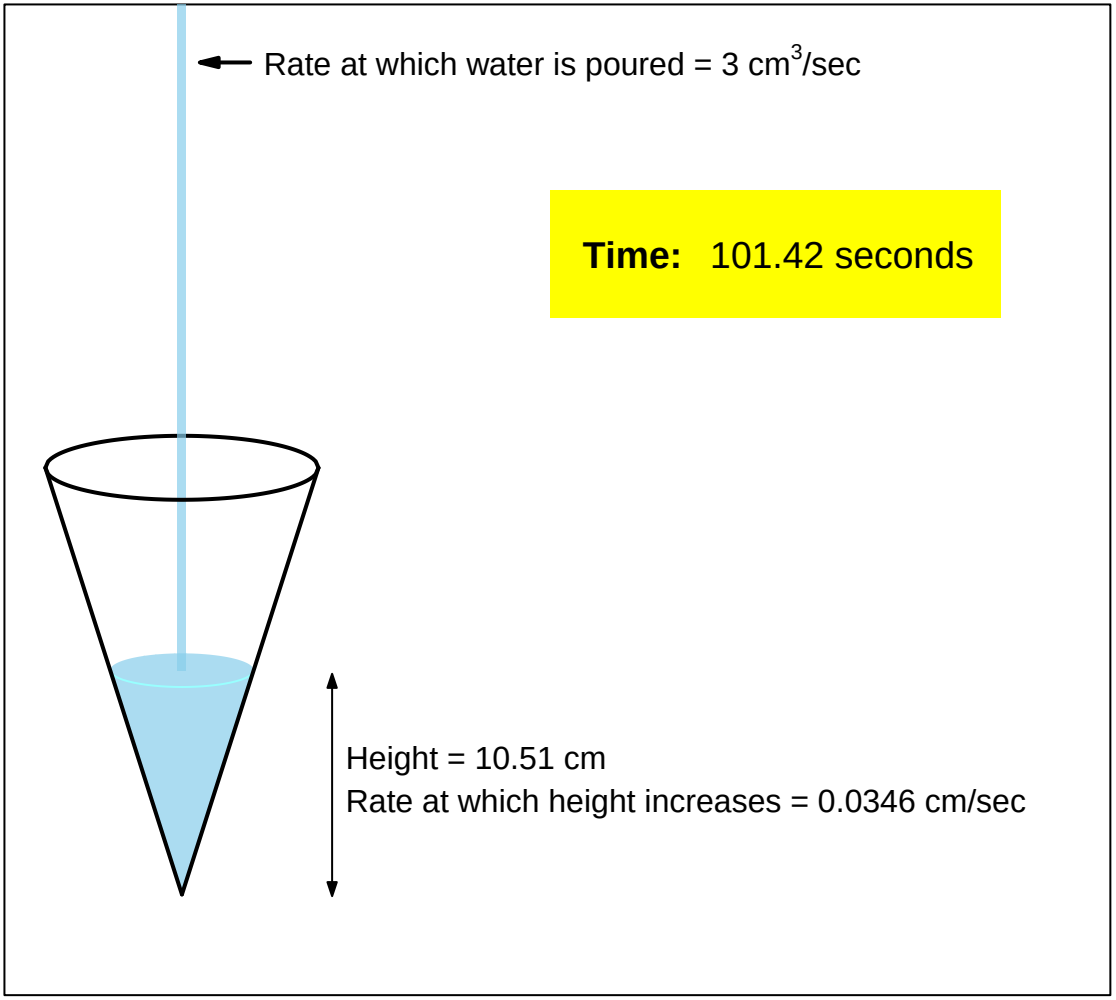
Time: 94.57 seconds

SPEED UP...

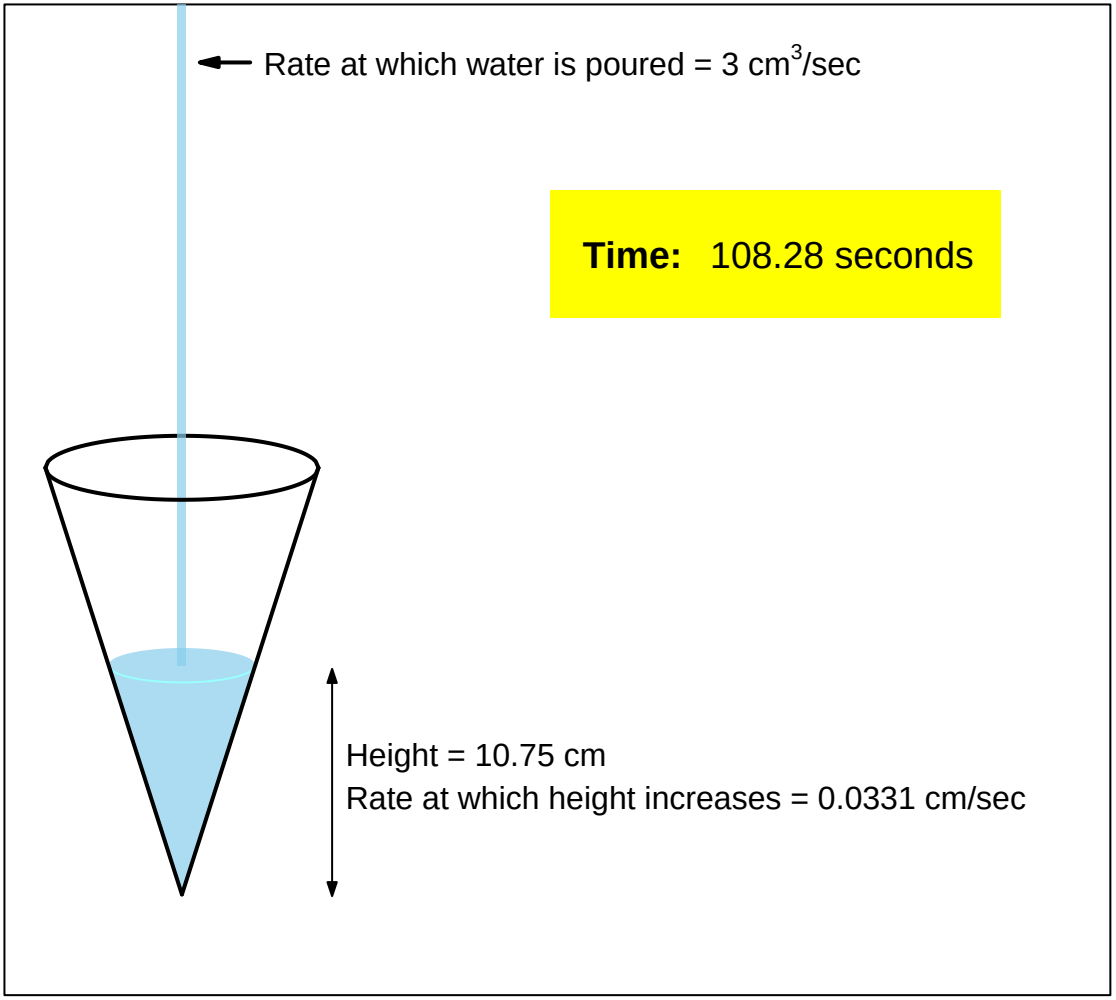
Height = 10.27 cm

Rate at which height increases = 0.0362 cm/sec

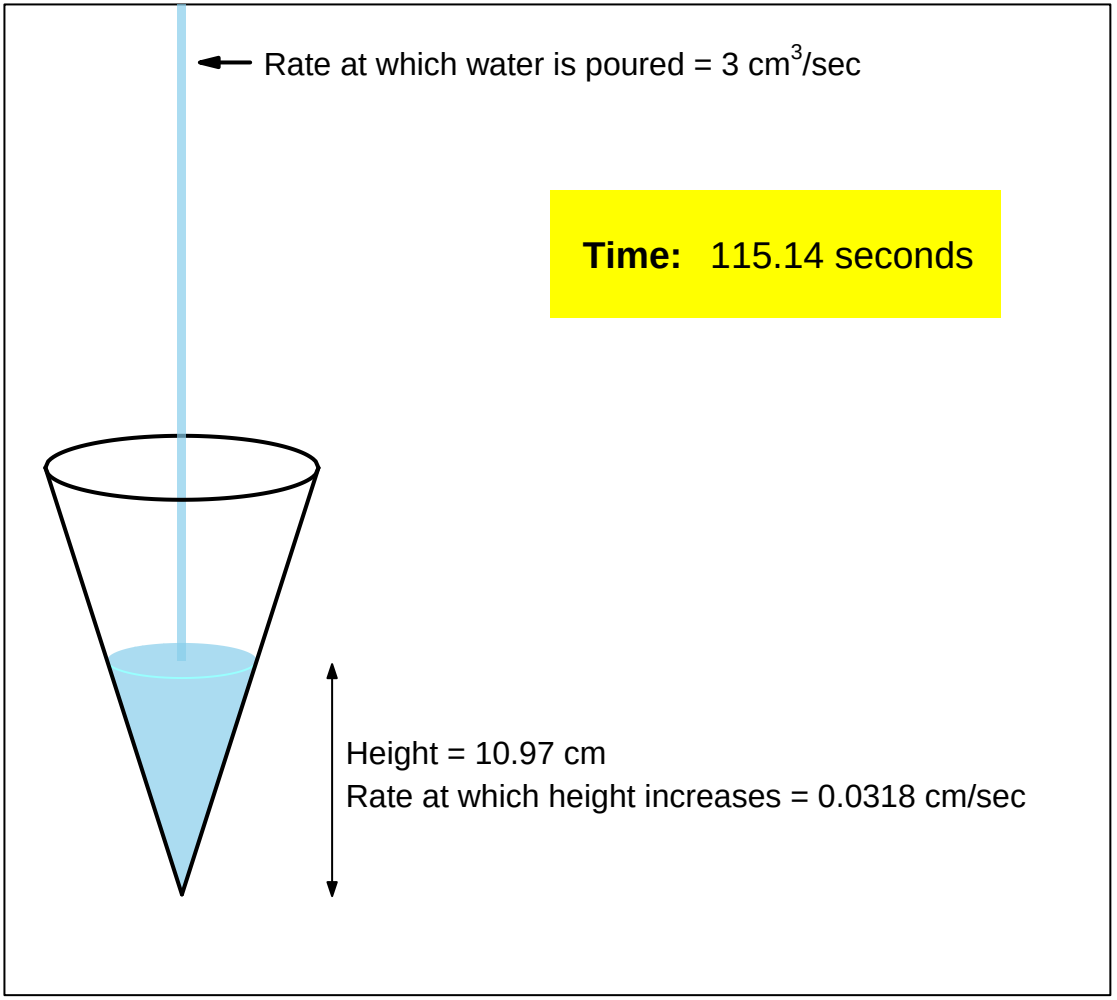
Applications of Differentiation



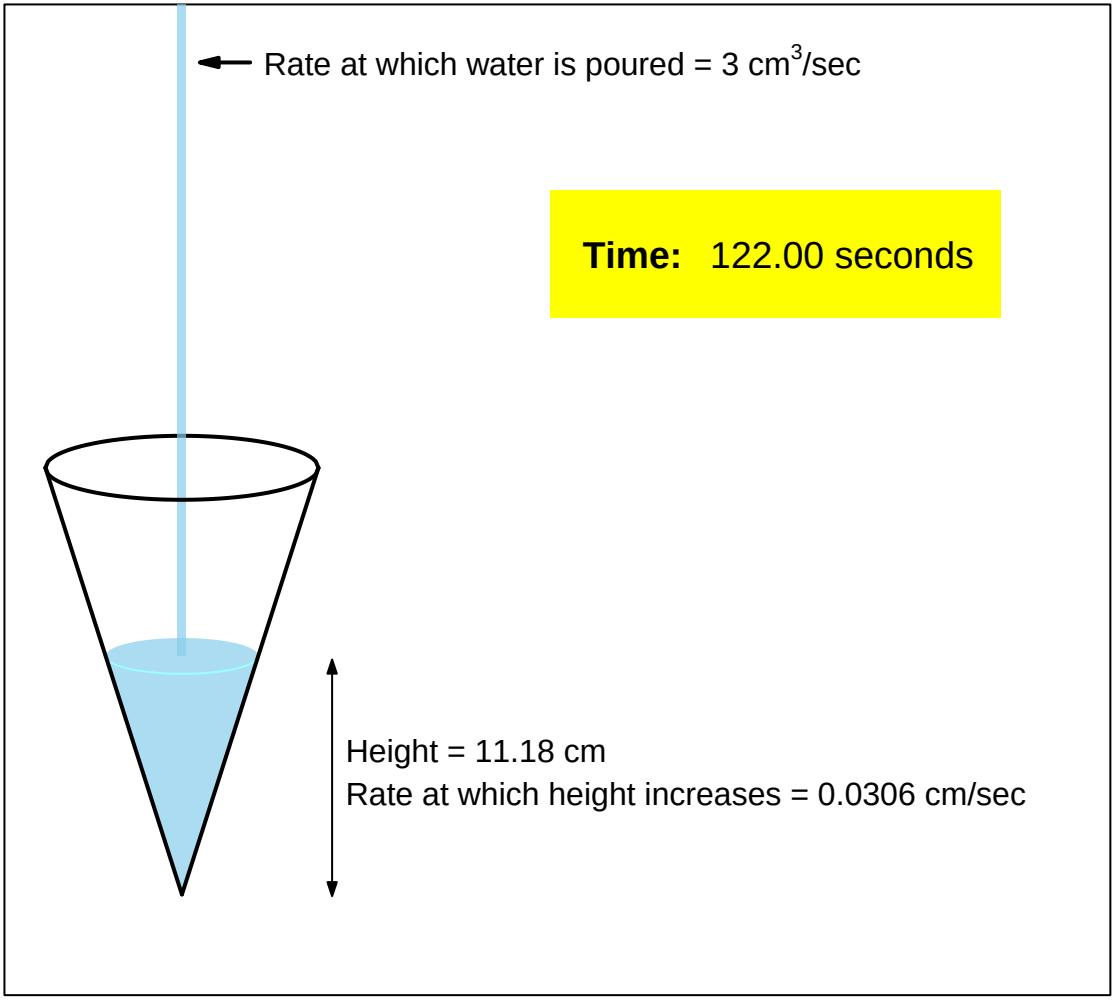
Applications of Differentiation



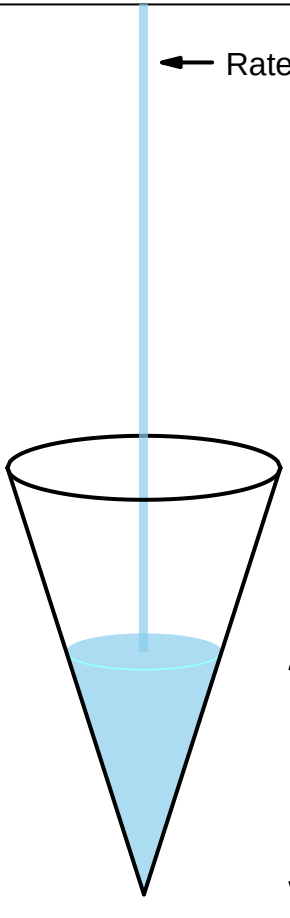
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

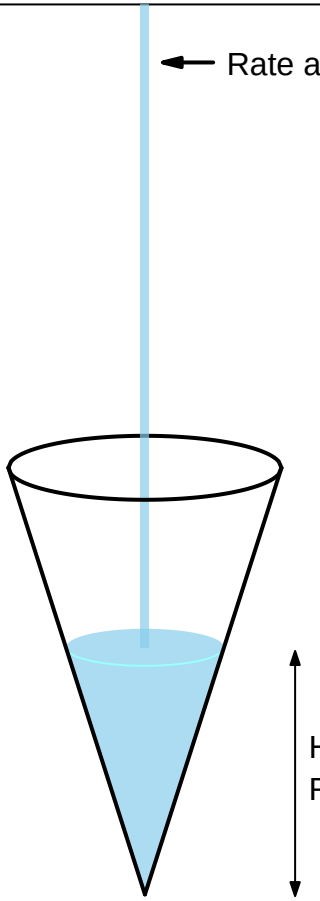
Time: 128.86 seconds

SPEED UP...

Height = 11.39 cm

Rate at which height increases = 0.0295 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

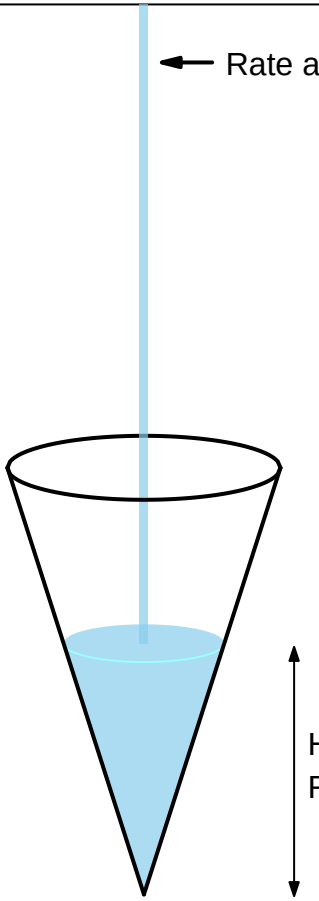
Time: 135.72 seconds

SPEED UP...

Height = 11.59 cm

Rate at which height increases = 0.0285 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

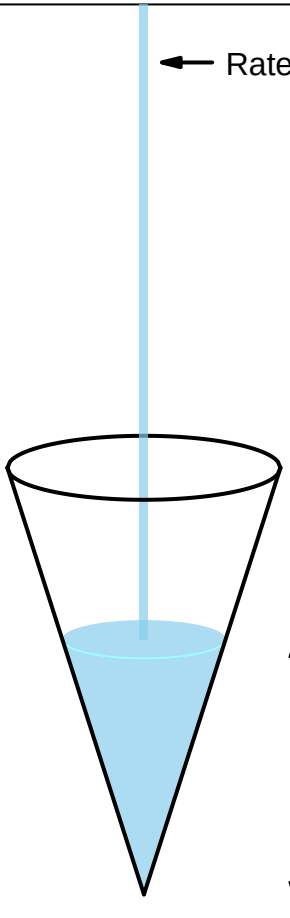
Time: 142.58 seconds

SPEED UP...

Height = 11.78 cm

Rate at which height increases = 0.0275 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

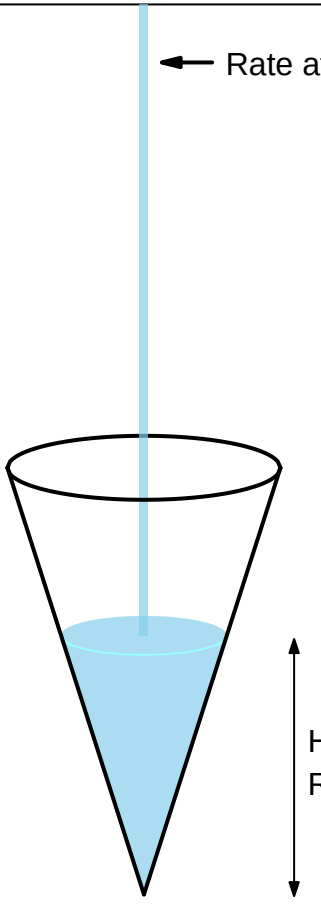
Time: 149.44 seconds

SPEED UP...

Height = 11.96 cm

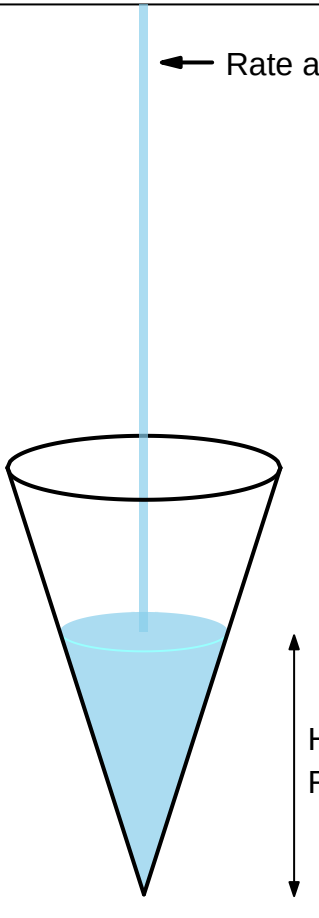
Rate at which height increases = 0.0267 cm/sec

Applications of Differentiation



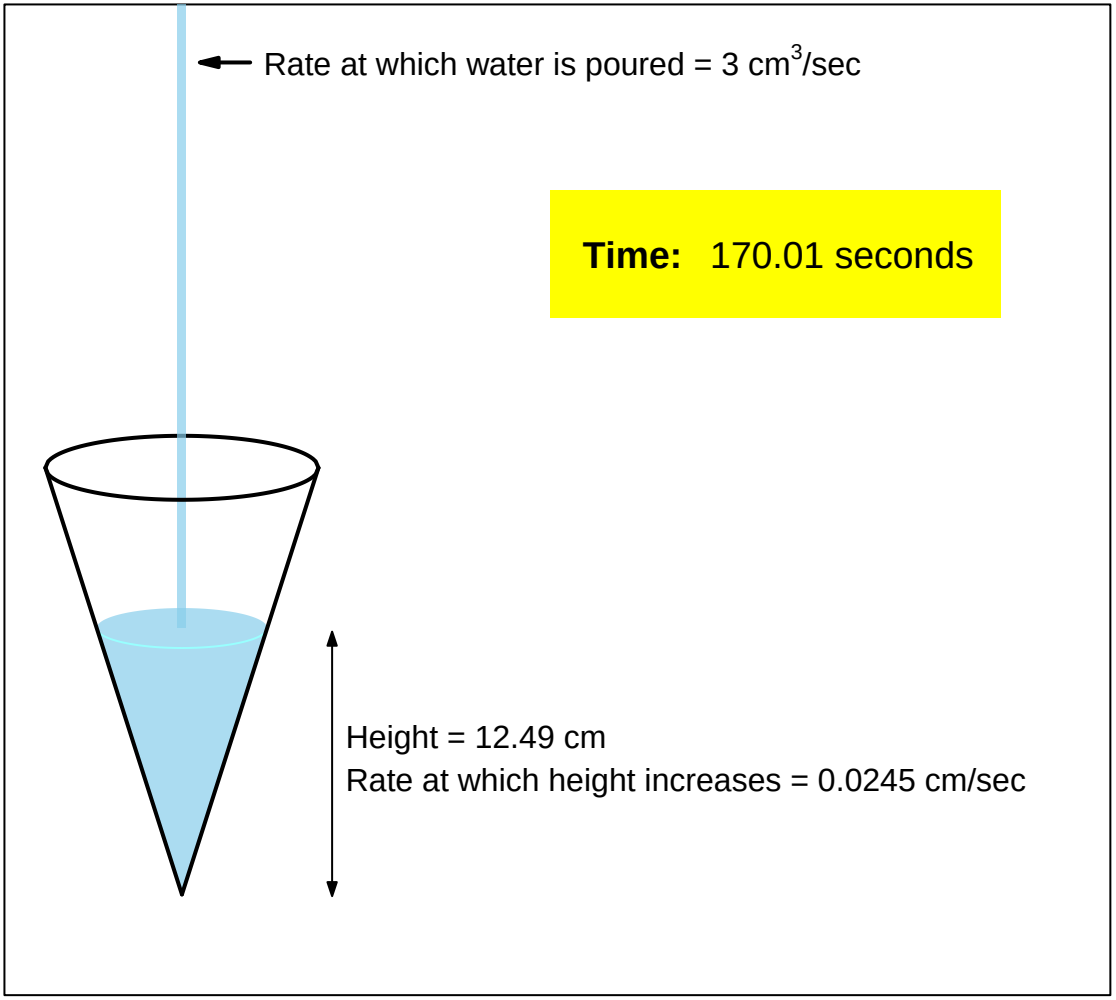
Time: 156.29 seconds

Applications of Differentiation

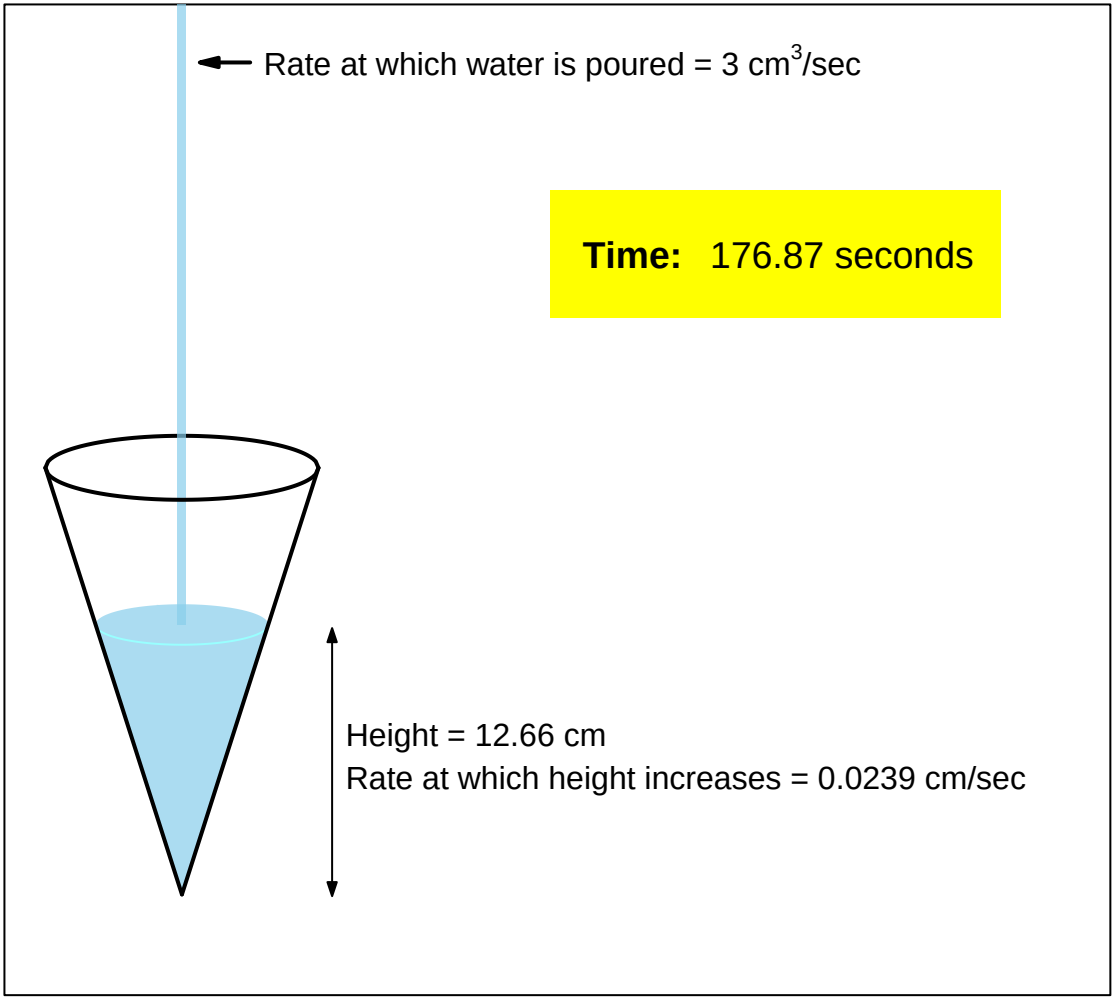


Time: 163.15 seconds

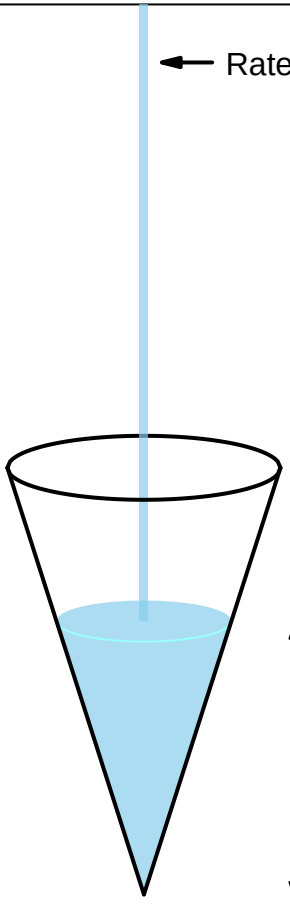
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

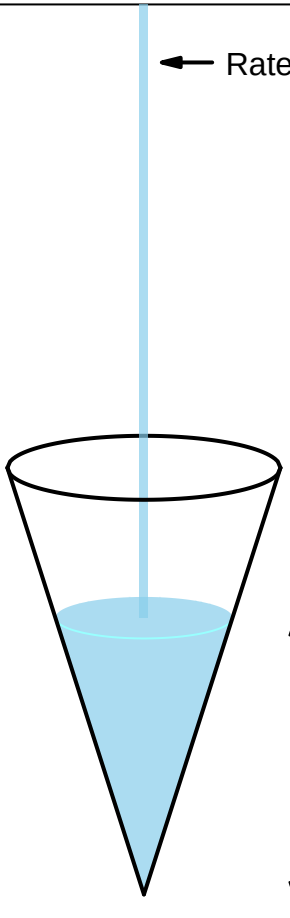
Time: 183.73 seconds

SPEED UP...

Height = 12.82 cm

Rate at which height increases = 0.0233 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

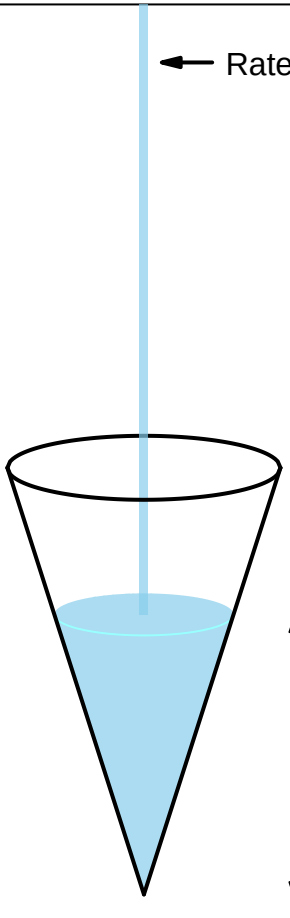
Time: 190.59 seconds

SPEED UP...

Height = 12.97 cm

Rate at which height increases = 0.0227 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

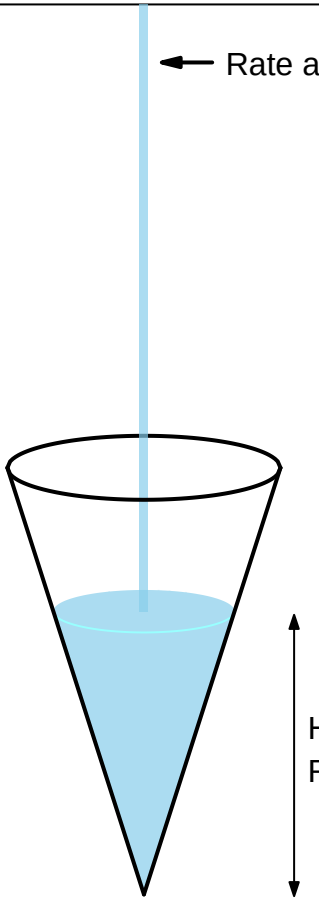
Time: 197.45 seconds

SPEED UP...

Height = 13.13 cm

Rate at which height increases = 0.0222 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

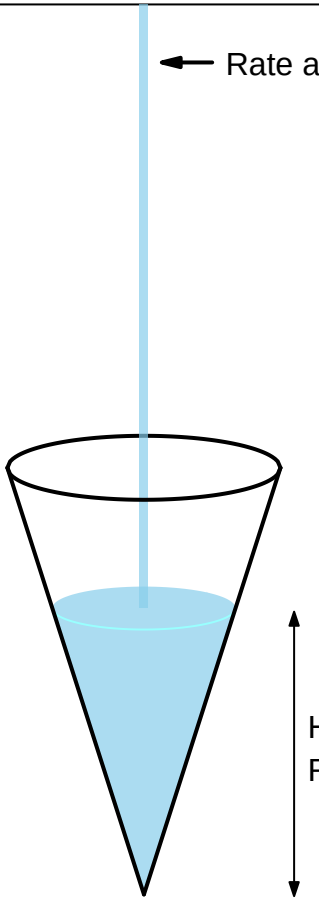
Time: 204.30 seconds

SPEED UP...

Height = 13.28 cm

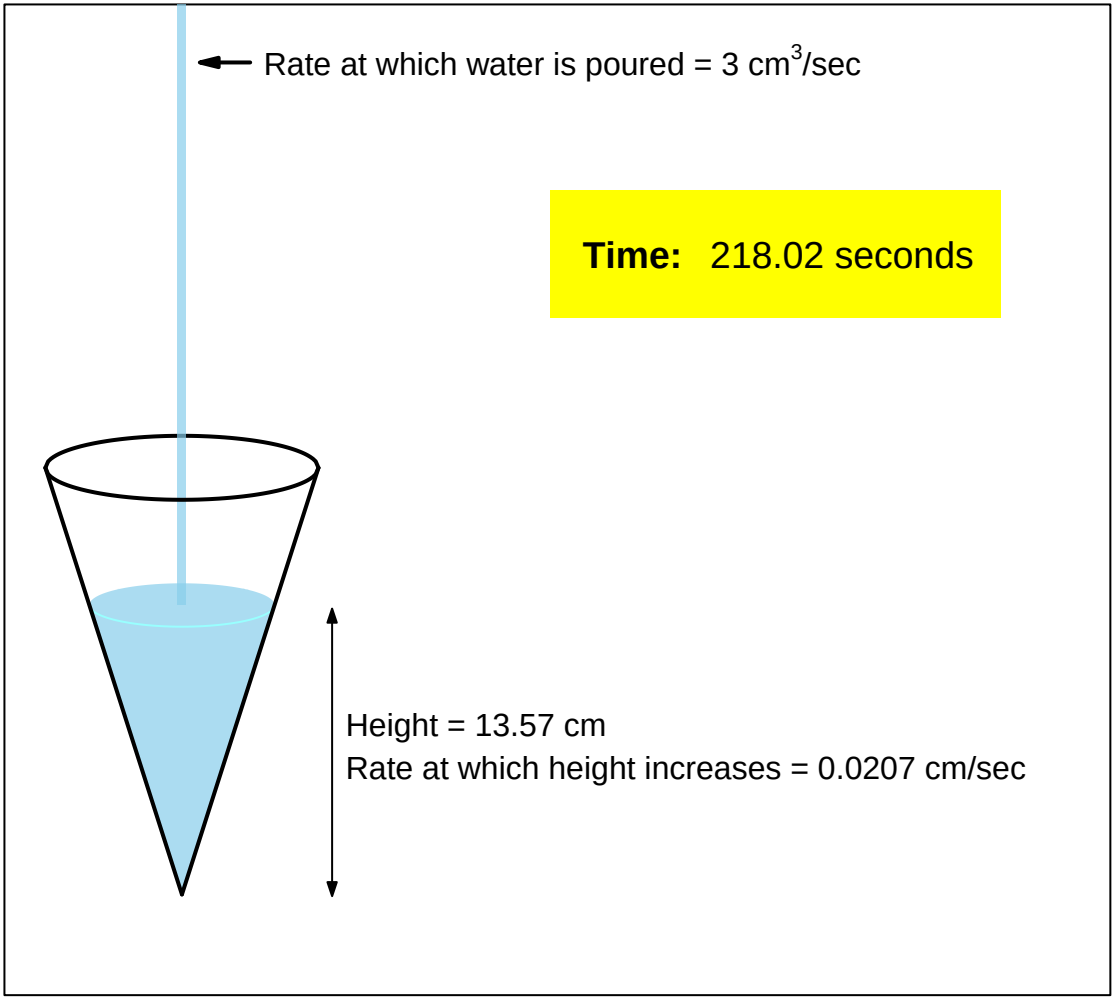
Rate at which height increases = 0.0217 cm/sec

Applications of Differentiation

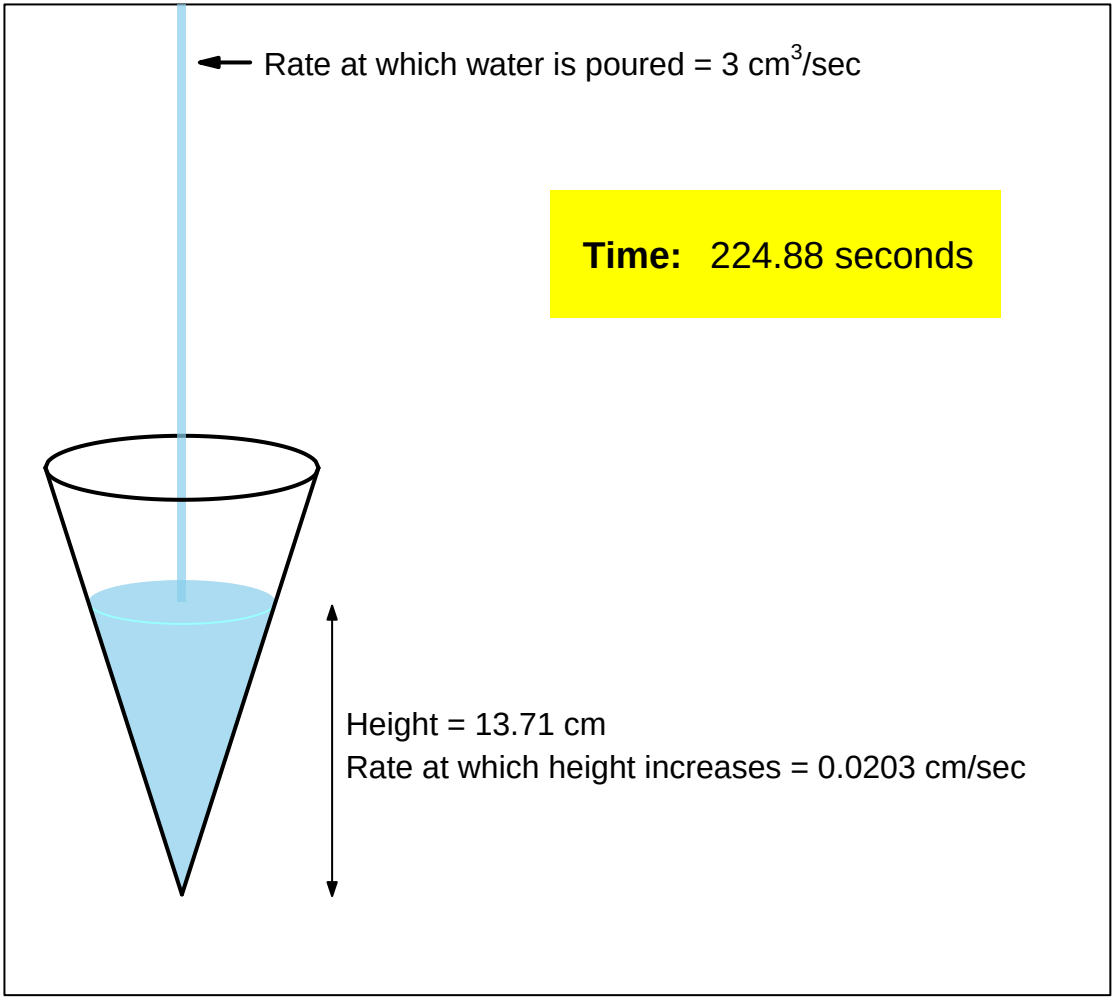


Time: 211.16 seconds

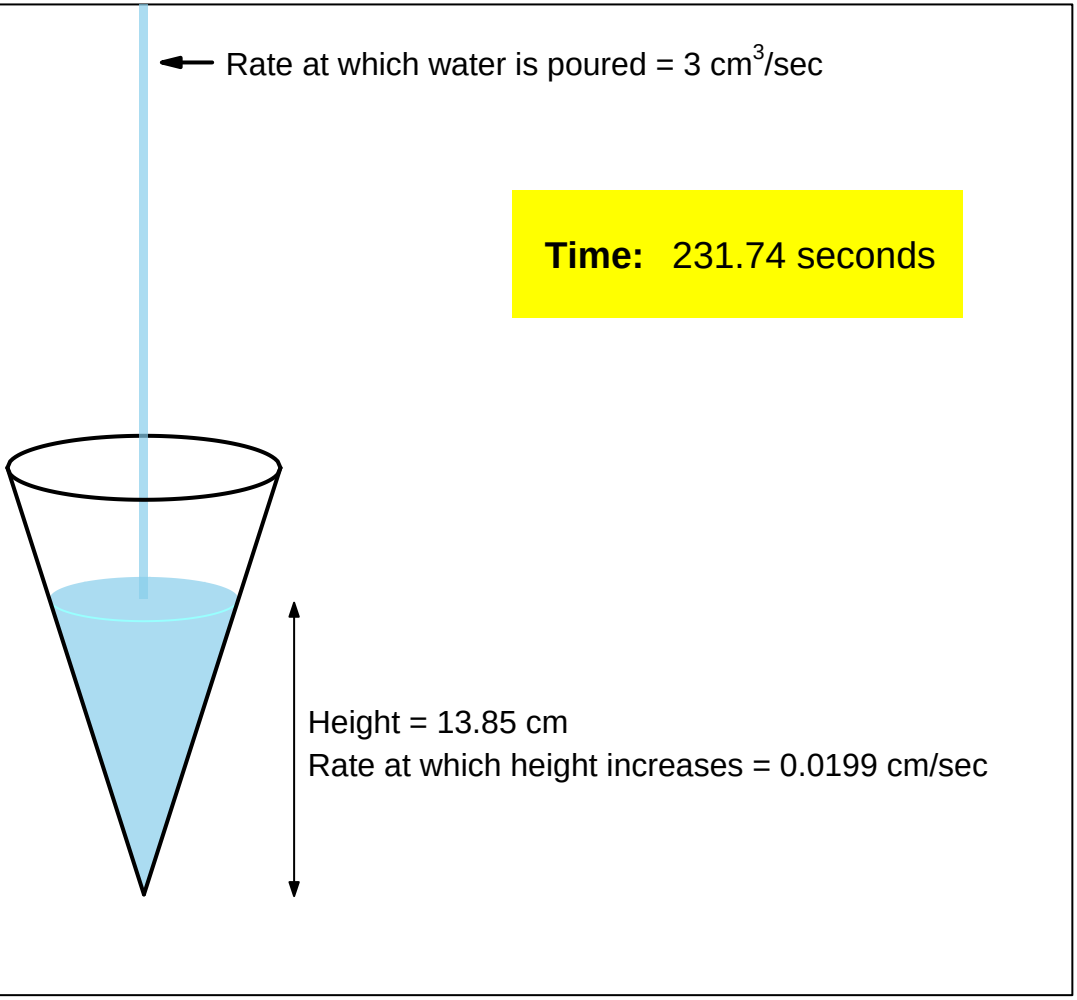
Applications of Differentiation



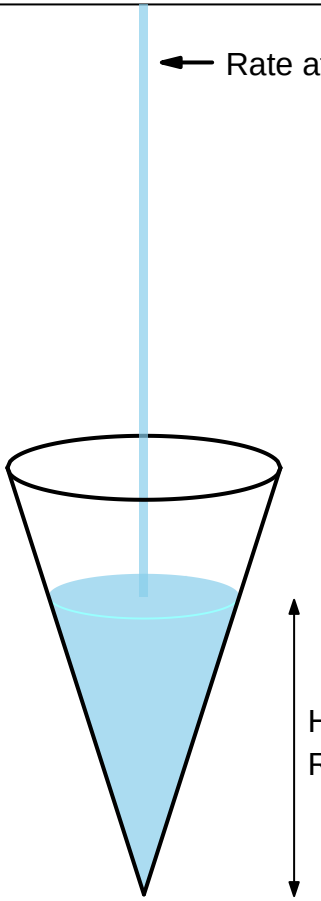
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

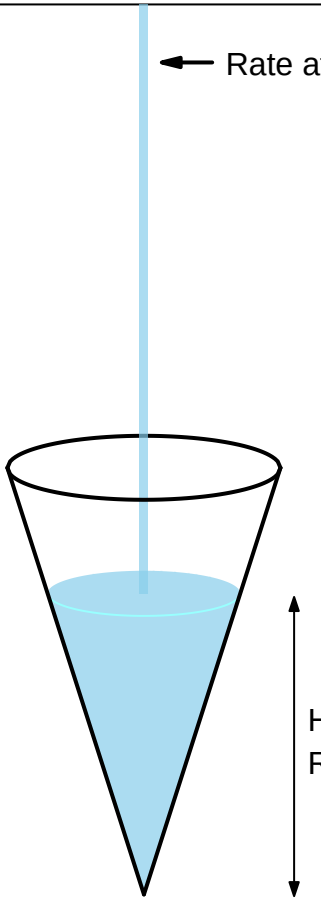
Time: 238.60 seconds

SPEED UP...

Height = 13.98 cm

Rate at which height increases = 0.0195 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

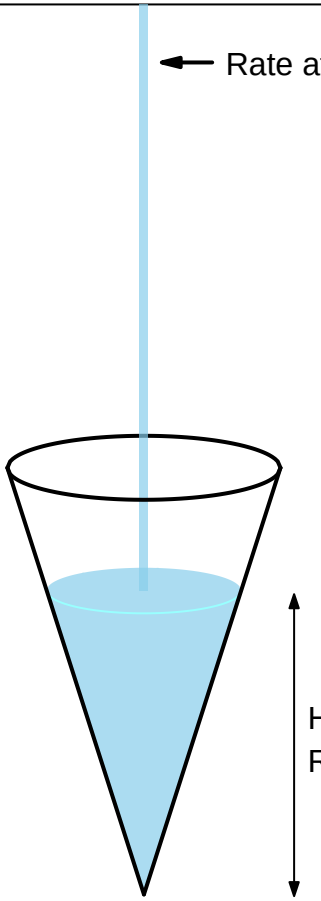
Time: 245.46 seconds

SPEED UP...

Height = 14.12 cm

Rate at which height increases = 0.0192 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

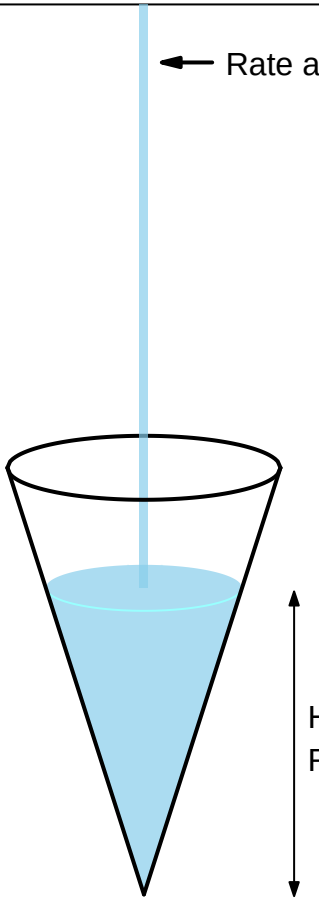
Time: 252.32 seconds

SPEED UP...

Height = 14.25 cm

Rate at which height increases = 0.0188 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

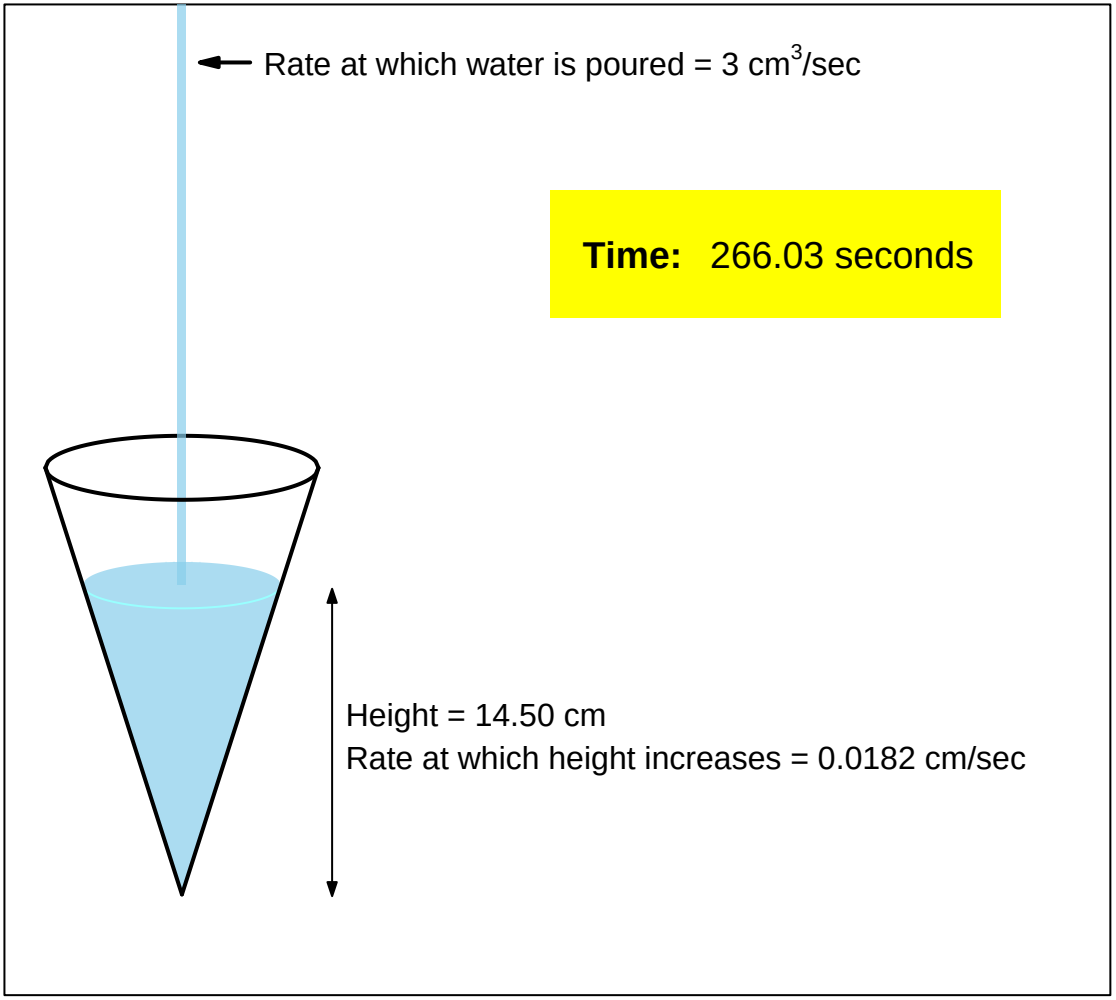
Time: 259.17 seconds

SPEED UP...

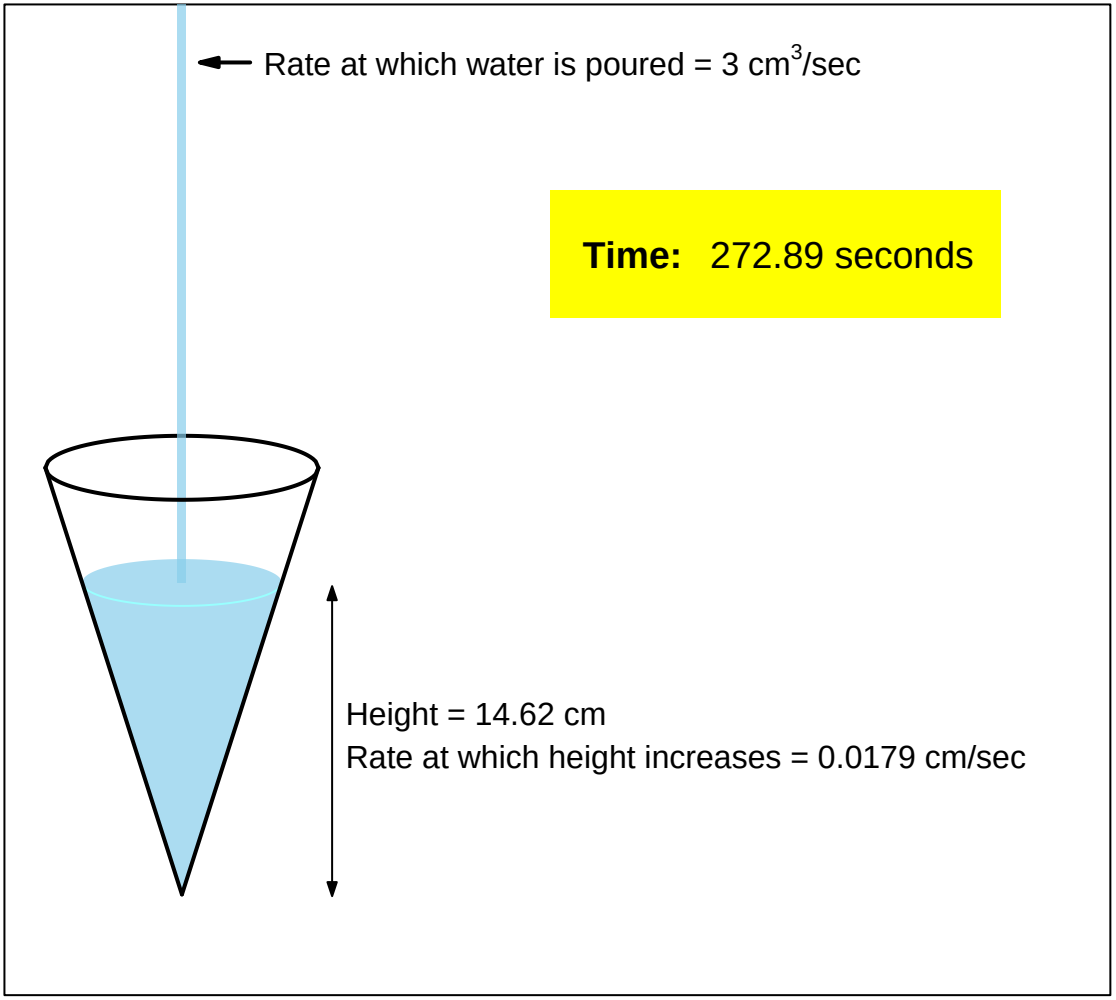
Height = 14.37 cm

Rate at which height increases = 0.0185 cm/sec

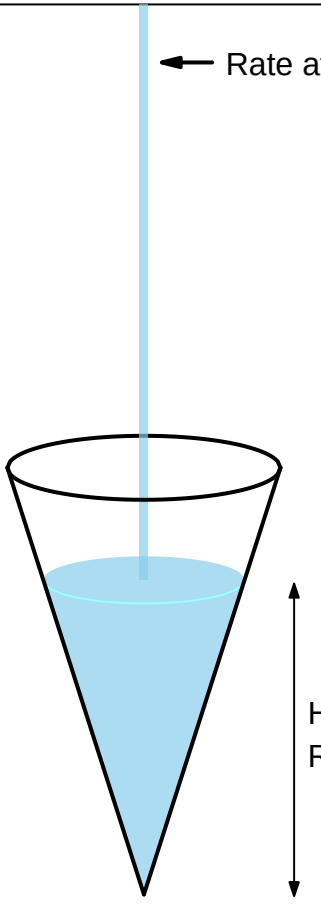
Applications of Differentiation



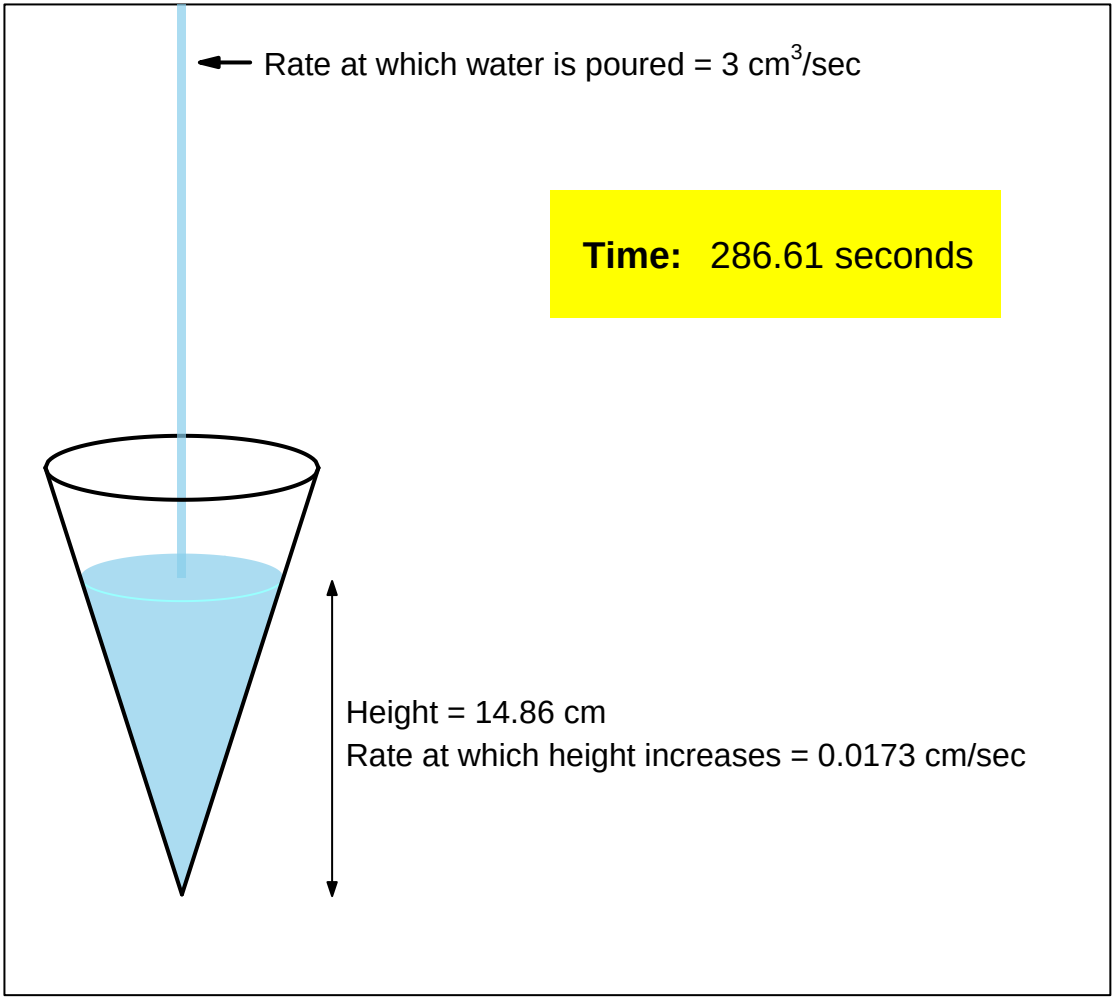
Applications of Differentiation



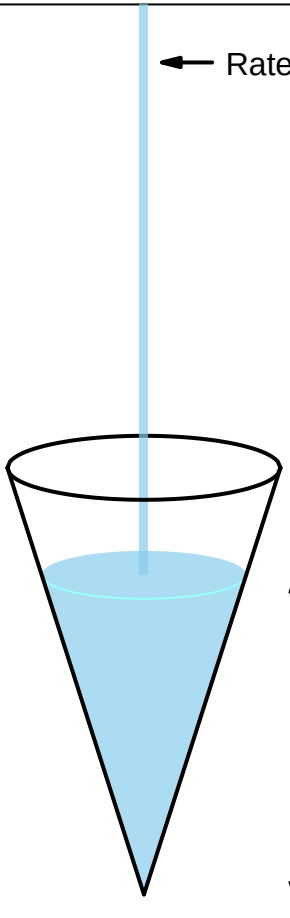
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

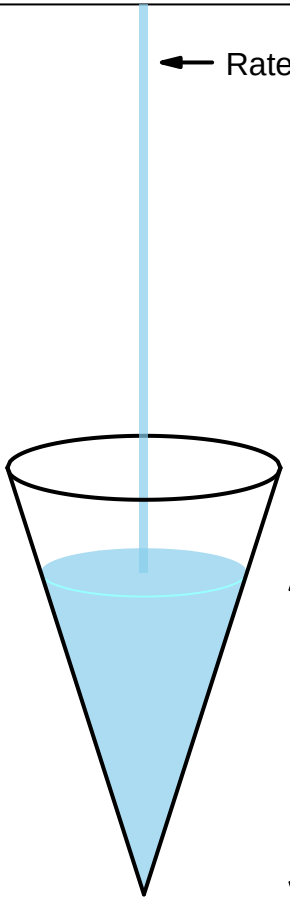
Time: 293.47 seconds

SPEED UP...

Height = 14.98 cm

Rate at which height increases = 0.0170 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

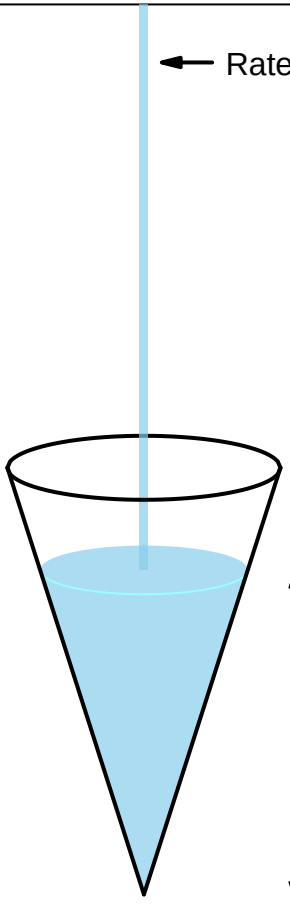
Time: 300.33 seconds

SPEED UP...

Height = 15.10 cm

Rate at which height increases = 0.0168 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

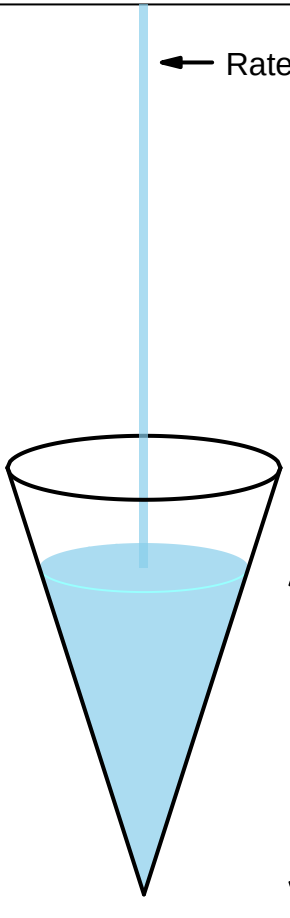
Time: 307.18 seconds

SPEED UP...

Height = 15.21 cm

Rate at which height increases = 0.0165 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

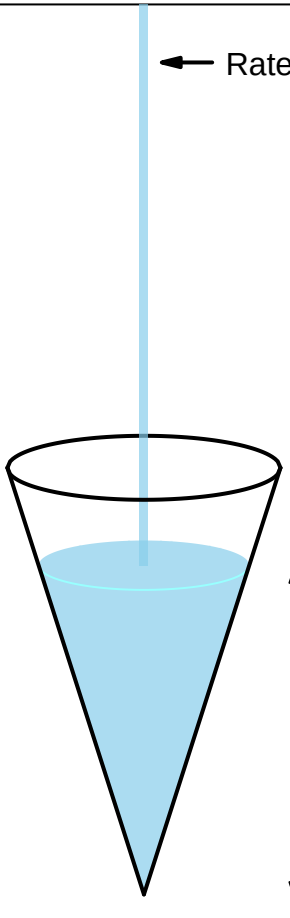
Time: 314.04 seconds

SPEED UP...

Height = 15.32 cm

Rate at which height increases = 0.0163 cm/sec

Applications of Differentiation



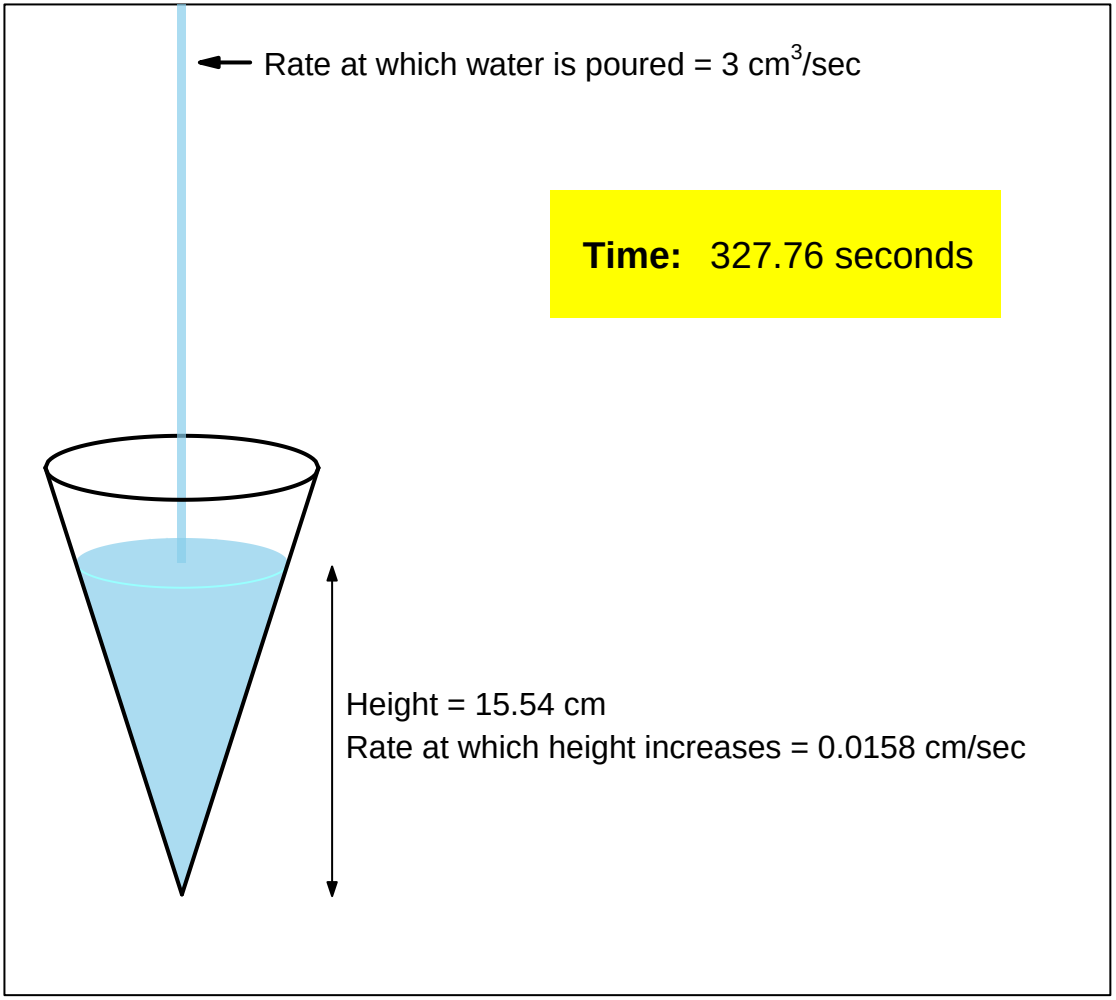
Rate at which water is poured = 3 cm^3/sec

Time: 320.90 seconds

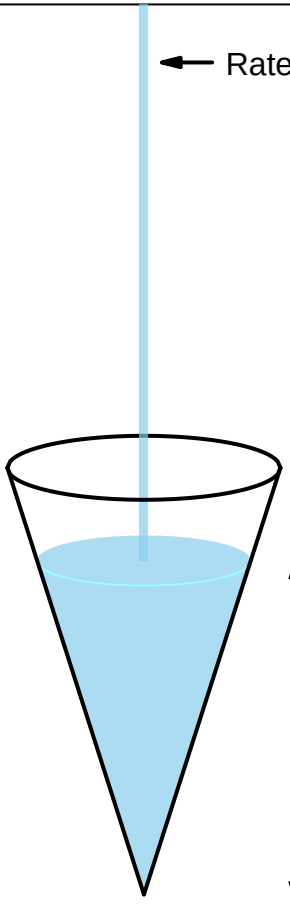
Height = 15.44 cm

Rate at which height increases = 0.0160 cm/sec

Applications of Differentiation

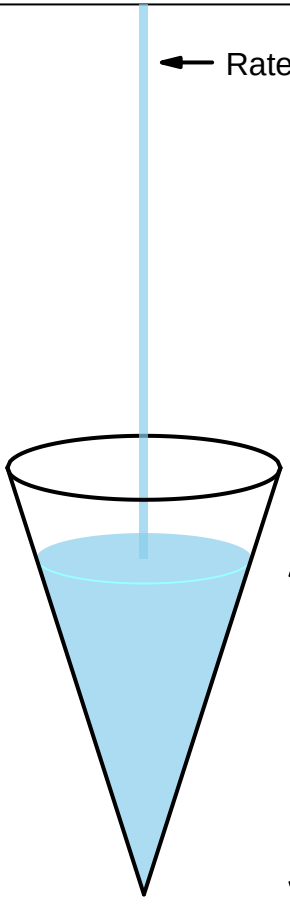


Applications of Differentiation

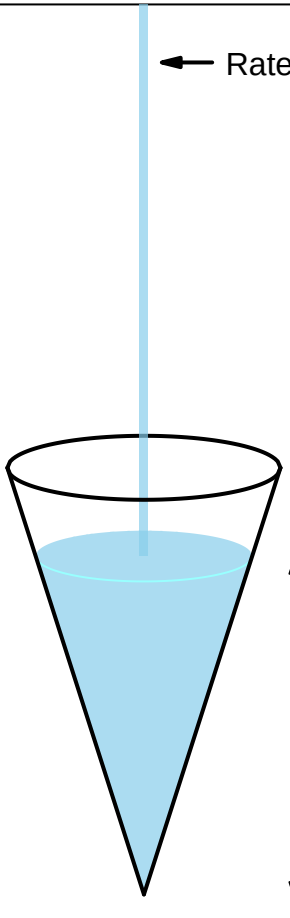


Time: 334.62 seconds

Applications of Differentiation



Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

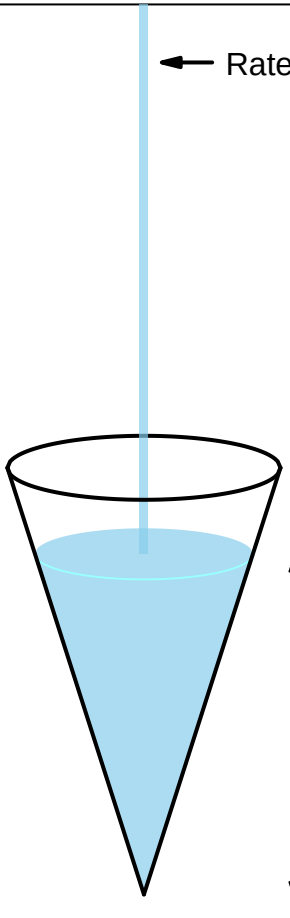
Time: 348.34 seconds

SPEED UP...

Height = 15.86 cm

Rate at which height increases = 0.0152 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

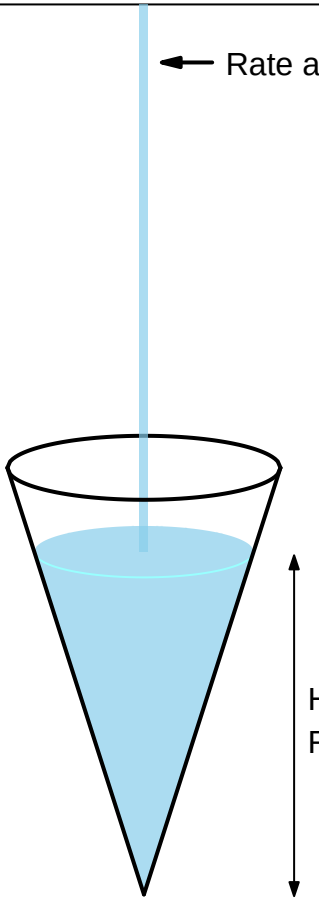
Time: 355.20 seconds

SPEED UP...

Height = 15.97 cm

Rate at which height increases = 0.0150 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

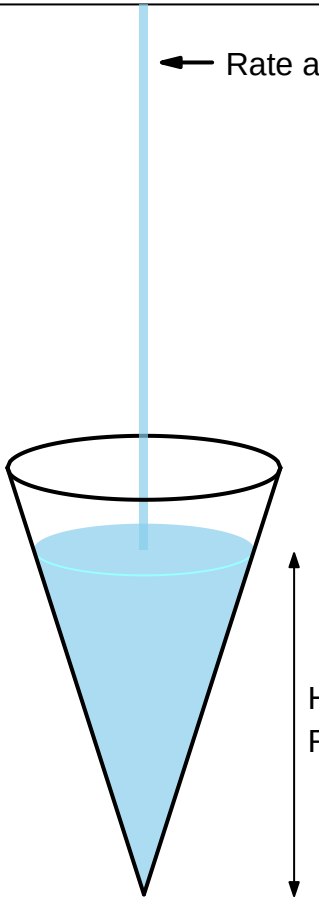
Time: 362.05 seconds

SPEED UP...

Height = 16.07 cm

Rate at which height increases = 0.0148 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

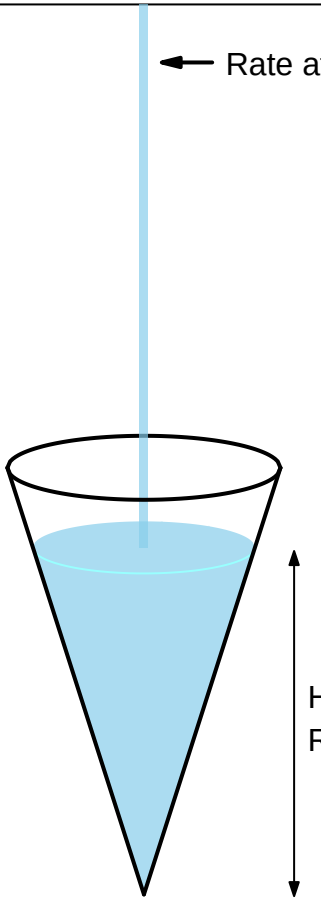
Time: 368.91 seconds

SPEED UP...

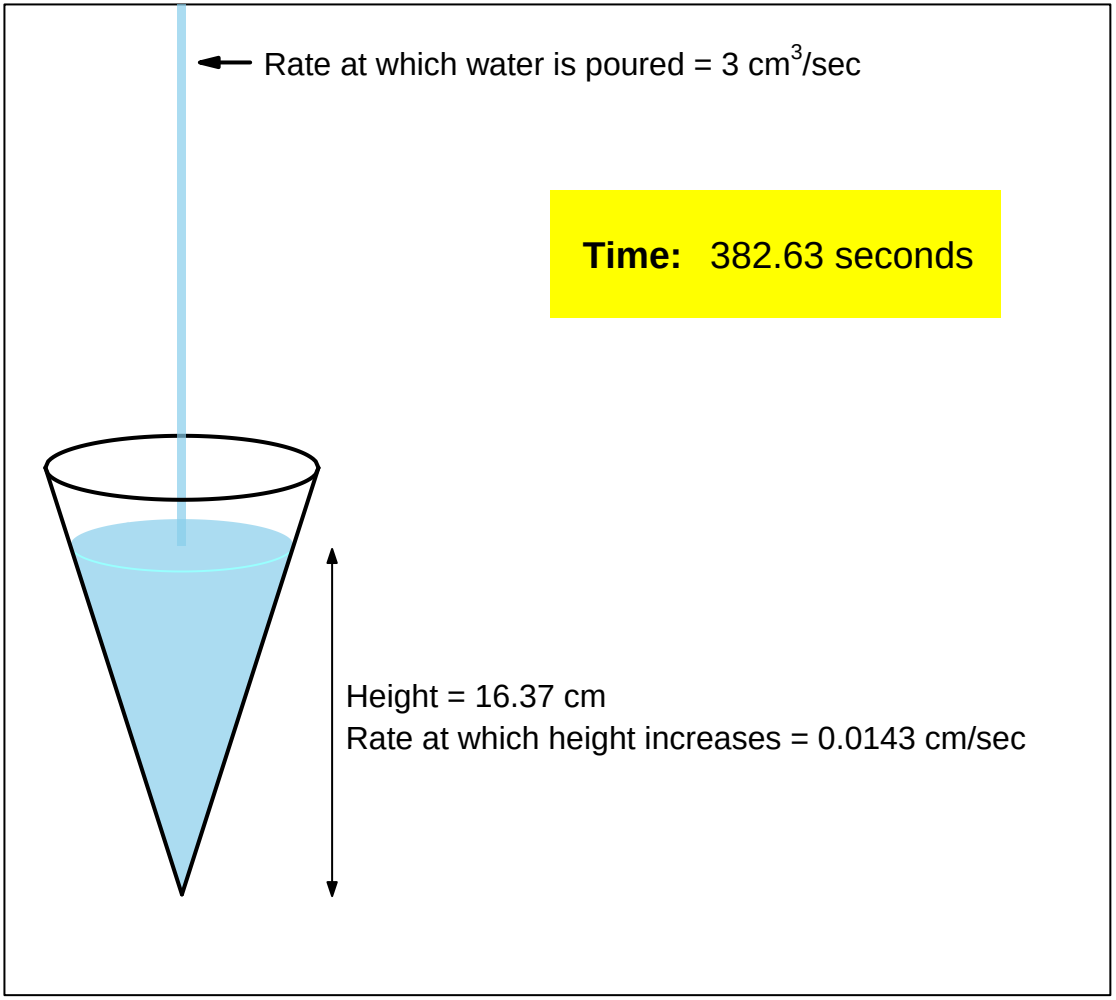
Height = 16.17 cm

Rate at which height increases = 0.0146 cm/sec

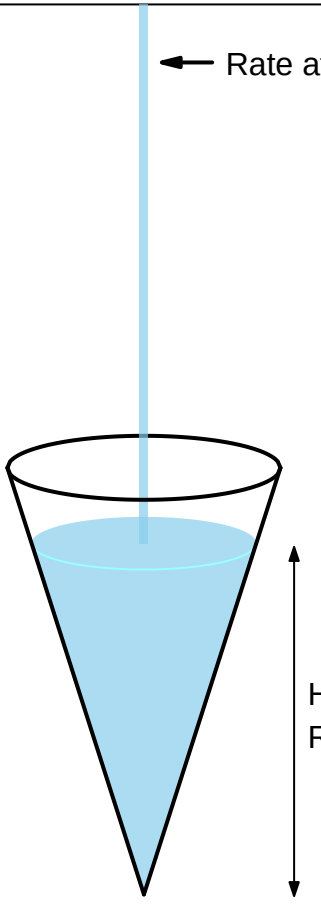
Applications of Differentiation



Applications of Differentiation

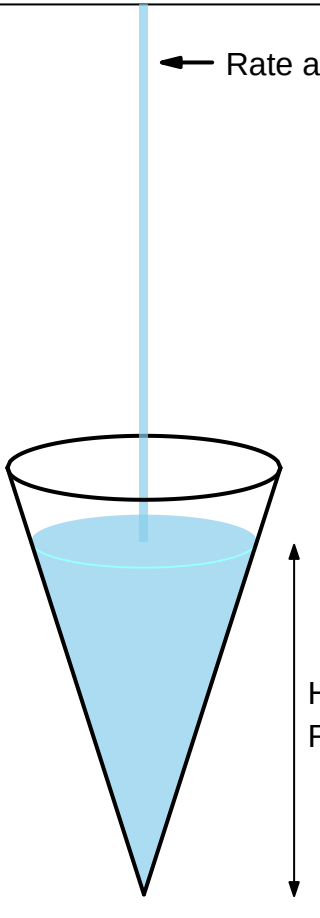


Applications of Differentiation



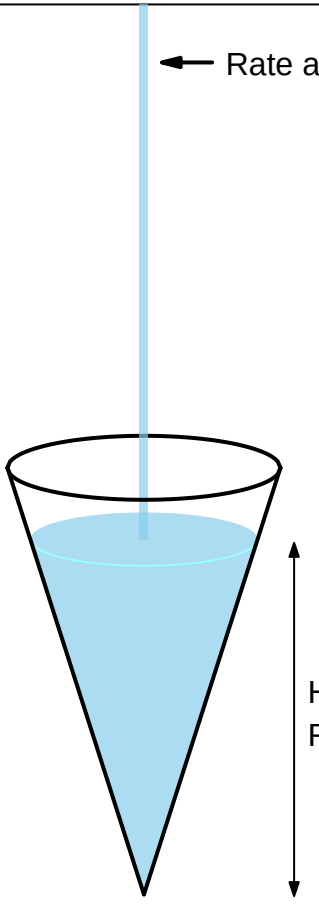
Time: 389.49 seconds

Applications of Differentiation



Time: 396.35 seconds

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

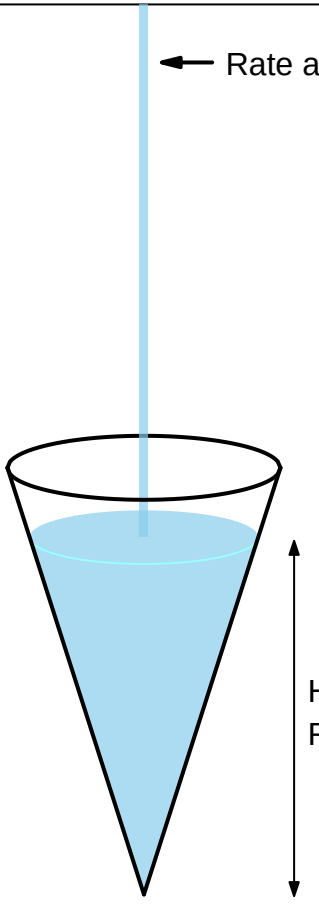
Time: 403.21 seconds

SPEED UP...

Height = 16.66 cm

Rate at which height increases = 0.0138 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

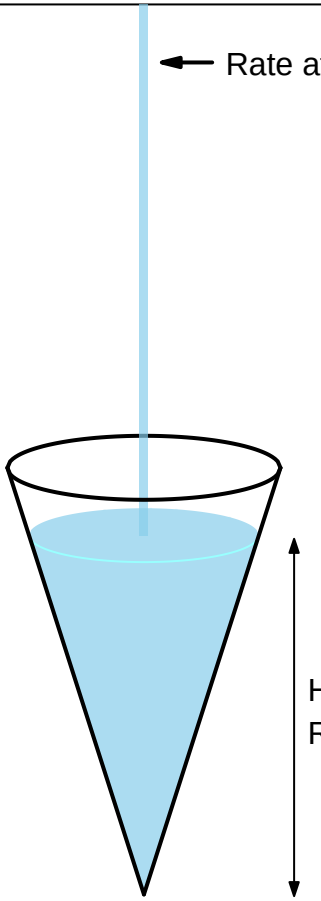
Time: 410.07 seconds

SPEED UP...

Height = 16.75 cm

Rate at which height increases = 0.0136 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

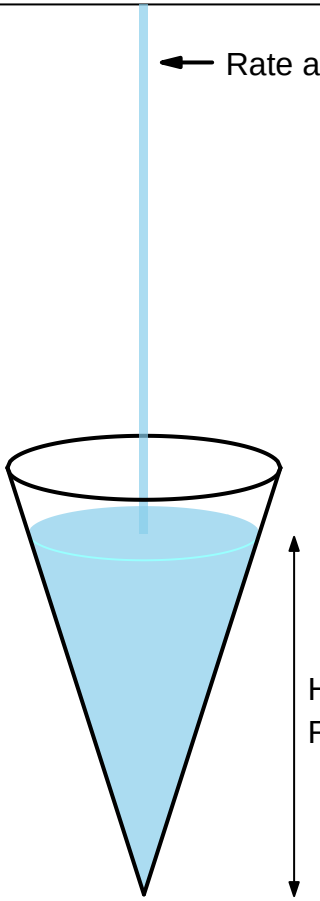
Time: 416.92 seconds

SPEED UP...

Height = 16.84 cm

Rate at which height increases = 0.0135 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

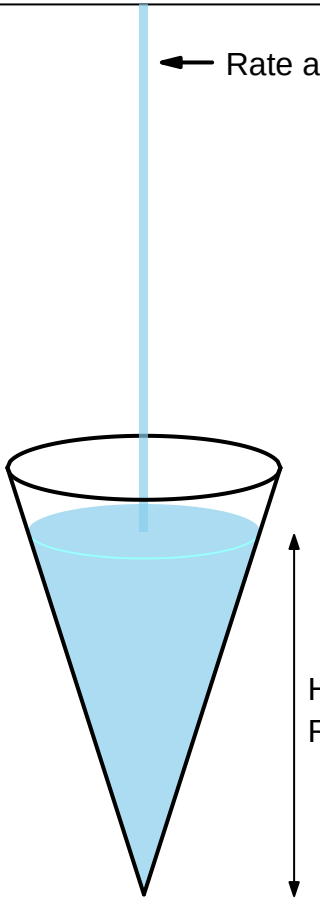
Time: 423.78 seconds

SPEED UP...

Height = 16.93 cm

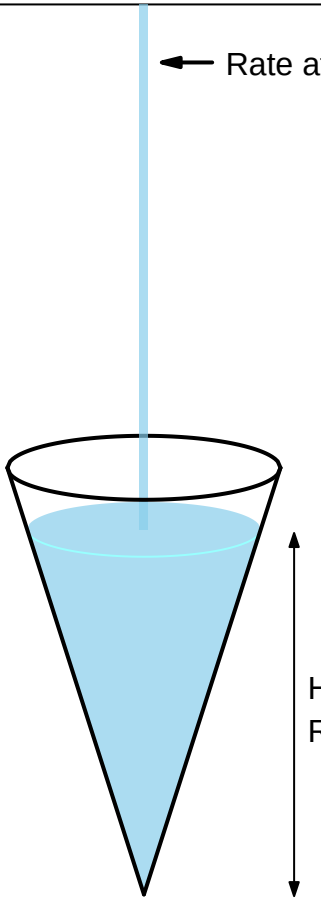
Rate at which height increases = 0.0133 cm/sec

Applications of Differentiation

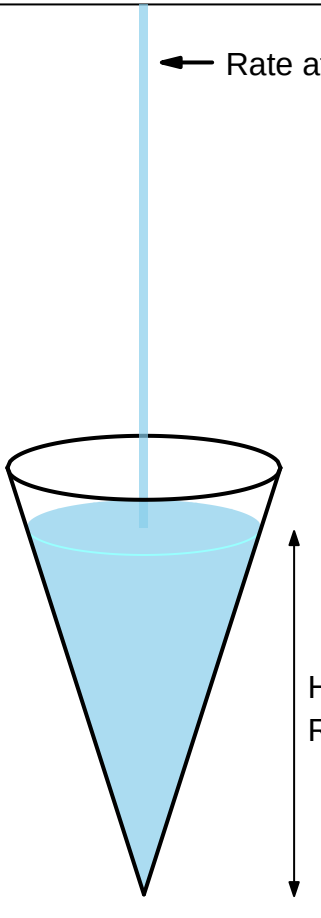


Time: 430.64 seconds

Applications of Differentiation

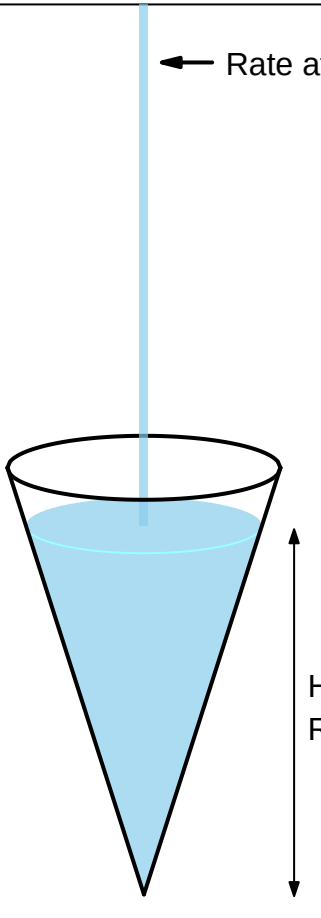


Applications of Differentiation



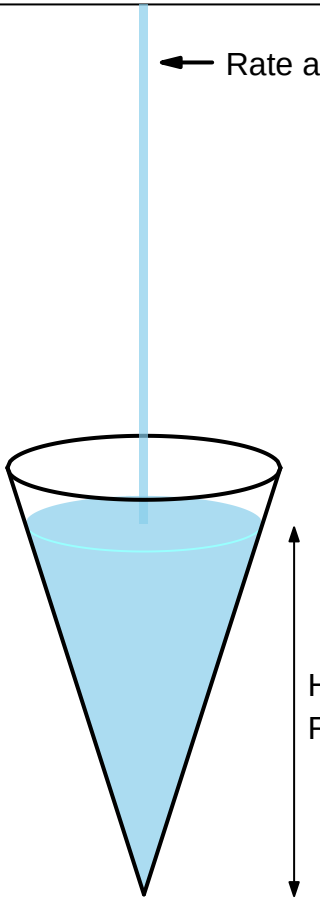
Time: 444.36 seconds

Applications of Differentiation



Time: 451.22 seconds

Applications of Differentiation



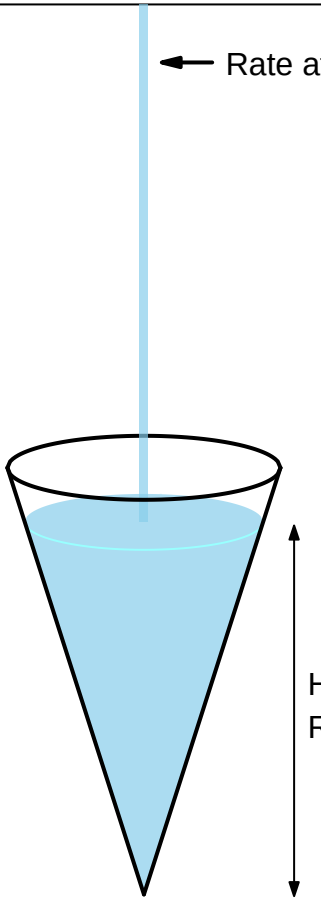
Time: 458.08 seconds

SPEED UP...

Height = 17.38 cm

Rate at which height increases = 0.0126 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

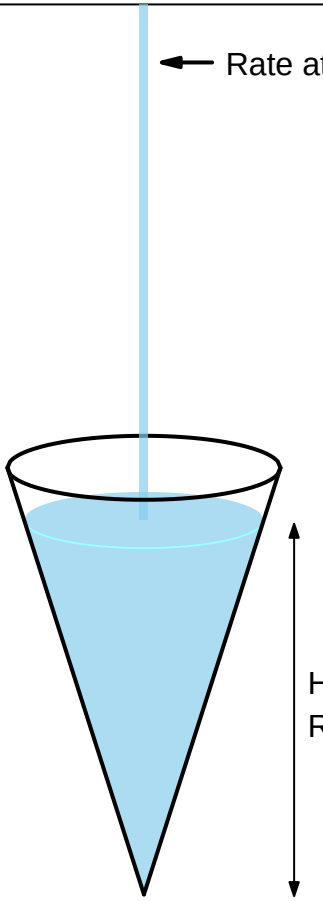
Time: 464.93 seconds

SPEED UP...

Height = 17.47 cm

Rate at which height increases = 0.0125 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

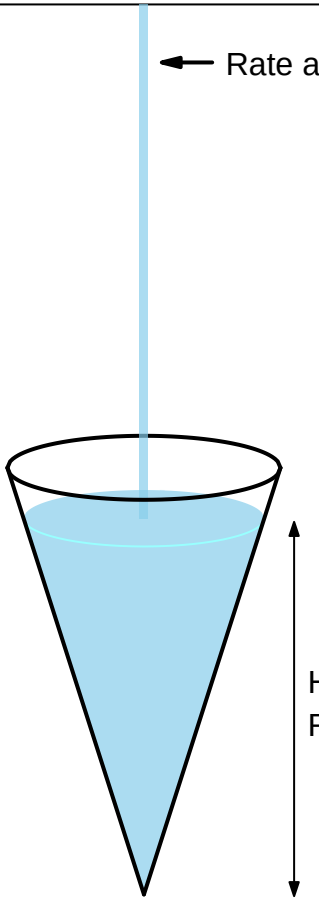
Time: 471.79 seconds

SPEED UP...

Height = 17.55 cm

Rate at which height increases = 0.0124 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

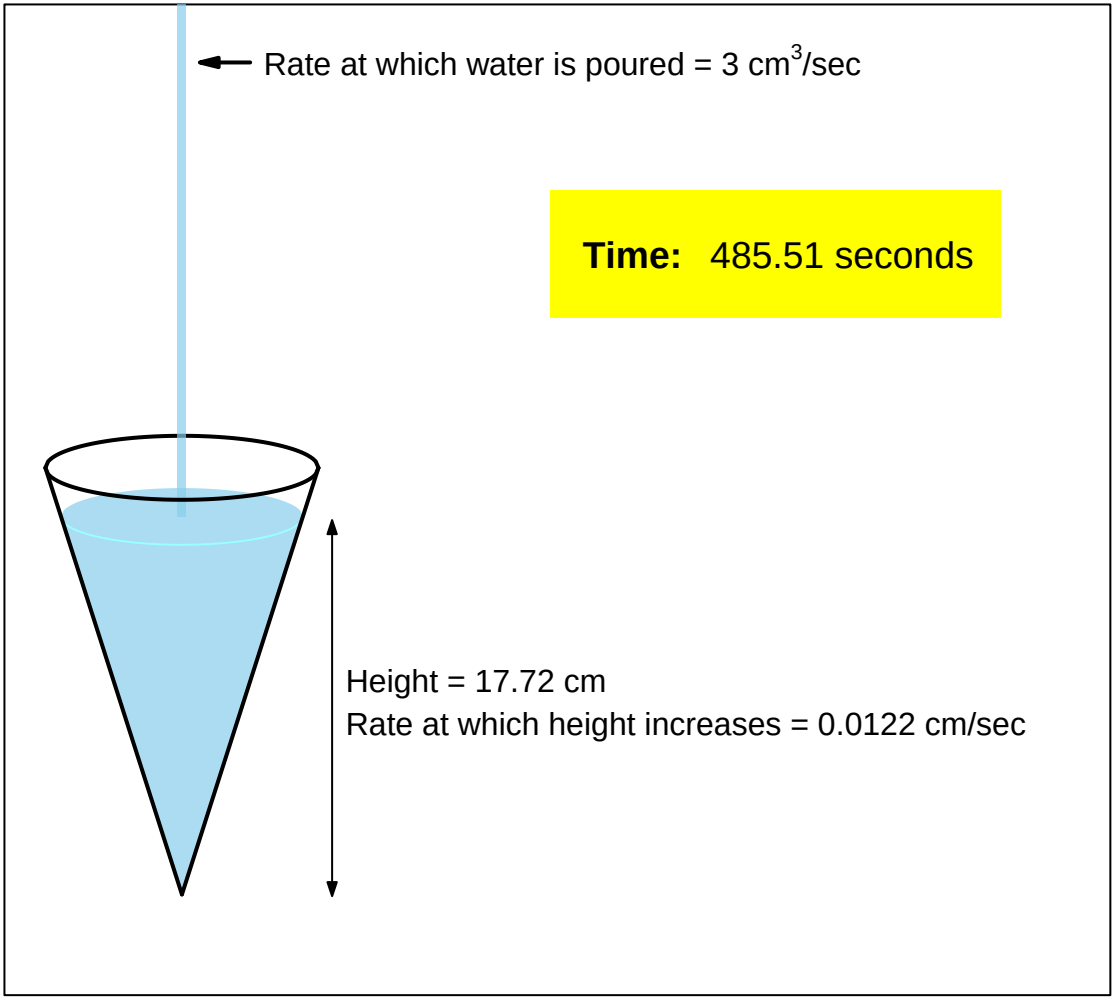
Time: 478.65 seconds

SPEED UP...

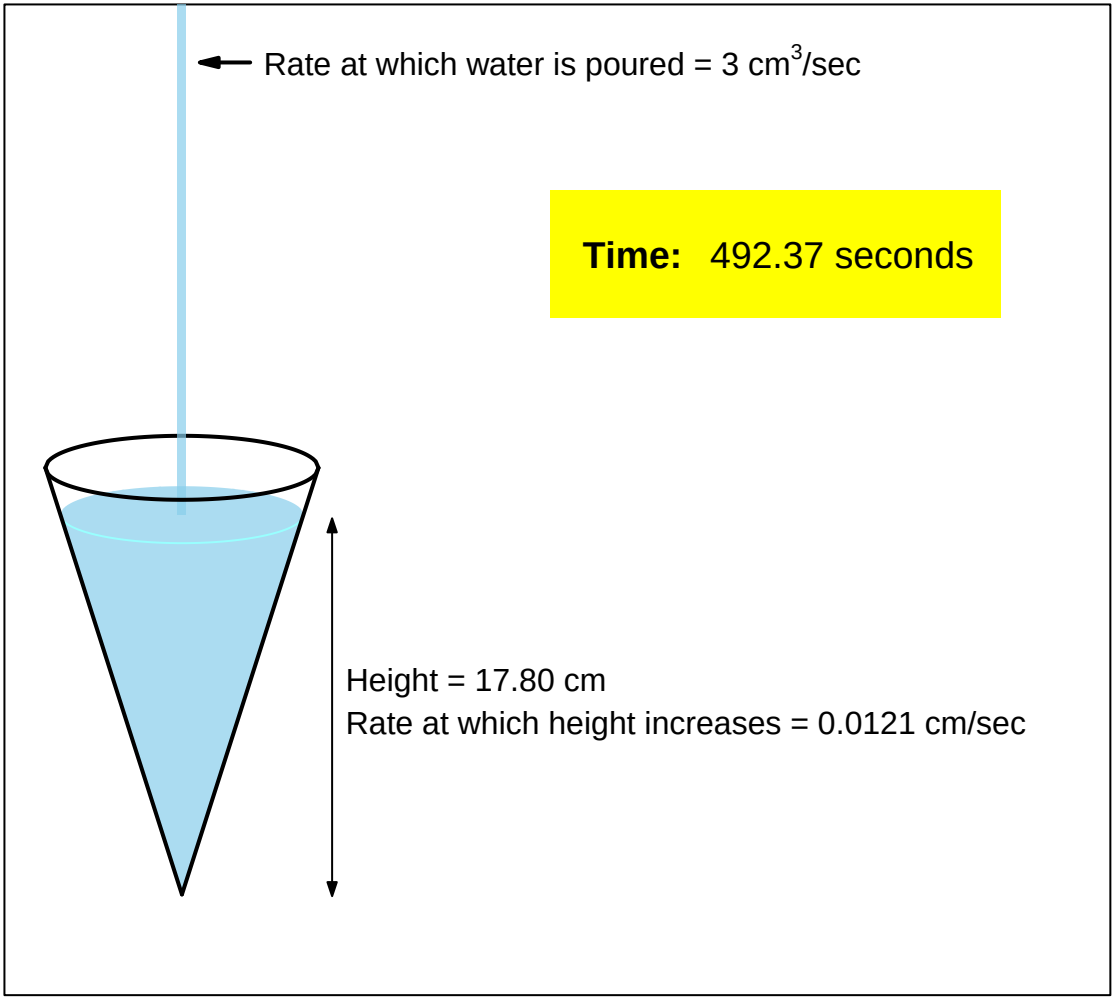
Height = 17.64 cm

Rate at which height increases = 0.0123 cm/sec

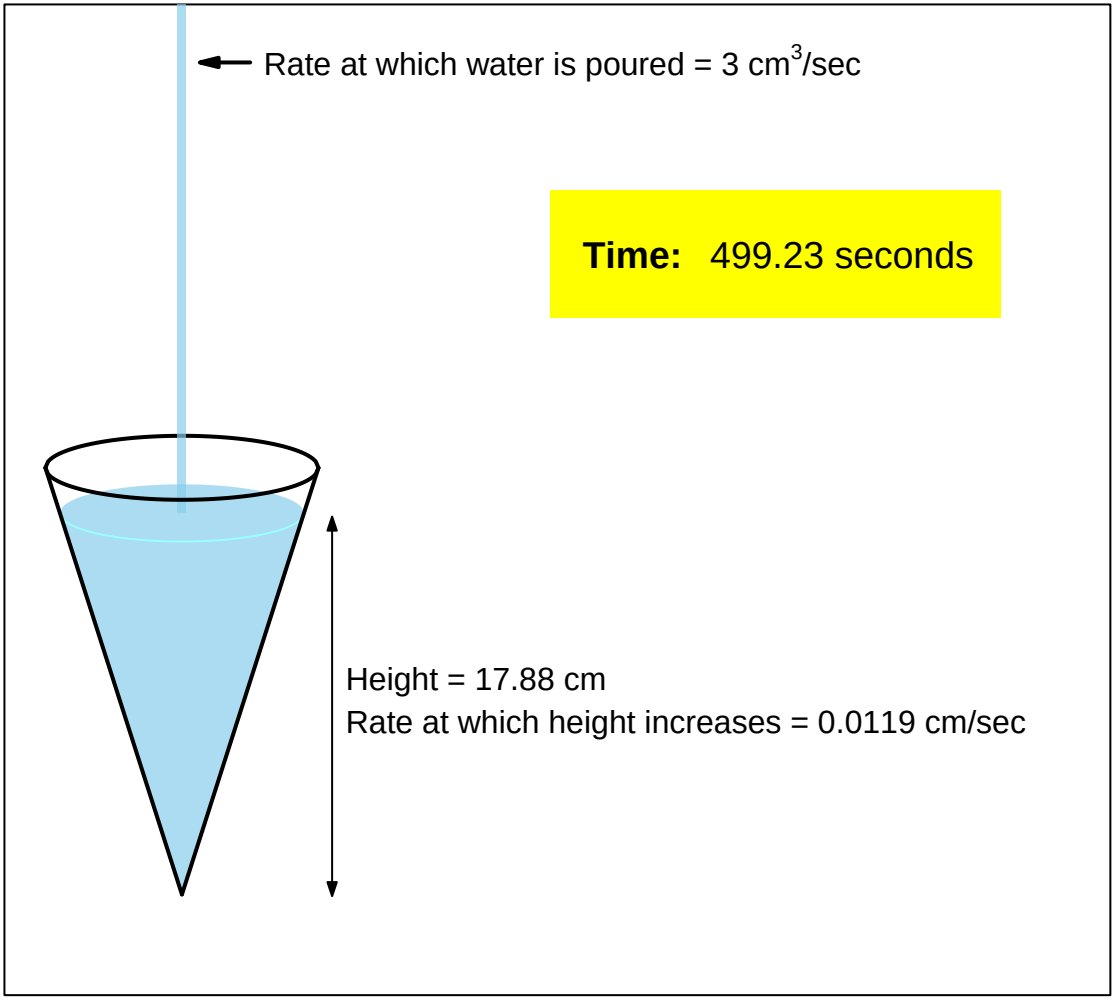
Applications of Differentiation



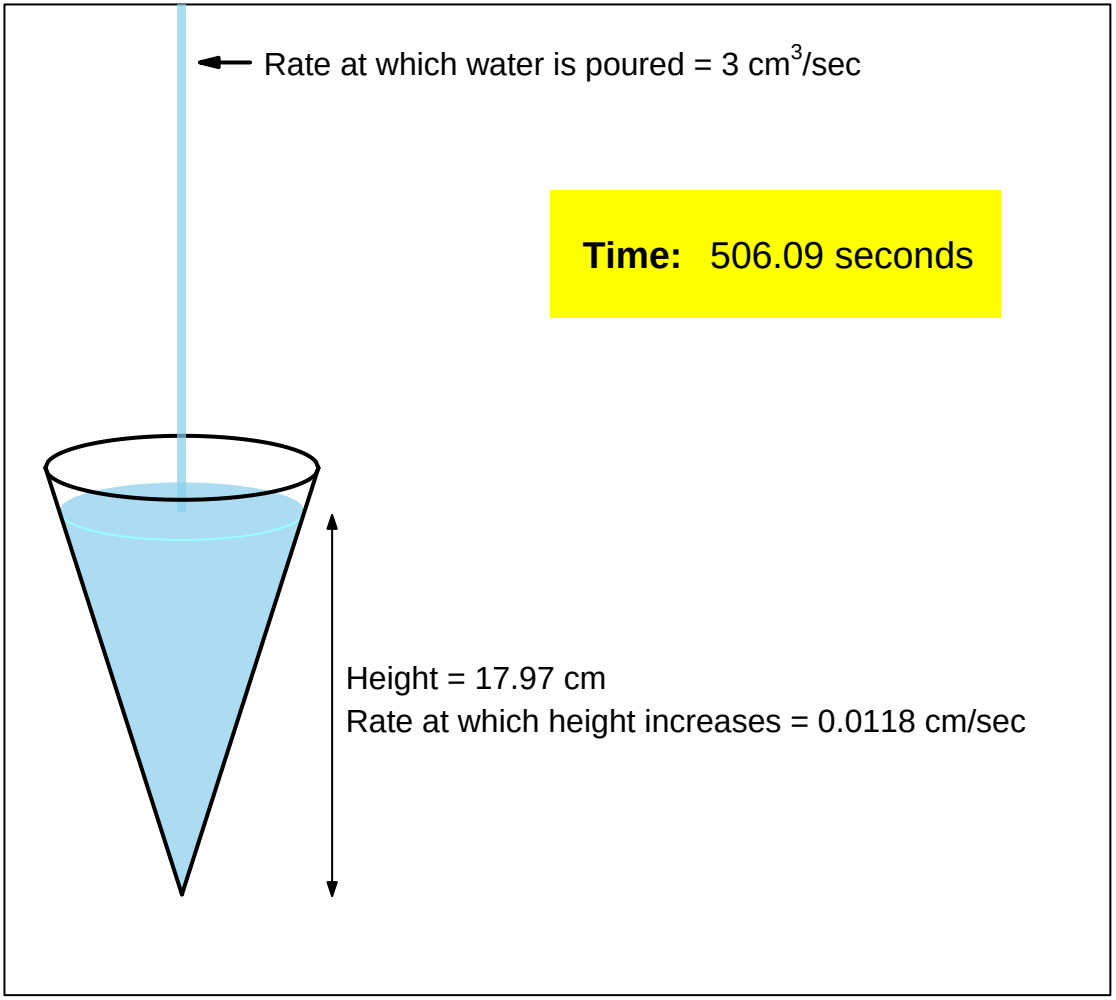
Applications of Differentiation



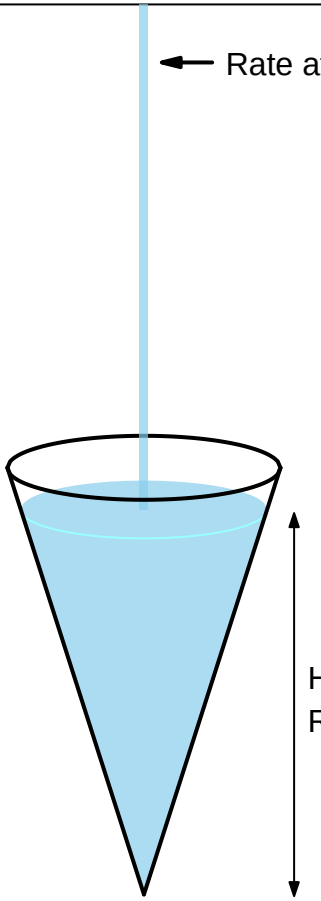
Applications of Differentiation



Applications of Differentiation



Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

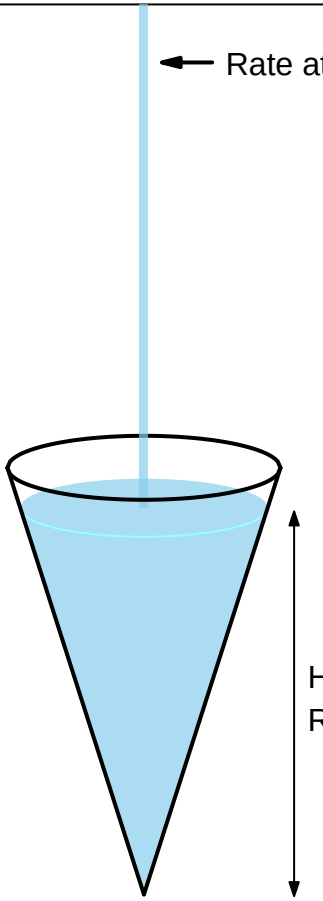
Time: 512.95 seconds

SPEED UP...

Height = 18.05 cm

Rate at which height increases = 0.0117 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

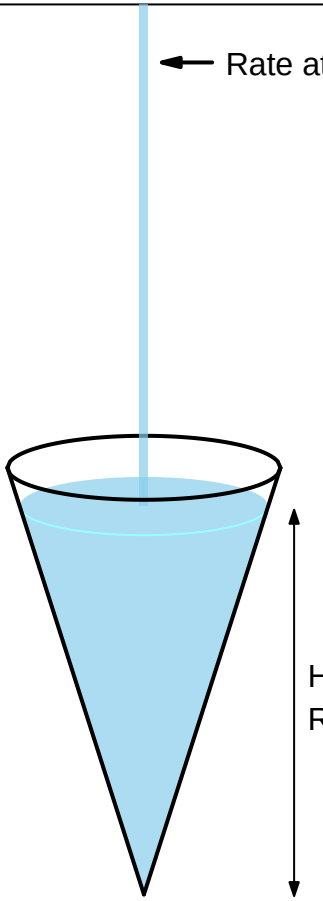
Time: 519.80 seconds

SPEED UP...

Height = 18.13 cm

Rate at which height increases = 0.0116 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

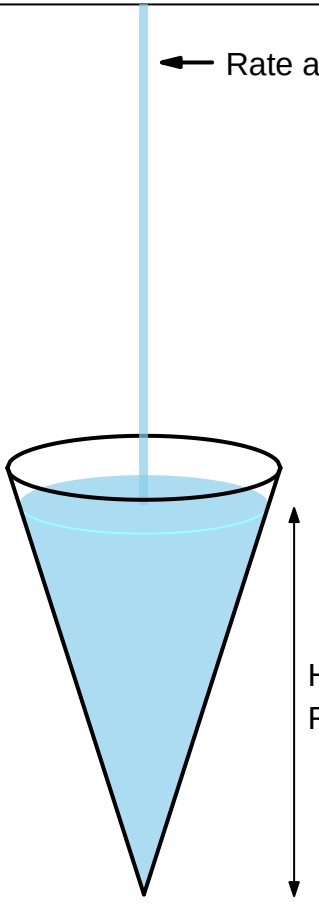
Time: 526.66 seconds

SPEED UP...

Height = 18.21 cm

Rate at which height increases = 0.0115 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

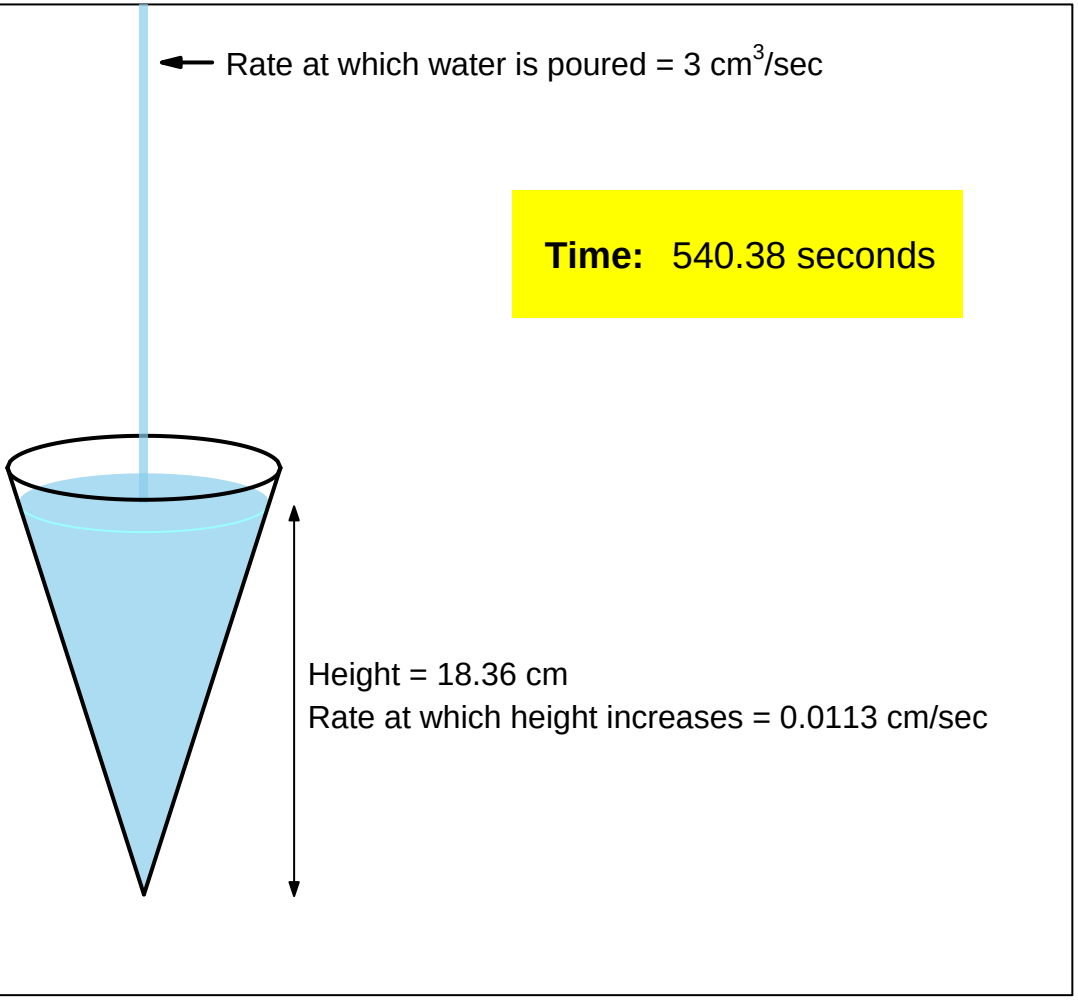
Time: 533.52 seconds

SPEED UP...

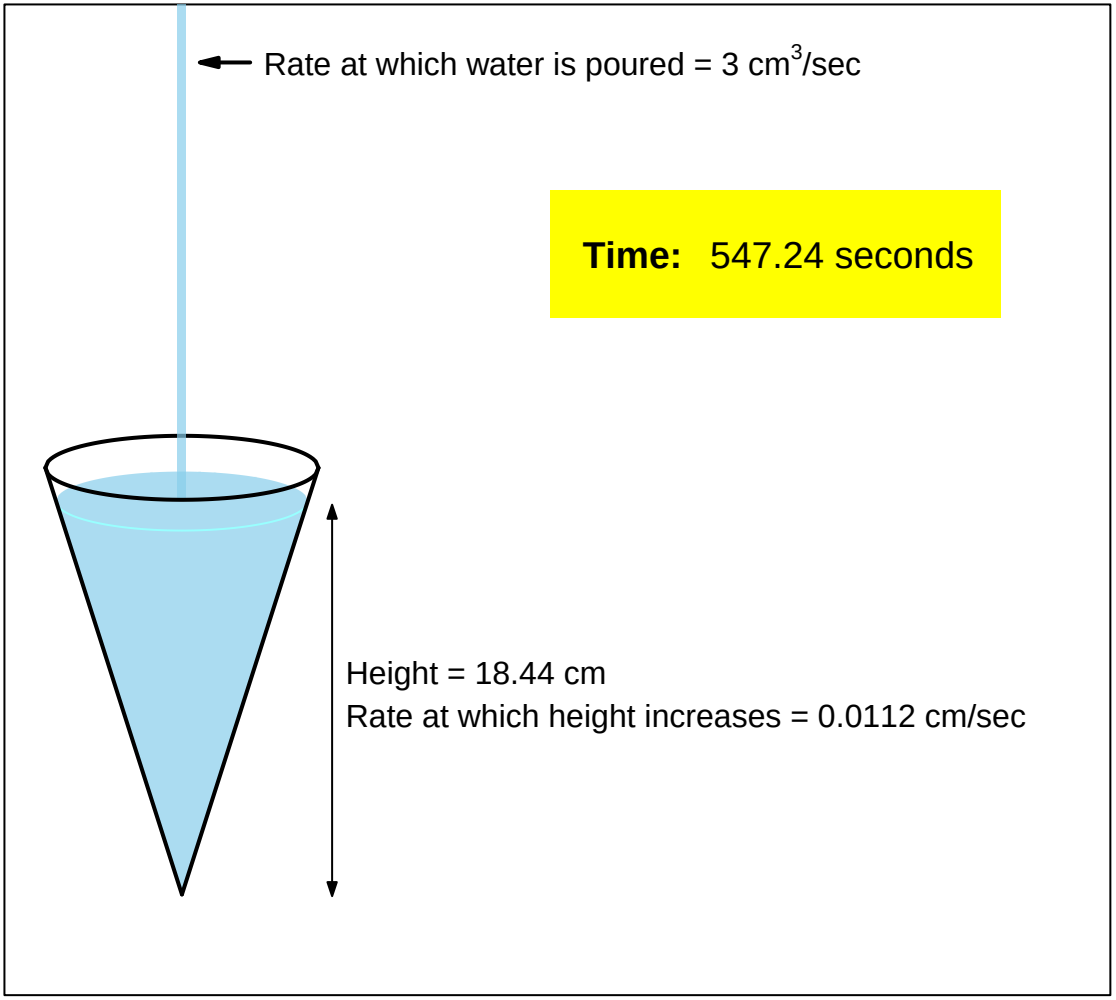
Height = 18.29 cm

Rate at which height increases = 0.0114 cm/sec

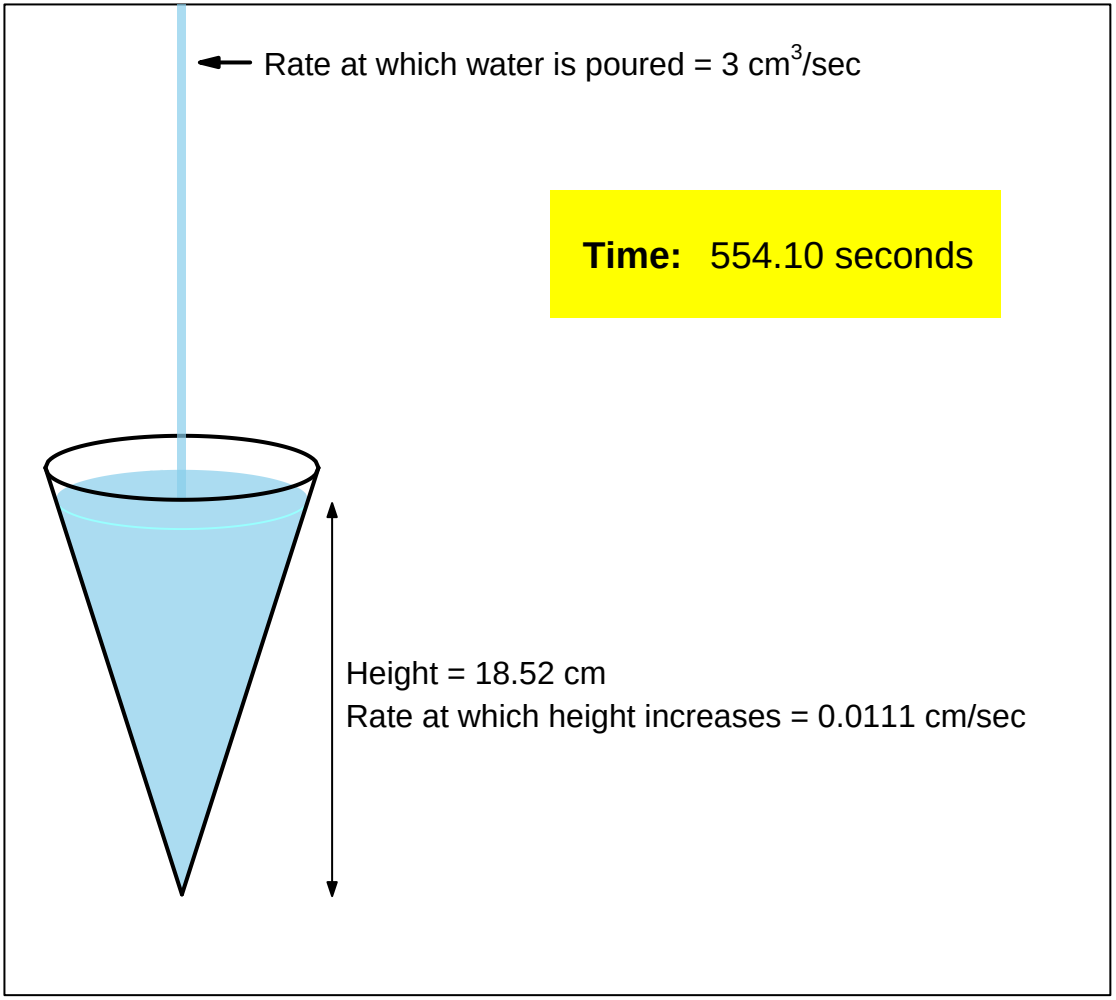
Applications of Differentiation



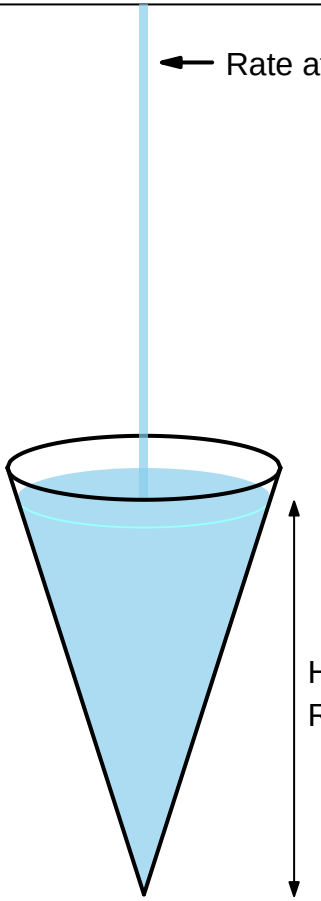
Applications of Differentiation



Applications of Differentiation

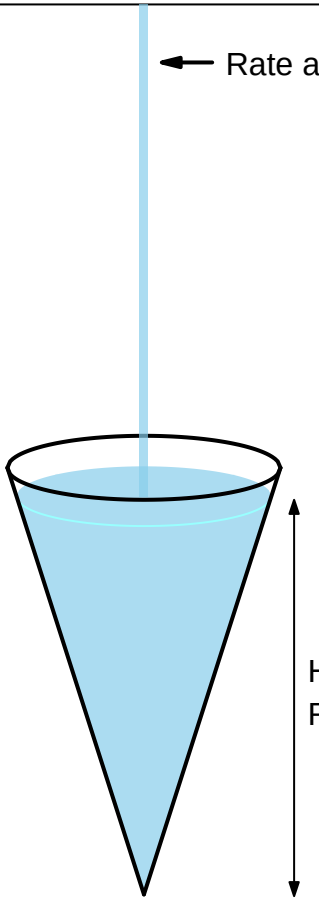


Applications of Differentiation



Time: 560.96 seconds

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

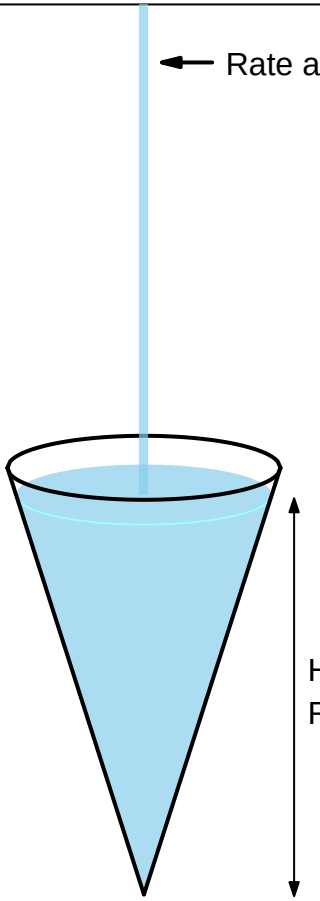
Time: 567.81 seconds

SPEED UP...

Height = 18.67 cm

Rate at which height increases = 0.0110 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

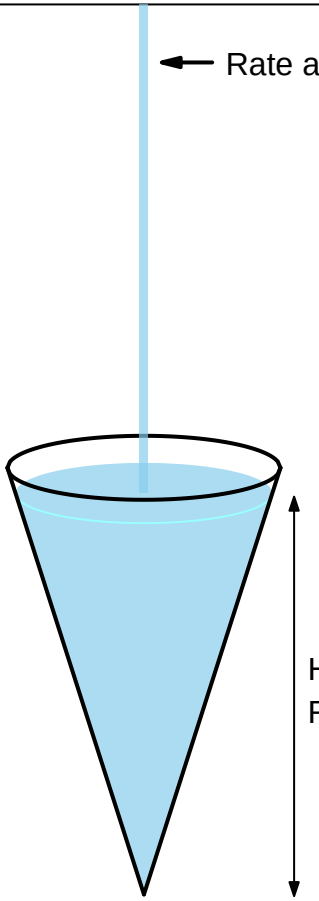
Time: 574.67 seconds

SPEED UP...

Height = 18.74 cm

Rate at which height increases = 0.0109 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

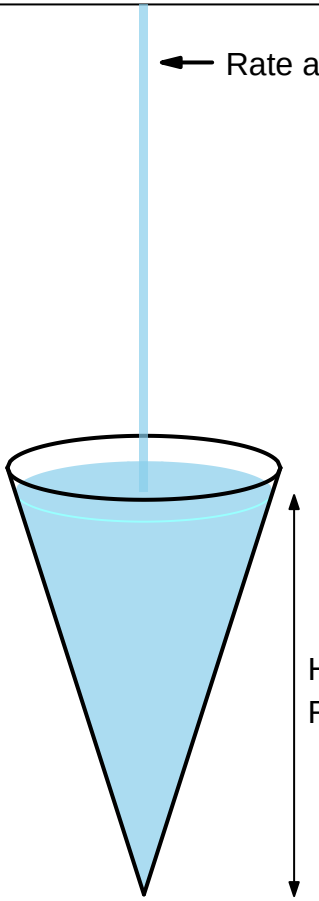
Time: 581.53 seconds

SPEED UP...

Height = 18.82 cm

Rate at which height increases = 0.0108 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

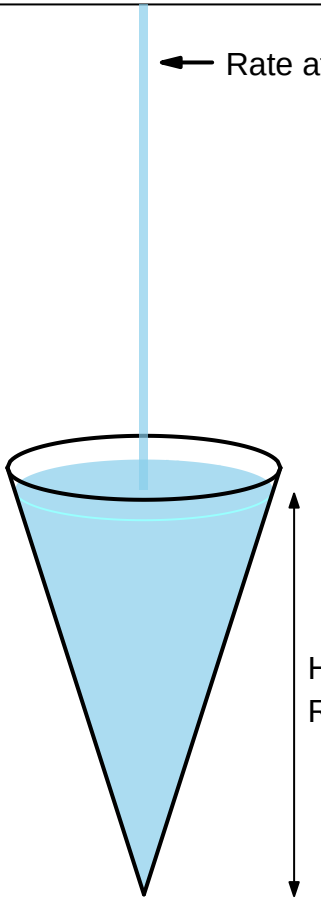
Time: 588.39 seconds

SPEED UP...

Height = 18.89 cm

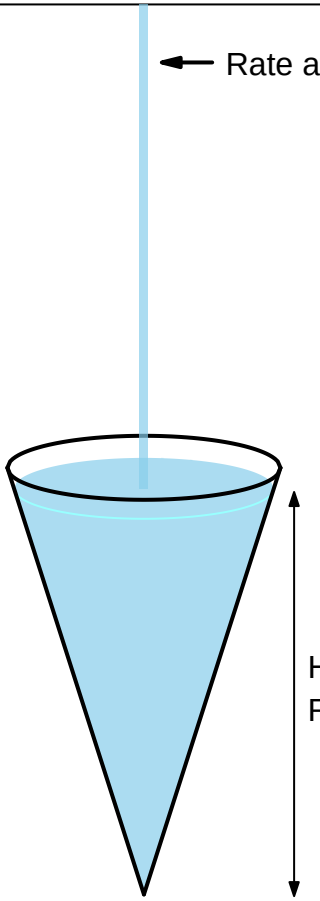
Rate at which height increases = 0.0107 cm/sec

Applications of Differentiation



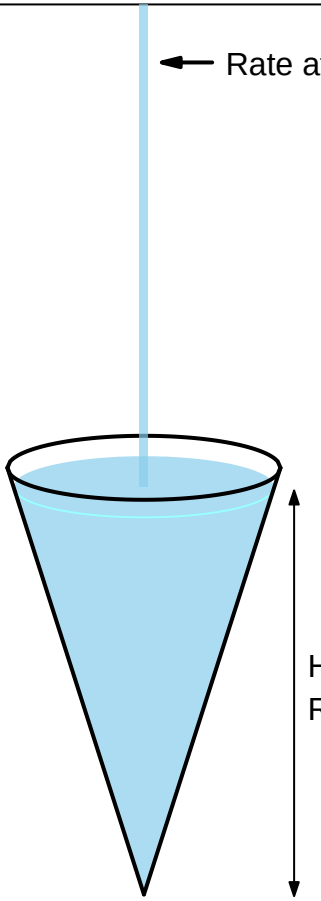
Time: 595.25 seconds

Applications of Differentiation



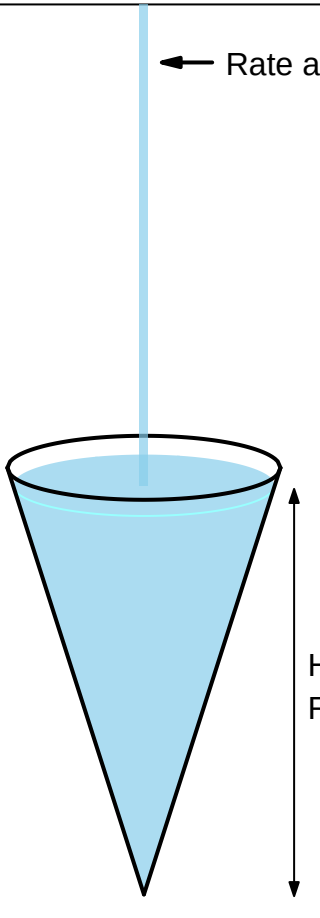
Time: 602.11 seconds

Applications of Differentiation



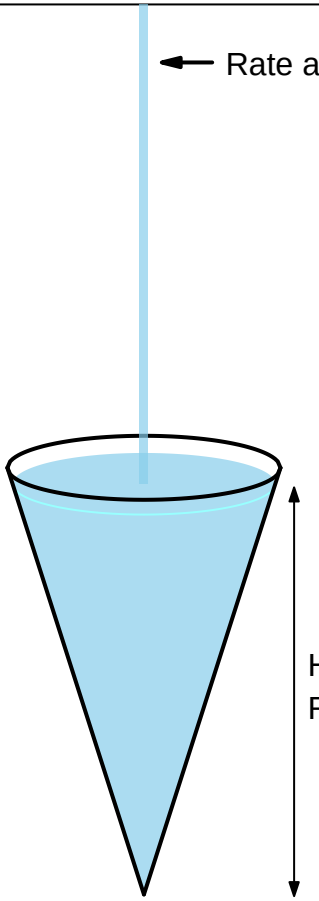
Time: 608.97 seconds

Applications of Differentiation



Time: 615.83 seconds

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

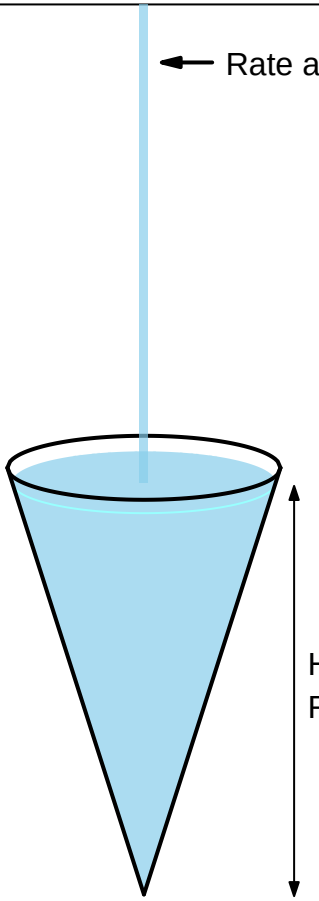
Time: 622.68 seconds

SPEED UP...

Height = 19.25 cm

Rate at which height increases = 0.0103 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

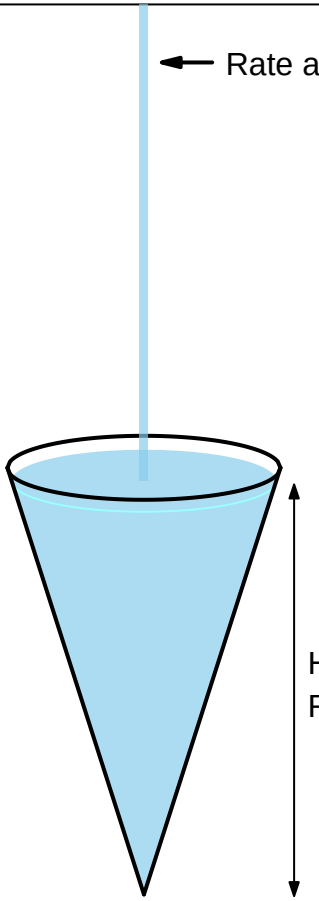
Time: 629.54 seconds

SPEED UP...

Height = 19.32 cm

Rate at which height increases = 0.0102 cm/sec

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

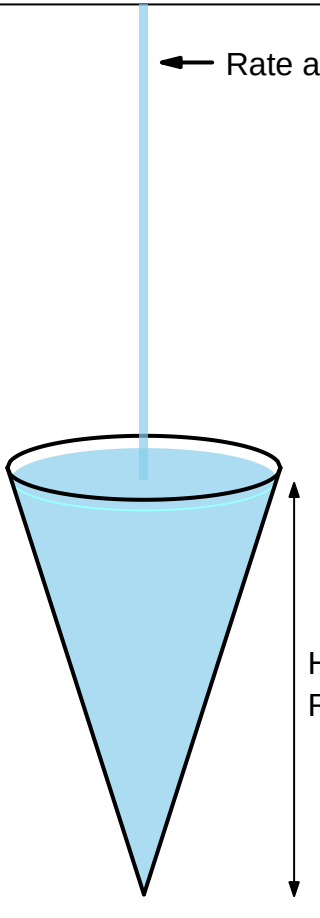
Time: 636.40 seconds

SPEED UP...

Height = 19.39 cm

Rate at which height increases = 0.0102 cm/sec

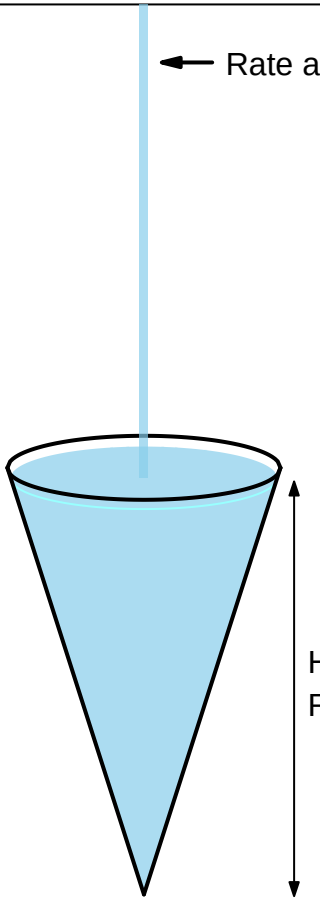
Applications of Differentiation



Time: 643.26 seconds

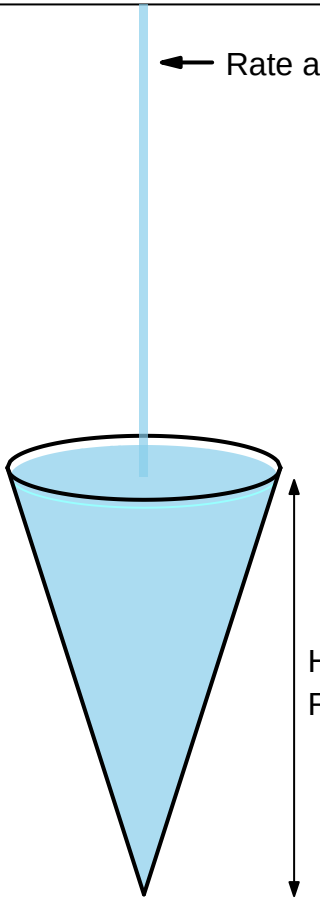
SPEED UP...

Applications of Differentiation



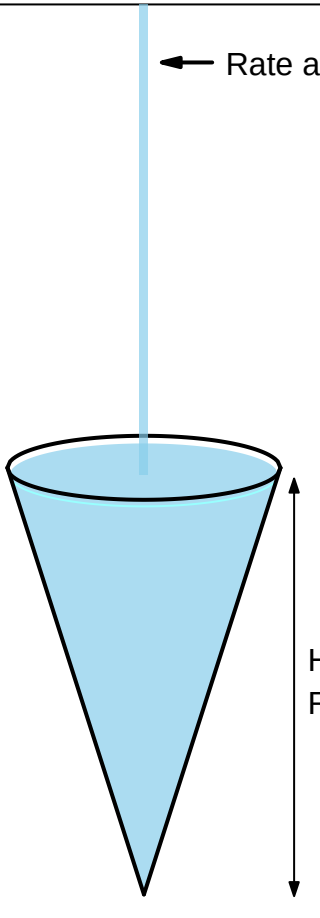
Time: 650.12 seconds

Applications of Differentiation



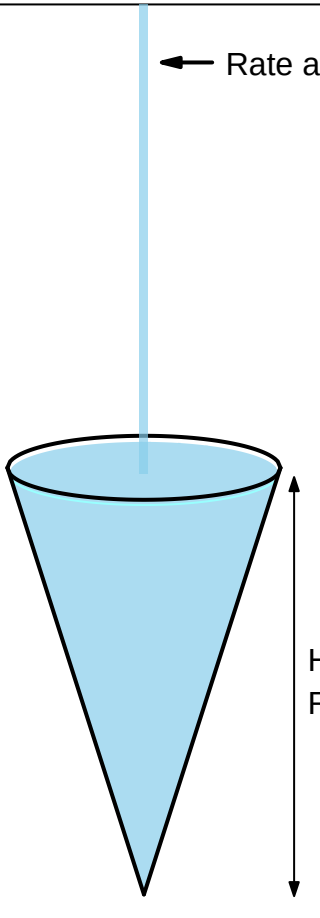
Time: 656.98 seconds

Applications of Differentiation



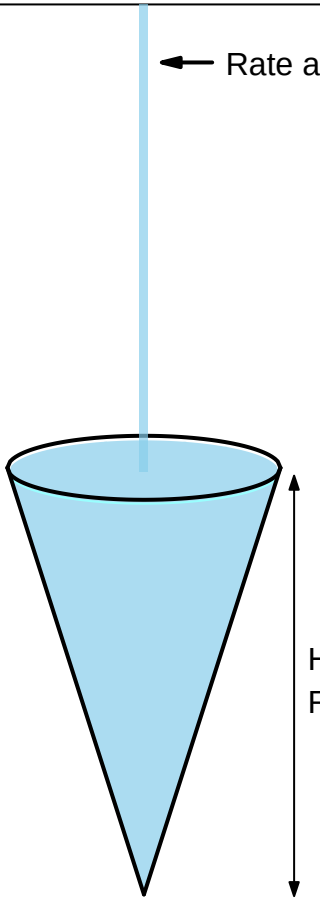
Time: 663.84 seconds

Applications of Differentiation



Time: 670.70 seconds

Applications of Differentiation



Rate at which water is poured = 3 cm^3/sec

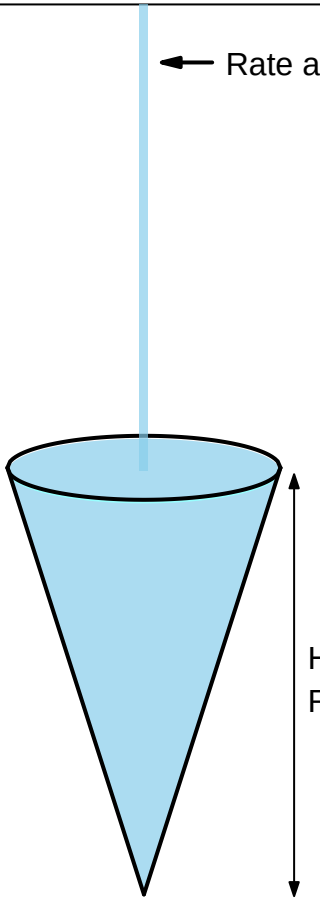
Time: 677.55 seconds

SPEED UP...

Height = 19.80 cm

Rate at which height increases = 0.0097 cm/sec

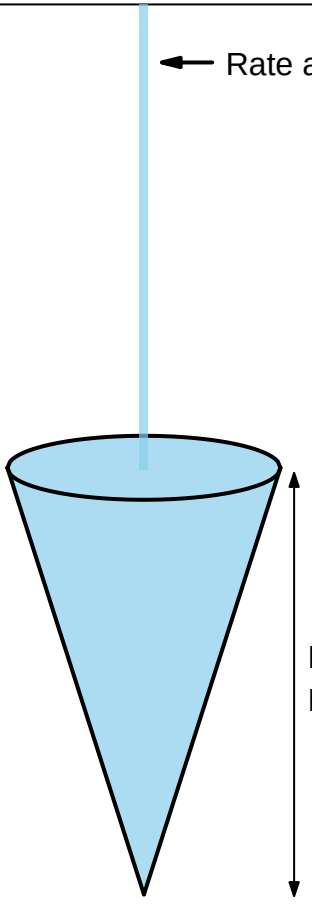
Applications of Differentiation



Time: 684.41 seconds

SPEED UP...

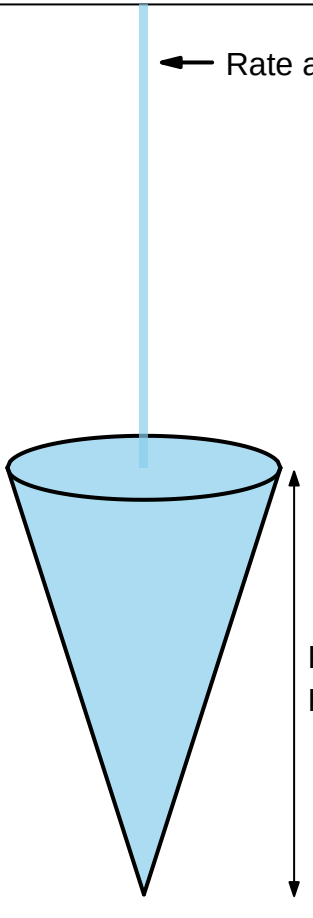
Applications of Differentiation



Time: 691.27 seconds

SPEED UP...

Applications of Differentiation

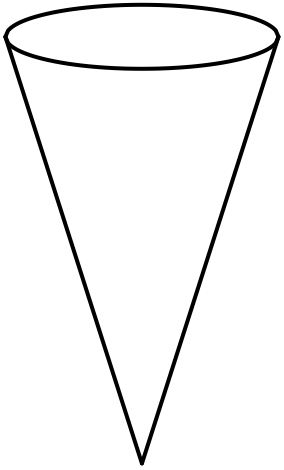


Time: 698.13 seconds

Woah.. It takes almost 12 minutes!

Applications of Differentiation

Time: 0.00 seconds



Height = 0 cm

Rate at which height rises = undefined