

Power Printers

Power Printers has recently produced a new strategic plan that will require it to update its printing technology every three years. The division making the printer purchase prints up to 30,000 sheets per month. You have been asked to evaluate two printing options which are referred to as Option A and Option B. Determine the NPV for the printer options.

Option A: The PaperBlitz 2000

This printer cost \$10,000 to purchase. The fuser (\$1000) must be replaced every 25,000 sheets, the toner cartridge (\$200) must be replaced every 15,000 sheets. There is a \$5000 cost to interface this printer to the computer network, but once it is installed it does not require any additional network support. Routine servicing of this printer has to be performed every 25,000 sheets at a cost of \$2,500. There is a special paper used with this printer that cost \$4 more per ream (500 sheets). The monthly throughput for this printer is 20,000 sheets.

Option B: TreeKilz X12

This printer cost \$17,000 to purchase. The combined toner and fuser (\$850) must be replaced be replaced every 20,000 sheets. The printer uses the latest in network control technology; this software is leased at \$1,500 per year. Routine servicing of this printer has to be performed every 20,000 at a cost of \$2,000. This printer can use standard paper. The monthly throughput for this printer is 15,000 sheets.

Note: Option A is a green technology and as such does not incur additional costs when it is salvaged. Option B uses an older printing technology that will cost \$500 per printer when it is salvaged.

NOTES

Performing a total cost of ownership analysis

1. Identify options to consider
2. Determine what data is associated with which option, if you don't have the data get it.
3. Establish a timeline over which the system will be evaluated (e.g., 3 or 5 years)
4. Identify relevant costs: acquisition, operation, and disposal.
5. For acquisition costs account for cost to purchase (lease), install/integrate: will additional hardware, software, staff or administrative support be required?
6. Layout operating costs. What costs are fixed versus variable (or even incremental)? Include maintenance costs.