

UNIVERSITY OF CAMBRIDGE INTERNATIONAL EXAMINATIONS
General Certificate of Education
Advanced Level

## ACCOUNTING

Paper 4 Problem Solving (Supplementary Topics)
October/November 2010
2 hours
Additional Materials: Answer Booklet/Paper

## READ THESE INSTRUCTIONS FIRST

If you have been given an Answer Booklet, follow the instructions on the front cover of the Booklet.
Write your Centre number, candidate number and name on all the work you hand in.
Write in dark blue or black pen.
You may use a soft pencil for any diagrams, graphs or rough working.
Do not use staples, paper clips, highlighters, glue or correction fluid.
Answer all questions.
All accounting statements are to be presented in good style. Workings should be shown.
You may use a calculator.
At the end of the examination, fasten all your work securely together.
The number of marks is given in brackets [ ] at the end of each question or part question.

1 Akram, Bhupesh and Chuck were in partnership. Their partnership agreement provided that:
1 Akram received a partnership salary of $\$ 8000$ per annum
2 Partners be credited with interest on capital at 6\% per annum
3 Residual profits be shared in the ratio 3:2:1 respectively
4 Chuck be guaranteed a minimum share of residual profits of $\$ 7200$.
The partnership trial balance at 31 March 2010, after the preparation of the partnership trading account, was as follows.

|  | $\begin{gathered} \mathrm{Dr} \\ \$ \end{gathered}$ | $\begin{gathered} \mathrm{Cr} \\ \$ \end{gathered}$ |
| :---: | :---: | :---: |
| Gross profit |  | 383000 |
| Trade receivables (debtors) | 24000 |  |
| Trade payables (creditors) |  | 18000 |
| Inventories (stock) at 31 March 2010 | 37000 |  |
| Non-current (fixed) assets at cost |  |  |
| Buildings | 310000 |  |
| Machinery | 170000 |  |
| Vehicles | 120000 |  |
| Provisions for depreciation |  |  |
| Buildings |  | 105000 |
| Machinery |  | 68000 |
| Vehicles |  | 77000 |
| General expenses | 327000 |  |
| Bank |  | 14000 |
| Capital accounts |  |  |
| Akram |  | 160000 |
| Bhupesh |  | 110000 |
| Chuck |  | 80000 |
| Current accounts |  |  |
| Akram |  | 14000 |
| Bhupesh |  | 27000 |
| Chuck |  | 37000 |
| Drawings |  |  |
| Akram | 40000 |  |
| Bhupesh | 30000 |  |
| Chuck | 35000 |  |
|  | $\underline{\underline{1093000}}$ | $\underline{\underline{1093000}}$ |

## Additional information

1 A family holiday taken by Bhupesh, costing $\$ 3400$, had been entered in general expenses.

2 A bad debt of $\$ 500$ was written off during the year. It had not been entered in the books of account.

3 A bad debt of $\$ 400$ written off in the year ended 31 March 2009 was partially recovered. The debtor paid, by cheque, $\$ 0.50$ for each $\$ 1$ owed. No entries had been made in the books of account.

4 A machine purchased in January 2010 for $\$ 17000$ had been included in general expenses.

5 Depreciation is to be provided at the following rates:
Buildings at 2\% per annum on cost Machinery at $10 \%$ per annum on cost Vehicles at $40 \%$ per annum reducing balance.

A full year's depreciation is provided on non-current (fixed) assets acquired during the year.

## REQUIRED

(a) Prepare an income statement (profit and loss account) and an appropriation account for the year ended 31 March 2010.
(b) Prepare the partners' current accounts at 31 March 2010.

At the close of business on 31 March 2010 the partnership was taken over by EDC Ltd. The company took over all the assets and liabilities, with the exception of the bank balance, for a purchase consideration of $\$ 600000$.

The purchase consideration comprised:
$\$ 30000$ in cash;
$150000 \$ 1$ debentures at par shared equally between the partners;
300000 ordinary shares of $\$ 1$ in EDC Ltd. These were shared among the partners in their profit sharing ratios.

The partnership expenses incurred in the takeover amounted to \$20 200.

## REQUIRED

(c) Prepare the partners' capital accounts to close the books of account of the partnership. [16]
(d) Prepare the partnership bank account to close the books of account.

2 The balance sheets at 31 March 2010 and 2009 for Costello plc are shown below:

|  | 2010 |  | 2009 |  |
| :---: | :---: | :---: | :---: | :---: |
|  | \$000 | \$000 | \$000 | \$000 |
| Non-current (fixed) assets (Note 1) |  | 8080 |  | 5330 |
| Current assets |  |  |  |  |
| Inventories (stock) | 948 |  | 920 |  |
| Trade and other receivables (debtors) | 542 |  | 522 |  |
| Cash and cash equivalents (bank) | - |  | 580 |  |
|  | $\underline{1490}$ |  | $\underline{2022}$ |  |
| Current liabilities (creditors: amounts falling due within one year) |  |  |  |  |
| Trade and other payables (creditors) | (453) |  | (234) |  |
| Tax | (168) |  | (306) |  |
| Cash and cash equivalents (bank) | $\frac{(87)}{(708)}$ |  | $\frac{-}{(540)}$ |  |
| Net current assets |  | 782 |  | 1482 |
| Total assets less current liabilities |  | 8862 |  | 6812 |
| Non-current liabilities (creditors: amounts falling due after more than one year) |  |  |  |  |
| 7\% debentures (Note 2) |  | (360) |  | (500) |
| Net assets |  | 8502 |  | $6 \underline{612}$ |
| Equity |  |  |  |  |
| Ordinary shares of \$1 each fully paid (Note 3) |  | 3000 |  | 2000 |
| Share premium account |  | 1000 |  | - |
| Retained earnings |  | 4502 |  | 4312 |
|  |  | 8502 |  | 6312 |

The following information is available for the year ended 31 March 2010:
Profit from operations (operating profit) $\underline{\underline{393}}$
Finance costs (interest paid) $\quad \frac{(30)}{363}$
$\operatorname{Tax} \quad \frac{(168)}{105}$
Dividends paid
Retained profit for the year $\quad \overline{\underline{190}}$
Note 1
Non-current (fixed) assets

|  | $\mathbf{2 0 1 0}$ | $\mathbf{2 0 0 9}$ |
| :--- | ---: | ---: |
| Land | $\$ 000$ | $\$ 000$ |
| Cost | 2550 | 2550 |
| Additions | 450 | - |
| Revaluation | $\underline{500}$ | $\underline{-}$ |
| Book value | $\underline{3500}$ | $\underline{2550}$ |

There were no disposals of land during the year.

| Buildings | $\$ 000$ | $\$ 000$ |
| :--- | :---: | ---: |
| Cost | 1530 | 1530 |
| Additions | 1350 | - |
| Accumulated depreciation | $\underline{(900)}$ | $\underline{(430)}$ |
| Net book value | $\underline{1980}$ | $\underline{1100}$ |

There were no disposals of buildings during the year.

| Plant and machinery | $\$ 000$ | $\$ 000$ |
| :--- | ---: | ---: |
| Cost | 1600 | 1600 |
| Additions | 620 | - |
| Disposals | $(130)$ | - |
| Accumulated depreciation | $\underline{(810)}$ | $\underline{(400)}$ |
| Net book value | $\underline{1280}$ | $\underline{1200}$ |

During the year plant and machinery which had originally cost $\$ 130000$ was sold for $\$ 6000$. The depreciation charged on this plant and machinery was $\$ 98000$.

| Vehicles | $\$ 000$ | $\$ 000$ |
| :--- | ---: | ---: |
| Cost | 900 | 900 |
| Additions | 1270 | - |
| Disposals | $(200)$ | - |
| Accumulated depreciation | $\underline{(650)}$ | $\underline{(420)}$ |
| Net book value | $\underline{480}$ | $\underline{420}$ |

During the year vehicles which had originally cost $\$ 200000$ were sold at a profit of $\$ 7000$. The sales proceeds were \$37 000.

## Note 2

$\$ 140000$ debentures were redeemed on 30 September 2009.

## Note 3

In May 2009 a bonus issue of 1 new ordinary share for every 4 held was made. It is company policy to maintain reserves in their most flexible form. A rights issue of 1 ordinary share for every 5 held at a premium of $\$ 2$ each was made in February 2010.

## REQUIRED

(a) Prepare a statement to show the reconciliation of profit from operations (operating profit) to net cash flow from operating activities for the year ended 31 March 2010.
(b) Prepare a statement of cash flows (cash flow statement) for the year ended 31 March 2010 in good form.
(c) Calculate the net debt of Costello plc at both 31 March 2009 and 31 March 2010.

Prepare a reconciliation showing the movement between the two figures.
(d) State two reasons why a business might prepare a statement of cash flows (cash flow statement).

3 The committee of the Qadir Cricket club want your financial advice about employing Brad Driscoll at the start of next season.

Brad is a young player who has impressed cricket lovers all over the world. He would sign a 5 year contract. He would receive an initial payment and be paid a salary as follows:

|  | $\$$ |
| ---: | ---: |
| Initial payment | 200000 |
| Salary year 1 | 30000 |
| 2 | 36000 |
| 3 | 43200 |
| 4 | 51840 |
| 5 | 62208 |

The club would rent an apartment for Brad. The rent of the apartment would be as follows:

|  |  | Rent |
| :---: | :---: | :---: |
| Rear | 1 | 3600 |
|  | 2 | 3600 |
|  | 3 | 4500 |
|  | 4 | 4500 |
|  | 5 | 4500 |

The total rent for each year would be paid at the start of the year.
The club would pay Brad $\$ 1000$ at the end of each year towards the air fare to visit home.
Without Brad attendance receipts would remain constant at $\$ 1000000$ per year.
If Brad were employed receipts would rise by $10 \%$ each year.

## REQUIRED

(a) Calculate the net cash flow generated by the new player, Brad Driscoll.

The current cost of capital for the club is $12 \%$.
The present value of $\$ 1$ at an interest rate of $12 \%$ per annum is:
Year $1 \quad \$ 0.893$
Year 2 \$0.797
Year 3 \$0.712
Year 4 \$0.636
Year 5 \$0.507

## REQUIRED

(b) Calculate the net present value for Brad.
(c) Calculate the discounted payback period for Brad.

The Qadir Cricket Club has also considered employing a different player, Tanzeel. The club accountant has calculated the net present value of Tanzeel to be $\$ 181606$ and that his payback period would be 2.27 years. Tanzeel would retire from cricket at the end of year 3 .

## REQUIRED

(d) Advise the club committee which player they should employ, Brad or Tanzeel. Give reasons for your answer, using both financial and non-financial factors.
[Total: 40]

Permission to reproduce items where third-party owned material protected by copyright is included has been sought and cleared where possible. Every reasonable effort has been made by the publisher (UCLES) to trace copyright holders, but if any items requiring clearance have unwittingly been included, the publisher will be pleased to make amends at the earliest possible opportunity.

University of Cambridge International Examinations is part of the Cambridge Assessment Group. Cambridge Assessment is the brand name of University of Cambridge Local Examinations Syndicate (UCLES), which is itself a department of the University of Cambridge.

