Accounting
Exam 7.3.2015 4 hours
Equipment: Calculator

Management Accounting 2119-E
Lecturer: Juha Soininen
Maximum points 100

Q 1. Multiple Choice: a correct answer gives 1 point

Identify the choice that best completes the statement or answers the question.

The primary objective of management accounting is
a. to provide shareholders and potential investors with useful information for decision making.
b. to provide banks and other creditors with information useful in making credit decisions.
c. to provide management with information useful for planning and control of operations.
d. to provide the relevant taxation authorities with information about taxable income.

Comparing actual quality costs with planned quality costs is an example of
a. planning.
b. controlling.
c. performance evaluation.
d. both b and c.

Which of the following statements is untrue regarding a probability distribution?
a. it will show all possible outcomes and their probabilities
b. it can be used to provide an indication of the risk of undertaking a possible course of action.
c. it will show the average outcome that is expected to occur
d. it will enable an estimate of the most likely outcome to be derived

The joint probability of two events occurring together is:
a. the sum of the probabilities of the two events.
b. the higher probability of the two events.
c. the average of the probability for the two events.
d. the probability of one event times the probability of the other event.

The maximum amount that is worth paying to obtain additional information consists of:
a. the expected price of the information.
b. the difference between the expected value if the information is acquired compared with the expected value with the absence of the information.
c. an amount equal to the most likely benefit that the information will provide.
d. an amount equal to the highest benefit that the information will provide.

Under what circumstances can risk reduction NOT be achieved from combining investments?
a. Where the projects are perfectly positively correlated
b. Where the projects are perfectly negatively correlated
c. Where the projects have low levels of positive correlation
d. Where the projects have low levels of negative correlation

Firms may select projects with short paybacks because
a. projects with longer paybacks may be riskier.
b. shorter paybacks may help reduce liquidity problems.
c. if the risk of obsolescence is high, the firm may want to recover the funds rapidly.
d. All of the above are correct.

What is a weakness of the payback method?
a. It emphasizes projects with possible liquidity problems.
b. It ignores the profitability of investments beyond the payback period.
c. It can be used in conjunction with discounted cash flow methods.
d. both a and b above

A firm is evaluating a project that has a net present value of $0 when a discount rate of 8 per cent is used. A discount rate of 10 per cent will result in
a. a negative net present value.
b. a positive net present value.
c. a net present value of $0.
d. The question cannot be answered based upon the information provided.

Short Answers

Q. 2. Compare the various quantitative models used to evaluate capital budgeting proposals. Which models are preferred if used as the only criterion?

10 p

Q. 3. Describe zero-based budgeting.

10 p

Q.4. Compare and contrast decentralization and centralization.

10 p

Q. 5. Explain why an organization should not use only financial measures to monitor performance.

10 p

Problems

Q. 6. Barker Production Company is considering the purchase of a flexible manufacturing system. The after-tax cash benefits/savings associated with the system are as follows:

Decreased waste	$ 75,000
Increased quality	100,000
Decrease in operating costs	62,500
Increase in on-time deliveries	12,500

The system will cost $750,000 and will last ten years. The company's cost of capital is 10 per cent.

Required:
a. What is the payback period for the flexible manufacturing system?
b. What is the NPV for the flexible manufacturing system?
c. What is the IRR for the flexible manufacturing system?

10 p

Q.7. Budgeted sales for the second quarter of the year for Reuben Company are as follows:

	Budgeted Sales
April	$400,000
May	200,000
June	600,000

The company normally collects 60 per cent in the month of sale and 30 per cent in the month following the sale. Ten per cent of all sales are uncollectible and are written off in the following month.

The balance in accounts receivable at April 1 was $200,000, which represents 40 per cent of March sales.

Required:
Prepare a schedule of cash collections on accounts receivable for the second quarter.

10 p

APPENDIX A

PRESENT VALUE OF £1 AFTER *N* YEARS = £1/(1+k)^n

Years hence	1%	2%	4%	6%	8%	10%	12%	14%	15%	16%
1	0.990	0.980	0.962	0.943	0.926	0.909	0.893	0.877	0.870	0.862
2	0.980	0.961	0.925	0.890	0.857	0.826	0.797	0.769	0.756	0.743
3	0.971	0.942	0.889	0.840	0.794	0.751	0.712	0.675	0.658	0.641
4	0.961	0.924	0.855	0.792	0.735	0.683	0.636	0.592	0.572	0.552
5	0.951	0.906	0.822	0.747	0.681	0.621	0.567	0.519	0.497	0.476
6	0.942	0.888	0.790	0.705	0.630	0.564	0.507	0.456	0.432	0.410
7	0.933	0.871	0.760	0.665	0.583	0.513	0.452	0.400	0.376	0.354
8	0.923	0.853	0.731	0.627	0.540	0.467	0.404	0.351	0.327	0.305
9	0.914	0.837	0.703	0.592	0.500	0.424	0.361	0.308	0.284	0.263
10	0.905	0.820	0.676	0.558	0.463	0.386	0.322	0.270	0.247	0.227
11	0.896	0.804	0.650	0.527	0.429	0.350	0.287	0.237	0.215	0.195
12	0.887	0.788	0.625	0.497	0.397	0.319	0.257	0.208	0.187	0.168
13	0.879	0.773	0.601	0.469	0.368	0.290	0.229	0.182	0.163	0.145
14	0.870	0.758	0.577	0.442	0.340	0.263	0.205	0.160	0.141	0.125
15	0.861	0.743	0.555	0.417	0.315	0.239	0.183	0.140	0.123	0.108
16	0.853	0.728	0.534	0.394	0.292	0.218	0.163	0.123	0.107	0.093
17	0.844	0.714	0.513	0.371	0.270	0.198	0.146	0.108	0.093	0.080
18	0.836	0.700	0.494	0.350	0.250	0.180	0.130	0.095	0.081	0.069
19	0.828	0.686	0.475	0.331	0.232	0.164	0.116	0.083	0.070	0.060
20	0.820	0.673	0.456	0.312	0.215	0.149	0.104	0.073	0.061	0.051

Years hence	18%	20%	22%	24%	25%	26%	28%	30%	35%
1	0.847	0.833	0.820	0.806	0.800	0.794	0.781	0.769	0.741
2	0.718	0.694	0.672	0.650	0.640	0.630	0.610	0.592	0.549
3	0.609	0.579	0.551	0.524	0.512	0.500	0.477	0.455	0.406
4	0.516	0.482	0.451	0.423	0.410	0.397	0.373	0.350	0.301
5	0.437	0.402	0.370	0.341	0.328	0.315	0.291	0.269	0.223
6	0.370	0.335	0.303	0.275	0.262	0.250	0.227	0.207	0.165
7	0.314	0.279	0.249	0.222	0.210	0.198	0.178	0.159	0.122
8	0.266	0.233	0.204	0.179	0.168	0.157	0.139	0.123	0.091
9	0.225	0.194	0.167	0.144	0.134	0.125	0.108	0.094	0.067
10	0.191	0.162	0.137	0.116	0.107	0.099	0.085	0.073	0.050
11	0.162	0.135	0.112	0.094	0.086	0.079	0.066	0.056	0.037
12	0.137	0.112	0.092	0.076	0.069	0.062	0.052	0.043	0.027
13	0.116	0.093	0.075	0.061	0.055	0.050	0.040	0.033	0.020
14	0.099	0.078	0.062	0.049	0.044	0.039	0.032	0.025	0.015
15	0.084	0.065	0.051	0.040	0.035	0.031	0.025	0.020	0.011
16	0.071	0.054	0.042	0.032	0.028	0.025	0.019	0.015	0.008
17	0.060	0.045	0.034	0.026	0.023	0.020	0.015	0.012	0.006
18	0.051	0.038	0.028	0.021	0.018	0.016	0.012	0.009	0.005
19	0.043	0.031	0.023	0.017	0.014	0.012	0.009	0.007	0.003
20	0.037	0.026	0.019	0.014	0.012	0.010	0.007	0.005	0.002

$40250x - 1207500 = 45768$

$\frac{22884}{(30-x)} = \frac{40250}{2}$

~~$22884x = 666520 - 80500$~~

$22884x =$