Examiner's report
F9 Financial Management
September 2017

General comments
The F9 Financial Management exam is offered in both computer-based (CBE) and paper-based (PBE) formats. The structure is the same in both formats, but the CBE exam delivery model means that candidates do not all receive the same set of questions. In this report, the examining team share observations from the marking process, highlight strengths and weaknesses in candidates' performance, and offer constructive advice for future candidates.

- Section A objective test questions – we focus on two specific questions that caused difficulty in this sitting of the exam
- Section B case-based objective test case questions – here we look at the key challenge areas for this section in the exam
- Section C constructed response questions - here we provide commentary around some of the main themes that have affected candidates' performance in this section of the exam, identifying common knowledge gaps and offering guidance on where exam technique could be improved, including in the use of the CBE functionality in answering these questions.

Performance in the September 2017 examination diet was good and there were some excellent individual performances. Congratulations to those candidates who were successful in this examination diet. If you were not successful, I hope that you will study this report carefully as part of your preparation for your next attempt.

It is worth re-emphasising that candidates sitting this examination must study the whole of the syllabus to prepare themselves adequately for this test of Financial Management skills. Overall, candidates were well prepared in some areas of the syllabus, in particular those that have featured regularly such as calculating NPV, but less well prepared in others. Furthermore, candidates are in general well prepared in techniques requiring calculation, but less well-prepared in discussing knowledge and explaining terms and concepts.

<u>Section A</u>

The objective test questions in Section A aim for a broad coverage of the F9 syllabus, hence all areas of the syllabus must be studied. Candidates preparing for the F9 examination are therefore advised to work through as many practice objective test questions as possible, reviewing carefully how correct answers were derived in any areas where they have uncertainty.

The following questions are reviewed with the aim of giving future candidates an indication of the types of questions asked and guidance on dealing with such exam questions.

Example 1 is numerical and illustrates the importance of reading the full question and understanding the difference between cum interest and ex interest.

Example 2 is a question requiring knowledge of the operations of the money market.

Example 1

Geeh Co paid an interim dividend of $0.06 per ordinary share on 31 October 20X6 and declared a final dividend of $0.08 on 31 December 20X6. The ordinary shares in Geeh Co are trading at a cum-div price of $1.83.

What is the dividend yield (to one decimal place of a percentage point)?

The correct response is 8.0, as follows:
Dividend yield is a measure of the dividend from the last 12 months divided by the current ex-div share price.
Dividend for the year = $0.08 + 0.06 = $0.14.
Ex-div share price = $1.83 - 0.08 = $1.75. ie with the forthcoming dividend stripped out
0.14/1.75 = 8%

Example 2

What role would the money market have in a letter of credit arrangement?

A Initial arrangement of the letter of credit
B Acceptance of the letter of credit
C Issuing of a banker's acceptance
D Discounting the banker's acceptance

The correct response is D.

A is incorrect as this would be done by the buying company's bank.
B is incorrect as this would be done by the selling company's bank.
C is incorrect as this is another role which would be undertaken would be done by the buying company's bank.
D is correct as if an early cash receipt was required, the banker's acceptance would be sold on the money market at a discount.

<u>Section B</u>

Similarly to Section A, questions can come from any area of the syllabus.

General comments

Candidates should read the question carefully and follow the instructions on how to answer the question, for example if a question asks the candidate to select two correct statements, then marks can only be awarded if two statements have been selected. There is no partial marking, so an answer which only selects one statement will be awarded no marks.

In addition, when answering a number entry question, candidates must ensure they are entering their answer in the correct format as stated in the requirement.

Issues that were noted under specific syllabus areas are as set out below.

Investment appraisal

There were common errors were made by some candidates on numerical investment appraisal questions. For example, some candidates did not identify correctly relevant cash flows for an investment project, or made mistakes with respect to the timing of future cash flows.

Additionally in a capital rationing questions, a number of candidates appear to have not considered the cash outflows in selecting their investment projects, instead only considering the cash inflows.

Future candidates must read the question carefully to identify the correct timing of all project cash flows.

One other area which caused difficulty for some candidates was selecting the appropriate discount rate to be used in a lease versus buy evaluation.

Business valuation

One common error was not identifying that the dividend growth model can be used to value a company that does not currently pay any dividends. This is incorrect as it can be used if there is an expectation of future dividend payments.

Another error was not including the value of a dividend about to be paid if the share was cum dividend.

Price earnings ratio questions caused difficulties for some candidates, one particular issue being the need to deduct preference dividends before applying a price earnings multiple.

Risk management

It was common for candidates to make errors through lacking understanding of the features of risk management derivatives. This was from both a foreign exchange and an interest rate perspective, but particularly noticeable for questions on interest rate derivatives and especially interest rate futures.

In questions on foreign exchange hedging it was common to see errors occurring from candidates selecting the incorrect exchange rate and not time apportioning interest rates in a money market hedge calculation.

Candidates should also learn how to work out the cost of a lead payment to be able to validly compare with the cost of a forward exchange contract.

There was one further area relating to interest rates which candidates struggled with which was understanding of gap exposure and the significance of the types of gap for the company.

Financial management environment

A lack of understanding how a company could introduce measures to reduce stakeholder conflict and what a company should do to maximise shareholder wealth led to errors for this part of the syllabus.

Section C

Candidates in general performed better on calculation-based questions than on discussion questions. There were many reasonable attempts at most parts of questions, but there were also some scripts with parts of questions not attempted.

Requirements must be read carefully and answered directly. It is essential that candidates address the requirement of a question. Candidates should therefore avoid making the mistake of trying to answer the question they would have preferred and focus on the requirement before them. Candidates should also go back to the requirement in front of them on a regular basis, to make sure their answer continues to address it.

If the requirement is to calculate, then carefully labelled calculations should be offered. If the requirement is to calculate and comment, then make a comment based on the outcome of your calculations.

Furthermore, if asked to critically discuss, it is rarely sufficient to simply list a few points. A critical discussion should involve looking at a viewpoint or a statement in more than one way, for instance by looking at both its good aspects and those aspects which warrant some criticism.

Candidates must also exercise good time management in the examination. If six marks are offered for discussing three advantages, assuming that two marks are offered for each term is reasonable. Discussing a fourth or even fifth advantage, when only three are required, is both poor examination technique and poor time management.

Candidates must use the information provided in a question. If a question specifies a 30% corporation tax rate payable one year in arrears, then failure to use the correct rate and implement a one year time lag for all elements of the tax liability, e.g. the corporation tax due on pre-tax cash flows and also the tax allowable deprecation tax benefits, are errors which mean that valuable marks are not earned and could be the difference between passing and failing the examination.

If the question specifies that a company has four distinct sources of finance and a weighted average cost of capital is required, then all four elements need to be considered, and separately calculated, before using them in the final WACC computation.

Candidates were presented with questions drawn mainly from the areas of:

- Management of inventories, accounts receivable, accounts payable and cash
- Determining working capital needs and funding strategies
- Investment appraisal techniques
- Allowing for inflation and taxation in DCF

- Adjusting for risk and uncertainty in investment appraisal
- Specific investment decisions
- Sources of and raising business finance
- Estimating the cost of capital
- Sources of finance and their relative costs

Management of inventories, accounts receivable, accounts payable and cash
This part of the F9 syllabus includes outcomes relating to the use of relevant techniques in managing accounts receivable including using factoring and invoice discounting, and managing foreign accounts receivable.

In questions that ask for an assessment of whether a factor's offer is acceptable or not, candidates need to be clear and consistent in their approach: a 'benefits versus costs' approach is fine, as alternatively is a 'before and after' approach. Unfortunately, sometimes the approaches get mixed up by candidates. In addition, most candidates can score the more straightforward marks such as those for administrative cost savings, reductions in bad debts and the factor's fee. Sadly, not enough candidates appreciate the change in the cost of financing receivables once a factor is used, and many simply ignore it and lose out on valuable marks. Part (a) of published question Widnor Co from June 2015 demonstrates the techniques required.

Most candidates are now appreciative of the fact that a statement regarding the acceptance or otherwise of a factor's offer is required and score the mark(s) available for a comment.

Responses to a requirement about managing foreign accounts receivable were generally good. Better responses focussed on ways that were specific to foreign accounts receivable such as using banks that specialise in international trade, or obtaining export credit cover or export credit insurance. Part (b) of ZXC Co from December 2015 is a good example of such a requirement.

One question at this diet related to the outcome that requires an understanding of the cash operating cycle. The requirement to calculate this was generally done very well, with many candidates scoring full marks. Part (a)(i) of Pangli Co from March/June 2017 exemplifies such a requirement.

Determining working capital needs and funding strategies
The F9 syllabus and study guide sets out the detailed outcomes for being able to describe and discuss the key factors in determining working capital funding strategies. Answers to a question requiring critical discussion of this topic area should therefore refer to permanent and fluctuating current assets, the relative cost and risk of short-term and long-term finance; the matching principle, aggressive, conservative and matching funding policies, and relevant management attitudes.

That said, many candidates did not mention permanent and fluctuating current assets and comments offered on conservative and aggressive financing policies were often vague, imprecise and lacking in detail.

Investment appraisal techniques

Candidates usually do well on investment appraisal questions requiring NPV calculations and that continued to be true in this examination diet, with many candidates gaining good marks here. Where errors were found, they were errors mentioned in previous reports, for example:

- incorrectly placing initial investment at year 1 rather than year 0
- incorrectly placing the terminal value at year 5 rather than year 4
- inflating relevant cash flows incorrectly
- not placing tax-related cash flows one year in arrears
- omitting the tax-related cash flows in year 5
- working capital computations omitted, or done incorrectly with a lack of appreciation of the meaning of incremental working capital and its subsequent recovery
- adding tax-allowable depreciation benefits before calculating tax liabilities
- not calculating a balancing allowance, or calculating a balancing allowance but not adjusting it for the scrap value of the asset
- discounting nominal cash flows with a real discount rate
- not justifying financial acceptability comments by failing to refer to the decision rules relevant to the techniques

Whilst the calculations for investment appraisal techniques are generally done well, improvement is required when it comes to discussion. Specific requirements within the F9 syllabus are to discuss the usefulness of an investment appraisal method, discuss the superiority of discounted cash flow (DCF) methods over non-DCF methods, and to discuss the relative merits of NPV and IRR.

For example, candidates can produce very good NPV computations and calculate payback periods correctly, but if there is a conflict between the two methods regarding acceptability then many candidates could improve their discussions about respective investment appraisal methods and are often reluctant to assert the superiority of one method (NPV) over another.

Allowing for inflation and taxation in DCF

In order to explain further the point noted above regarding inflating relevant cash flows, some candidates do not apply a 'per year inflation rate' correctly. If an inflation rate of 4% per year needs to be applied to a selling price per unit or a variable cost per unit, then by the end of year 3 a given price or cost per unit needs to be inflated three times i.e. by 1.04^3. The published question Vyxyn Co from March/June 2017 illustrates this point, as does Hebac Co from September 2016.

A number of answers to a question at this diet used an incorrect discount rate, usually where the real discount rate, as well as the nominal discount rate, was provided by the question and was then used to discount the nominal values already calculated.

Adjusting for risk and uncertainty in investment appraisal

This area of the F9 syllabus includes a requirement for candidates to be able to describe and discuss the difference between risk and uncertainty in relation to probabilities and increasing project life, and to be able to apply sensitivity analysis to investment projects and discuss the usefulness of sensitivity analysis in assisting investment decisions.

Candidates' responses in these areas are quite variable. A good explanation of the difference between risk and uncertainty would involve more than simply stating that the one is quantifiable and the other is not. Published question Vyxyn Co from March/June 2017 demonstrates this. Furthermore, whilst sensitivity analysis can be often be explained by candidates, a critical discussion should also include an explanation of its limitations. Published question Hraxin Co from June 2015 exemplifies this point.

Additionally, when asked to perform a sensitivity analysis calculation, the basic structure of the percentage computation is usually reproduced and performed by prepared candidates, but far too many candidates fail to take into the tax effects of a change in a variable.

Specific investment decisions

This topic area of the F9 syllabus includes capital rationing where candidates are expected to be able to evaluate investment decisions under single period capital rationing, where projects may be divisible or indivisible. As previously noted, it is vital to have read the scenario fully and with attention to the details contained within it. Such details may include information about whether a divisible or non-divisible approach should be taken or as to whether a particular project must definitely be undertaken.

Candidates should take care to set out their analysis fully. Under a divisible approach, project profitability indices should be calculated and displayed, as should the ranking of projects. It should be clear to a marker how the optimal use of the limited funds and the total NPV has been arrived at. Under an indivisible approach, it is good examination technique to show all feasible project combinations and the associated total NPV of each, before arriving at a conclusion regarding the optimum combination of projects.

Sources of and raising business finance

This part of the syllabus requires candidates to be able to identify and discuss a range of sources of finance available to businesses and this can include debt, equity, short term and long term finance, internal finance and Islamic finance.

When answering a question in these areas, there is a tendency for candidates to write all they know about the topic or to write in general terms about one of the areas, without focusing precisely on the specific requirements of the question. For example, if the requirement is about a specific type of debt finance, the candidate's answer should address that type of finance precisely.

At this diet, when a requirement asked for an evaluation of a particular type of debt, it was clearly asked from the viewpoint of the user of the finance, which was a company listed on a large stock exchange, and not the providers of the finance. Better responses understood this important difference of viewpoint.

Estimating the cost of capital

A question requiring candidates to calculate the market value weighted average cost of capital (WACC) of a company saw many candidates gaining good marks. Errors that led to candidates losing marks have been seen in previous examination diets, as follows:

- errors in calculating a cost of equity using the dividend growth model (DGM), such as using the cum div share price and not the ex div share price or, in a separate question, using the DGM to calculate the cost of equity when the use of CAPM was required
- inability to calculate the cost of capital of preference shares correctly such as using an 'after tax' preference dividend
- errors in calculating an after-tax cost of debt of loan notes using linear interpolation, such as not using after tax interest in the IRR calculation or not including the redemption value of the loan note at its stated premium
- using nominal value as the purchase price of loan notes rather than market value
- failing to include a bank loan cost of debt or including it on a before-tax rather than an after-tax basis
- omitting a bank loan from a WACC calculation
- using book values instead of market values as weightings when the requirement clearly asked for the WACC on a market value basis
- making debt weightings after tax

A question at this diet specified that the company had four distinct sources of finance. Hence, all four elements need to be considered, and a separate cost and value calculated for each.

Sources of finance and their relative costs

A detailed outcome in this topic area of the F9 syllabus refers to assessing the impact of the cost of capital on investments including the circumstances under which WACC <u>can</u> be used in investment appraisal.

The key to answering a question such as this is to focus on the requirement. Indeed, a common mistake in one question at this diet was to discuss circumstances under which it was <u>not</u> appropriate to use the current WACC and how WACC could be amended to address these circumstances. This was not what was asked.

Some answers were not even related to the requirement, discussing instead capital structure theory, or the creditor hierarchy, or pecking order theory, to name but three.

Capital structure theories and practical considerations

Responding to a question requiring a discussion of the problem of high levels of gearing, responses were generally satisfactory with answers discussing interest payment commitments, the inability to raise further finance or only being able to raise further finance with strict conditions attached.

Word Processing and Spreadsheet Technique

Candidates must remember to include all your workings in your CBE answers and to label all your entries in a spreadsheet: markers can struggle to understand calculated figures if candidates offer no guidance as to their meaning. By way of example, a cell that displays the figure 0.12 or 12 for cost of equity must be appropriately labelled in an adjacent cell. Markers will then investigate the contents of the cell in order to see the formula used.

Care must therefore be taken in entering formulae in the spreadsheet. Markers can see the formula in a cell and hence apply the own-figure rule where appropriate. However, the own-figure rule cannot be applied to calculated figures placed in spreadsheet cells (number entry) with no supporting calculations.

Spreadsheets should be presented as they would in a professional work environment, with the text entered into a cell clearly visible without the need for markers to manipulate the spreadsheet, for example, via column width.

Guidance and Learning Support resources to help you succeed in your exam

(ACCA will insert a standard working here, but please list any specific resources that you are aware of that are relevant to problem flagged in the report – such as approach articles, technical articles or videos.)