

GATITUMIXED SECONDARY SCHOOL

MATHEMATICS FORM 1 CAT 2 2013

1. Evaluate  $3\frac{7}{8} + \sqrt{\left(\frac{3\frac{7}{8} \div 7\frac{3}{4}}{5\frac{1}{10} + 2\frac{9}{10}}\right)}$  3mks

2. Simplify  $\frac{x - 2y}{12p} - \frac{x + 3y}{60p}$  2mks

3. convert into decimal  
a)  $5\frac{3}{7}$  2mks

b) convert into fraction 0.375 2mks

4. find the sum of a third of ( a+b) and a fifth of (a -b) 2mks
5. Three asterns in a public lavatory are designed to flush at intervals of 8, 13 and 15 seconds. After how many minutes will they flush together? 3mks
6. Juma spent half of his July salary on school fees, one eighth on farming and two thirds of the remainder on food. Calculate his July salary if he spent sh. 3200 on food 3mks

7. Simplify by use of common factors. 2mks

$$\frac{2m - am - 2y + ay}{2m + 2y - am - ay}$$

8. if r =5, s =2 t =3. find the value of 2mks

$$\frac{r}{s+t} - \frac{S}{t+r} - \frac{t}{r+s}$$

9. find the square root using factor method  
3136

2mks

10. Four children bought 2.5 litres, 4.0 litres, 5.5 litres and 3.5 litres of milk from a dairy farm. If one litre of milk costs sh. 42, how much money did they pay altogether 3mks

11. Find the value of unknown

2mks

a)  $\frac{2x}{5} = \frac{18}{15}$

b)  $-2247 \div x = 321$

2mks