

Problem 7-16**Goal:** Compare "Unit-of-Production" depreciation to straight line

Given: Asset Investment \$110,000 **investment**
 Total production 11,000 **units**
 depreciation per unit \$10 **expenses**
 production schedule in table below

Approach: Determine Unit-of-Production schedule from description until total capacity is reached
 Determine straight line depreciation life from capacity
 Determine straight line depreciation per year, Investment/life

Calculations:**construct Unit-of-Production depreciation table**

	year	units made	cumulative units	depreciation	book value at end of year
	1	200	200	\$2,000	\$108,000
double rate	2	400	600	\$4,000	\$104,000
double rate	3	800	1,400	\$8,000	\$96,000
double rate	4	1,600	3,000	\$16,000	\$80,000
constant	5	1,600	4,600	\$16,000	\$64,000
constant	6	1,600	6,200	\$16,000	\$48,000
constant	7	1,600	7,800	\$16,000	\$32,000
constant	8	1,600	9,400	\$16,000	\$16,000
constant	9	1,600	11,000	\$16,000	\$0 end of useful life
over capacity	10	1,600	12,600	\$16,000	(\$16,000)

annual straight line depreciation = $\$12,222.22 = \$110,000 / 9 \text{ years}$

Answer**\$12,222** per year with straight line depreciation

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