Name:

## QUIZ 21 - MATH GRADE 9

1. (5\%) Name all the quadrilaterals with 2 pairs of parallel lines.
2. (15\%) True or False
a. Every square is a parallelogram, trapezoid and rectangle (True / False)
b. Every parallelogram is a square (True / False)
c. Every Rhombus is a Parallelogram (True / False)
d. Every Trapezoid is a Parallelogram (True / False)
e. Every Rectangle is a Trapezoid (True / False)
3. (10\%) Sketch and find the missing part in the figure:

Area $=40 \mathrm{~cm}$, Base $=8 \mathrm{~cm}$, Height $=$ $\qquad$


Can the side length be calculated? explain
4. ( $10 \%$ ) Sketch and find the missing part in the isosceles trapezoid:

Area $=42 \mathrm{~cm}$, Base $1=9 \mathrm{~cm}$, Base2 $=5 \mathrm{~cm}$, Height $=$ $\qquad$
Side length: $\qquad$

5. ( $10 \%$ ) Sketch and find the missing part in the figure:

Area $=72 \mathrm{~cm}$, Diagonal1 $=9 \mathrm{~cm}$, Diagonal $2=$ $\qquad$
Side length: $\qquad$

6. ( $20 \%$ ) Sketch an isosceles trapezoid whose area is $20 \mathrm{~cm}^{2}$ and find its perimeter.
7. (30\%) Given that ABCD is a parallelogram, $\mathrm{AB}=10 \mathrm{~cm}, \mathrm{BC}=20 \mathrm{~cm}, \mathrm{FC}=14 \mathrm{~cm}$, $\mathrm{EC}=\mathrm{DC}$, diagram not to scale, find:
a. $(10 \%)$ The area of the parallelogram ABCD

b. $(10 \%)$ The perimeter of the trapezoid AFCE
c. $(10 \%)$ The area of the trapezoid AFCE

