AQA

Functional Skills Certificate
MATHEMATICS

4367 Level 1
Report on the Examination

4367
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General

The majority of the paper appeared to be accessible, with most questions attempted by all students. Arithmetical errors were sometimes seen, showing evidence that some students did not use a calculator. Working was usually clear and conclusions were usually given where required.

Topics that were well done included:
- picking the correct ferry time from a timetable
- using a conversion graph
- calculating the cost of mugs and pans
- calculating the number of years needed for solar panels to make savings.

Topics that students found difficult included:
- calculating the mean
- calculating with multi-step costs
- carrying out checks
- finding the cost of electricity units.

Task 1 Camping in France

(a) The correct ferry cost was chosen by the majority of students, with the most common error being £225

(b) The more successful students managed to work all the way through to the correct answer, and almost all were able to make some progress. Many students managed to calculate the cost of 7 nights camping from 7 × £52, and many went on to add together a campsite cost and a ferry cost. The most common error was to omit the first ferry cost of £245, resulting in the incorrect answer of £140.75. Another common error was to include the cost of only one night at the campsite. A small number of students divided each ferry cost by 4 first but often went on to make errors in calculating the cost per person for the tent, with many dividing by 7 instead of 4.

(c) Students could usually read off the value of 320 km in miles, though a small number misread the scale and read off at 310.

(d) Most students multiplied their answer to **(c)** by 12. However, the units were often missing or incorrect, for example giving the answer as £2400 instead of 2400p or £24.

The check was not well done, with many doing the same calculation again.

(e) The majority of students could make progress with the plan, and often gave the correct distances and nights for their chosen campsites. A large number of students failed to ensure the nights added up to 10. Other errors included no return to Caen, or using Caen as a campsite. Students almost always communicated their plan clearly.

Task 2 Market stall

(a) This question was well answered, with only a small number of students failing to show that they were adding the two totals for pans and mugs.

(b) This question was a long multi-step question with much to consider. Many students made some progress, but a lot lost their way. A small number concentrated on the pans and their reduced price and did not consider the mugs at all. The reduction by 10% caused some problems, with a common error being to use 5.02 as 90% of 5.20. Some students then multiplied the reduced price by 65 instead of by 35, or failed to include the income from the 65 full price pans. The most common error was to fail to subtract the £630 at the end, just comparing their total income with £225.

(c) This question was generally answered well. There were a large number of fully correct answers, but also all the anticipated errors, the most common being the use of Tom in afternoon slots and the inclusion of Ali for more than the stated 3 hours maximum. Only rarely did candidates use a person twice in the same slot, and only rarely did they use a candidate for 5 or more hours. Attempting to schedule unnecessary breaks caused some problems.

Task 3 School newspaper

(a) There were some succinct correct responses to this question. Other students were able to make some progress, while some combined the given numbers in all possible ways. The most common error was to give 3 reams as the answer.

(b) The major problem in this question was the mix of units. A large number of students either gave answers of £16 500 and £18 000 or gave mixed units, for example 16 500 and 180.

(c) Completion of the symmetrical pattern was done well by a large number of students. A small number either shaded just 9 squares or had an odd square incorrect. The most common completely incorrect answer was to repeat the pattern as a translation. A small number of students shaded squares randomly.

(d) Calculating the mean caused the usual issues, with the mode or median often being found instead. However, a good proportion of students then correctly compared their mean with the number of lines needed for the whole article, although a significant number failed to say whether or not Rafiq was correct.

Task 4 Solar panels

(a) This question was well answered, with almost all students arriving at an answer of 12 years from £7800 ÷ £650. A few students tried to use laborious build up methods, sometimes leading to inaccuracies.

Few students were able to carry out a check; the most common method being to carry out a reverse calculation rather than an alternative method. Many made no attempt.

(b) Students generally coped well with scale drawing to fit in the solar panels. Many gave a fully correct drawing. The most common error was to have an incorrect size for their solar panel, but these students gained some credit for fitting in their panels.

(c) The majority of students could follow at least some of the steps needed to answer this question. Common mistakes were to leave out one of the algebraic steps or to do × 3 × 11 or × 16 × 11. A large number of students forgot to make a conclusion.

(d) The majority of students struggled with the final part of this task, not subtracting the meter readings. A large number simply multiplied 18p by 6502. Very few students successfully rounded the correct answer to the nearest £10, with rounding to the nearest pound being a common incorrect alternative.

Mark Ranges and Award of Grades

Grade boundaries and cumulative percentage grades are available on the Results Statistics page of the AQA Website.

Converting Marks into UMS marks

Convert raw marks into Uniform Mark Scale (UMS) marks by using the link below.

UMS conversion calculator