

**MARK SCHEME for the May/June 2014 series**

**9706 ACCOUNTING**

**9706/41**

Paper 4 (Problem Solving [Supplement]),  
maximum raw mark 120

This mark scheme is published as an aid to teachers and candidates, to indicate the requirements of the examination. It shows the basis on which Examiners were instructed to award marks. It does not indicate the details of the discussions that took place at an Examiners' meeting before marking began, which would have considered the acceptability of alternative answers.

Mark schemes should be read in conjunction with the question paper and the Principal Examiner Report for Teachers.

Cambridge will not enter into discussions about these mark schemes.

Cambridge is publishing the mark schemes for the May/June 2014 series for most IGCSE, GCE Advanced Level and Advanced Subsidiary Level components and some Ordinary Level components.

1 (a)

Income statement for year ended 31 December 2013

|  | \$            | \$            |            |
|--|---------------|---------------|------------|
| Sales (\$85 000 + 20 000 (1) – 30 000 )            |               | 75 000        | (1) of     |
| Opening inventory                                  | 15 000        |               |            |
| Purchases (\$30 000 + 55 000 (1) – 25 000 ) (1) of | <u>60 000</u> |               |            |
|  | 75 000        |               |            |
| Closing inventory                                  | <u>30 000</u> | (1) both      |            |
| Gross profit                                       |               | <u>45 000</u> |            |
|  |               | 30 000        | (1) of     |
| Expenses   | 20 500        | (1)           |            |
| Interest on loan – Tan                             | <u>2 000</u>  | (1)           |            |
| Profit for the year                                |               | <u>22 500</u> |            |
|  |               | 7 500         | (1) of [9] |

(b)

Current account Tan

|             | \$           |        | \$               |              |
|-------------|--------------|--------|------------------|--------------|
| Balance b/d | 4 000        | (1)    | Share of profit  | 2 500 (1) of |
|             |              |        | Interest on loan | 2 000 (1) of |
| Drawings    | <u>2 000</u> |        | Balance c/d      | <u>1 500</u> |
|             | 6 000        |        |                  | 6 000        |
| Balance b/d | 1 500        | (1) of |                  |              |

(c)

Capital accounts

|               | Ann       | Jan       | Tan         |                     | Ann       | Jan       | Tan       |         |
|---------------|-----------|-----------|-------------|---------------------|-----------|-----------|-----------|---------|
|               | \$000     | \$000     | \$000       |                     | \$000     | \$000     | \$000     |         |
| Goodwill      | 12        | 6         | (1) row     | Bal b/d             | 40        | 40        | 30        | (1) row |
| Motor vehicle |           |           | 5 (1)       | Gain on revaluation | 10        | 10        | 10        | (1) row |
| Current Alc   |           |           | 1.5 (1) of  | Goodwill            | 6         | 6         | 6         | (1) row |
| Bank          |           |           | 67.5 (1) of | Loan                |           |           | 30        | (2)     |
| Bal c/d       | <u>44</u> | <u>50</u> | <u>76</u>   |                     | <u>56</u> | <u>56</u> | <u>76</u> |         |
|               | 56        | 56        |             | Bal b/d             | 44        | (1) of 50 | (1) of    |         |

(d) Dividend yield for XY limited

$$\frac{[100\,000 \times 8\%] (1) \div 100\,000 (1)}{\$2 (1)} \times 100 = \frac{\$0.08}{\$2} \times 100 = 4\% (1) \text{ of} [4]$$

(e) Dividend cover for XY limited

$$\$24\,000 (1) \div \$8\,000 (1) \text{ of} = 3 \text{ times } (1) \text{ of} [3]$$

|               |                                    |                 |
|---------------|------------------------------------|-----------------|
| <b>Page 3</b> | <b>Mark Scheme</b>                 | <b>Syllabus</b> |
|               | <b>GCE A LEVEL – May/June 2014</b> | <b>9706</b>     |

- (f) Option 1 will provide Tan with a return on his investment of 4% **(1)** of. He can buy  $\$67\,500 \div 2 \text{ share} = 33\,750 \text{ shares}$  **(1)** of which will give him income of  $33\,750 \times \$0.08 = \$2\,700$  **(1)** of.

Option 2 will provide him with no return until year 2 **(1)**. This will be just over 2.9% **(1)** ( $\$2\,000 \div 67\,500$ ) **(1)**.

Option 3 will give a return of 5% **(1)** ( $\$67\,500 \times 5\% = \$3\,375$ ) **(1)** of.

Option 1 may lead to both an increase in dividends in the future **(1)** and also possible capital growth in the value of the share **(1)**. The company looks reasonably secure with a dividend cover of 3 times **(1)** The shareholder would have voting rights **(1)** but no management role **(1)**. Dividends are not guaranteed but dependent on level of distributable profits. **(1)**. Limited liability **(1)**.

Option 2 is less secure **(1)** as his figures are only projections which may or may not happen **(1)**. unlimited liability **(1)**. He will be his own boss **(1)** but this comes with responsibilities **(1)** He can have all available profits but is also liable to all the losses **(1)**.

Option 3 is a safe return **(1)** but no chance of any growth of income or capital **(1)**. guaranteed return **(1)** fixed return **(1)**.

**2 marks per option (1) per advantage (1) per disadvantage.**  
**(1) decision (0–2) justification.**

**[Max 9]**

**[Total: 40]**

|        |                             |          |
|--------|-----------------------------|----------|
| Page 4 | Mark Scheme                 | Syllabus |
|        | GCE A LEVEL – May/June 2014 | 9706     |

2 (a)

**Bridlington PLC**  
**Income statement for year ended 30 September 2013**

|                         |                  |                     |
|-------------------------|------------------|---------------------|
| Revenue                 | 936 011          | (1)                 |
| Cost of sales           | <u>(484 263)</u> | (2)                 |
| Gross profit            | 451 748          | (1) of (narr. req.) |
| Distribution costs      | <u>(112 967)</u> | (4)                 |
| Administrative expenses | <u>(262 042)</u> | (5)                 |
| Profit from operations  | 76 739           | (1) of (narr. req.) |
| Tax                     | <u>(16 730)</u>  | (1)                 |
| Profit for the year     | <u>60 009</u>    | (1) of              |

Workings

Cost of sales:  $177\,838 + 479\,352 - 172\,927$  (1) = 484 263 (1) of

Distribution costs

|               |                |        |
|---------------|----------------|--------|
| Trial balance | 108 376        |        |
| Prepayment    | (2 760)        | (1)    |
| Loss          | 212            | (1)    |
| Depreciation  | <u>7 139</u>   |        |
|               | <u>112 967</u> | (1) of |
| Depreciation: |                |        |
| Buildings     | 11 200         |        |
| P + M         | 10 500         |        |
| M.V.          | <u>6 856</u>   |        |

Administrative expenses: 28 556 (1)

|               |                       |           |
|---------------|-----------------------|-----------|
| Trial balance | 236 758               |           |
| Accrual       | 4 525                 | (1)       |
| Provision     | (1 296)               | (1)       |
| Loss          | 638                   | (1)       |
| Depreciation  | <u>21 417</u>         | (1) split |
|               | <u>262 042</u>        | (1) of    |
| Provision:    |                       |           |
| Receivables   | $138\,450 \times 4\%$ |           |
|               | = 5 538               |           |
| Adjustment    | = 5 538 – 6 834       |           |
|               | t = (1 296)           |           |

[16]

| (b)                    | Land           | Buildings      | Plant and Machinery | Motor vehicle   |           |
|------------------------|----------------|----------------|---------------------|-----------------|-----------|
| <u>Cost</u>            |                |                |                     |                 |           |
| Balance 1/10/2012      | 100 000        | 280 000        | 95 000              | 81 000          | (1) row   |
| Additions              |                |                | 10 000              |                 | (1)       |
| Disposal               |                |                |                     | <u>(16 000)</u> | (1)       |
|                        | <u>100 000</u> | <u>280 000</u> | <u>105 000</u>      | <u>65 000</u>   |           |
| <u>Depreciation</u>    |                |                |                     |                 |           |
| Balance 1/10/2012      | Zero           | 78 400         | 66 500              | 44 578          | (1) row   |
| Disposal               |                |                |                     | (7 000)         | (1)       |
| Charge                 | <u>Zero</u>    | <u>11 200</u>  | <u>10 500</u>       | <u>6 856</u>    | (1) of    |
|                        | <u>Zero</u>    | <u>89 600</u>  | <u>77 000</u>       | <u>44 434</u>   |           |
| <u>NBV</u> at 30.09.13 | 100 000        | 190 400        | 28 000              | 20 566          | (1) of ro |
| <u>NBV</u> at 30.09.12 | 100 000        | 201 600        | 28 500              | 36 422          | (1) row   |

[10]

(c) **Assets**

**Non-current assets**

Property, plant and equipment 338 966 (1) of

**Current assets**

Inventories 172 927

Trade and other receivables 135 672 (2)

Cash and cash equivalents Zero

308 599

**Total assets** 647 565

**Equity and liabilities**

**Equity**

Share capital 400 000

Share premium 40 000

Retained earnings 117 395 (1) of

557 395

**Current liabilities**

Trade and other payables 55 768 (2)

Tax liability 16 730 (1)

Bank overdraft 17 672 (1)

90 170

**Total equity and liabilities** 647 565

Working

Trade and other receivables:

Trade receivables from TB 138 450

Provision (5 538)

132 912

Prepayment 2 760 (1)

135 672 (1)

Trade and other payables:

Trade payables from TB 51 243

Accrual 4 525 (1)

55 768 (1)

[8]

(d) **Equity**

Share capital 495 000 (2)

Share premium 20 000 (2)

Revaluation reserve 100 000 (1)

Retained earnings 120 010 (1) of

735 010

[6]

Working

Share capital 400 000 + 50 000 (1) + 45 000 (1) = 495 000

Share premium 40 000 + 25 000 (1) – 45 000 (1) = 20 000

Retained earnings 117 395 + 2 615 = 120 010

[Total: 40]

3 (a)

| Year  | Revenue<br>\$ | Costs<br>\$ | Interest<br>\$ | Net cash<br>\$ |        |
|-------|---------------|-------------|----------------|----------------|--------|
| 0     | (200 000)     |             |                | (200 000)      | (1)    |
| 1     | 110 000       | (40 000)    | (20 000)       | 50 000         | (1)    |
| 2     | 115 500       | (41 200)    | (20 000)       | 54 300         | (1)    |
| 3     | 121 275       | (42 436)    | (20 000)       | 58 839         | (1)    |
| 4     | 127 339       | (43 709)    | (20 000)       | 63 630         | (1)    |
| 5     | 133 706       | (45 020)    | (20 000)       | 68 686         | (1)    |
| Total | 407 820       | (212 365)   | (100 000)      | 95 455         | (1) of |

[7]

(b)

| Year                  | 10% Factor | Net cash flow | Net present value |        |
|-----------------------|------------|---------------|-------------------|--------|
| 0                     | 1.000      | (200 000)     | (200 000)         |        |
| 1                     | 0.909      | 50 000        | 45 450            | (1) of |
| 2                     | 0.826      | 54 300        | 44 852            | (1) of |
| 3                     | 0.751      | 58 839        | 44 188            | (1) of |
| 4                     | 0.683      | 63 630        | 43 459            | (1) of |
| 5                     | 0.621      | 68 686        | 42 654            | (1) of |
| Net present value (1) |            |               | 20 603            | (1) of |

[7]

(c)  $\$95\,455 \text{ (1) of} / 5 \text{ (1)} = \$19\,091 \text{ (1) of}$   
 $19\,091 / (200\,000 / 2) \text{ (1)} \times 100 = 19.09\% \text{ (1) of}$

[5]

(d)

| Year                    | 40% Factor | Net cash flow | Net present value |                        |
|-------------------------|------------|---------------|-------------------|------------------------|
| 0                       | 1.000      | 200 000       | – 200 000         | (1)                    |
| 1                       | 0.714      | 50 000        | 35 700            |                        |
| 2                       | 0.510      | 54 300        | 27 693            |                        |
| 3                       | 0.364      | 58 839        | 21 417            | (1) of if 40% D.F used |
| 4                       | 0.260      | 63 630        | 16 544            |                        |
| 5                       | 0.186      | 68 685        | 12 775            |                        |
| Total                   |            |               | – 85 870          | (1) of                 |
| Internal rate of return |            |               | 15.81%            |                        |

$10\% \text{ (1)} + [30\% \text{ (1)} \times \$20\,603 / \$ (20\,603 + 85\,870) \text{ (1) of}] = 15.81\% \text{ (1) of}$

[7]

(e) Drake should invest in Project Sylvania (1), because the accounting rate of return is greater (1) of, the net present value is greater (1) of, and the internal rate of return is greater (1) of than Project Utopia.

[4]

|               |                                    |                 |
|---------------|------------------------------------|-----------------|
| <b>Page 7</b> | <b>Mark Scheme</b>                 | <b>Syllabus</b> |
|               | <b>GCE A LEVEL – May/June 2014</b> | <b>9706</b>     |

- (f) Interest would not be charged to the project (1), therefore the profits should be higher (1).  
This will result in a higher accounting rate of return (1).  
 $ARR = 195\,455 / 5 = 39\,091$  (1) of  $100\,000$  (1) = 39.09% (1) of.
- (g) Preference shares fixed dividend (1) in priority to ordinary shareholders (1).  
Debenture secured on the asset (1). Interest charged may be at a lower rate than on the bank loan (1). Interest is charged before dividend is paid to ordinary and preference shareholders (1).  
Sale of surplus non current assets (1) as long as this does not affect trading (1).  
Venture capitalist could invest (1) but would require a return on his investment (1)

Accept other reasonable alternatives.

[Max 4]

[Total: 40]