**Animals Gone Wild Equations Project**

**(Part 2)**

Remember that incredibly satisfying project you completed last chapter? The one where you drew a stunning photo of a fish / bird / ptarmigan? Well, good news! That was only Part 1! You get to continue on with the same drawing!

Part 2 is much shorter. So let’s get right to the instructions:

1. Remember those twelve lines (actually, line segments) that you were supposed to draw in Part 1 of this project? What – you *don’t* remember them? Well, here they are listed once again:

a) one horizontal line
b) one vertical line
c) two lines with DIFFERENT positive slopes
d) two lines with DIFFERENT negative slopes
e) two lines that are parallel (these can NOT have the same slope as any of the lines in a, b, c, and d)
f) two lines that are perpendicular (these can NOT have the same slope as any of the lines in a, b, c, d, and e)
g) a line that goes through  and has a slope of 
h) a line that goes through  and has a slope of 
2. The first thing you should do is make any corrections to the slopes you calculated for each of these twelve lines. If you do *not* make the corrections I guarantee that you will get the answers wrong in Part 2 of this Project.
3. For each of the twelve lines, take the slope (that you already calculated in Part 1) and pick one point on the line, and use them to find the equation of the line. Specifically, for each of the twelve lines you must find the equation in three different forms: (a) point-slope form (find this one first); (b) slope-intercept form (find this one next), (c) standard (or general) form (find this one last)
4. Additionally, you must repeat the process in step (3) *twice* for one of your positively or negatively sloped lines. You’ll do it once with the slope and a point on the line and then you’ll do it again with the same slope but a *different* point on the line.
5. So, in total, that is 39 equations you need to provide! Twelve lines x 3 equations each = 36 equations. But then, you have to do the process twice for one line so that is 3 more equations. 36 + 3 = 39 equations total. Yes, it is repetitive. But it really shouldn’t take you more than about 30 minutes if you understand the process. Good luck (and don’t forget to hand Part 1 back in with the Part 2 work).