MATHCONCEPT 數學・思維 Learning Center

Quick Test 8 (Secondary 2 Standard)

- The test has to be completed in 30 minutes.
- The questions follow the latest Syllabuses for Secondary Schools Mathematics (Secondary 1 - 5) from the Hong Kong Curriculum Development Council.

Answers (Free detailed solutions can be obtained in our centers)

1) 19.5425%   **2)** 6:9:8   **3)** $(3x + 1 + y)(3x + 1 - y)$ **4)** 26   **5)** 1   **6)** 18.24 cm^2

7) $\triangle$AFG ~ $\triangle$ADE   **8)** -7 or 23   **9)** 16   **10)** 118.8°

Number of correct questions	Comment
0~4	Below average
5~6	Unstable
7~8	Standard
9~10	Distinction

"Quick Test" is only a preliminary assessment. **MATHCONCEPT Diagnostic Test (MDT)** is designed to determine precisely the math level of the student and analyze their strength and weakness on different math topics. You are welcomed to make appointment for assessment in any of our MathConcept center.

MATHCONCEPT Diagnostic Test (MDT)

"MATHCONCEPT Diagnostic Test" consists of two parts and the whole test requires around 60 to 90 minutes to complete. The first part is a written test that designed to evaluate the student's strength and weakness with respect to grade-level material. The second part of the assessment is a series of oral questions that designed to evaluate student's understanding of key math concepts and skills. After the student has completed the assessment, our qualified MATHCONCEPT tutor will then explain thoroughly about the test result to the parents, generate a tailor-made learning plan and give out the curriculum materials that cater to the unique needs of each student.


Assessment Report

Learning Plan

1) Janet's tuition is $ 2000 per month. If the tuition in the following 3 years increases by 3.5%, 5% and 10% respectively, what is the percentage increase in tuition after 3 years?

2) If $x : y = 2 : 3$ and $x : z = 3 : 4$, find $x : y : z$.

3) Factorize $1 + 6x + 9x^2 - y^2$.

4) Given that $x + y = 6$ and $xy = 5$, find the value of $x^2 + y^2$.

5) Given that $a + \dfrac{1}{b} = 1$ and $b + \dfrac{1}{c} = 1$, find the value of $c + \dfrac{1}{a}$.

6) Find the area of the shaded part in the following figure. Correct the answer to the nearest hundredth. (Take $\pi = 3.14$)
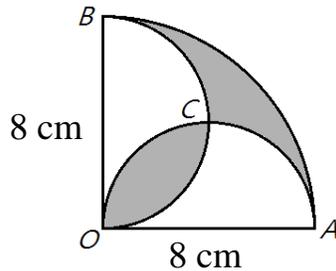
7) In the figure below, BC // DE, find a pair of similar triangles.
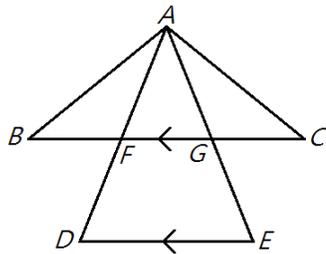
8) If the distance between point A(8, –3) and point B(k, –3) is 15 units, find the possible values of k.

9) In $\triangle$ ABC, BD $\perp$ AC. If AB = 20, BC = 13 and CD = 5, find the length of AD.
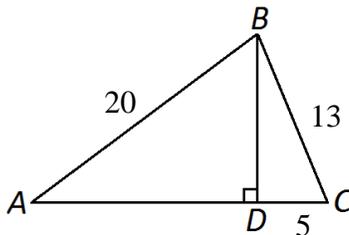
10) In a school, 42% of the population are male students, 33% of them are female students and 25% of them are teachers. If these data are displayed in a pie chart, what is the central angle of the section that represents female students?