Feedback from Methods Test 2

1. a) several used $\geq$ instead of $\neq$

b) most got domain but were confused with range. Plug in a variety of values for x to see a trend. Ie $x=-100,-10,0,10,100$. You should see that the fraction will approach zero from the positive side with the positive and negative values of x and the maximum it can be is when $x=0$ which is $\frac{1}{2}$

2. a) many used $-6x$ not $+6x$ when expanding the bracket

b) again using a negative not a positive when expanding bracket

Not multiplying every term by 14, many left the 1 as 1 and only multiplied the fractions.

3. a) (i) many found $\frac{f(1)}{3}$ instead of $3f(1)$

(ii) not using a bracket around the $g(2)$ when subtracting

b) many solved for t not x

many solved for $f(17)$ not $f(t)=17$

c) many didn't recognise that if integers are the domain, there will be a fixed number of values in the range.

Many included -2 and 3 in the domain instead of using $x=-1,0,1,2$ only to get the range.

d) several students tried to complete the square to get the TP rather than use $\frac{-b}{2a}$ to get the LoS and subs this in to get y.

Forgetting to state that it was a max

Not showing correct y int

Not extending parabola through the plane

4. a) many forgetting to solver for a in $y=ax^2+bx+c$

b) many didn't use the factorised form to write equation

5. mostly well done. Some students confused C as $-3x+y=5$not $3x+y=5$

6. a) well done

b) well done

c) not rearranging the table so that x values increase by 1. This question was straight out of the text book.

7. spent too much time on these questions and used x and y rather than P and t

8. spent too long on small questions and didn't use e-activities or solve on classpad

9. didn't solve on classpad

10. (minus 1 per error) many not recognising what makes a function

11. didn't answer the question and didn't find the gradient. Or many said gradient was $x=¿$ or $y=¿$ not $m=¿$

12. ran out of time. This question should have been completed first as it is straight off Classpad.