

DAY 3

Solver Method

$$A = B$$

$$0 = B - A$$

MATH

Guess $x = 19$

alpha enter

Intersection Method

$$Y_1 = Y_2$$

Y =

$$Y_1 = 235x - 16x^2$$

$$Y_2 = 151$$

Zoom 6

Window

$$X_{\min} : 0$$

$$X_{\max} : 20$$

$$Y_{\min} : 0$$

$$Y_{\max} : 200$$

Zoom zoomfit

CALC - 2nd trace

CALC 5

1st Cure: enter

2nd Cure: enter

Guess: 10 ENTER

X = 14.01 Y = 151

Calc 5

1st Cure L enter

2nd Cure L enter

Guess: 1

X = .6734... Y = 151

Today Do Cubic &
Quartic
Regression

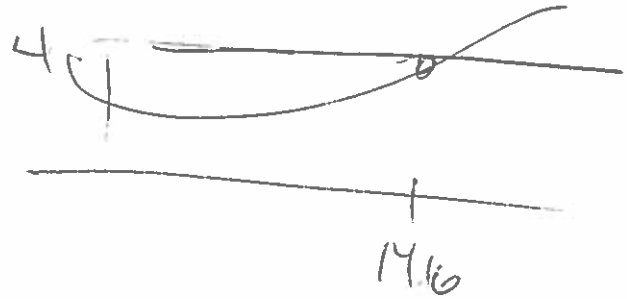
STAT > Calc 6 Cubic enter

$$Y = -.001x^3 + .10x^2 - 1.3x + 69$$

Y= VARS 5 > > 1

$$Y_1 = \text{reg} \quad Y_2 = 4$$

I expect with Cubic
Regression That
4 people aged 14 will
like Lady 9.

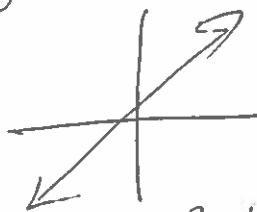


Linear

$$y = ax + b \quad 1 \text{ Face}$$

~~Quadratic~~

$$a > 0$$



Disco Right

$$a < 0$$



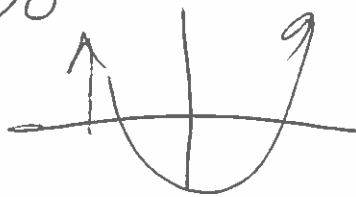
Disco Left

Quad.

$$y = ax^2 + bx + c$$

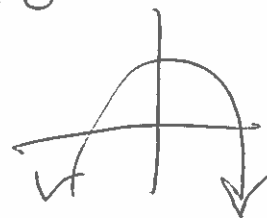
2 face

$$a > 0$$



Happy Parabola

$$a < 0$$



Sad

$$y = 3x^2 + 100 \quad \text{Happy Parabola.}$$

GROUP NAME: Educating the mind

Date: 9/3/14

Student Names (First and Last)

Speaker/Presenter: Lissa Zamboni

Writer/Prep: Cassie Svecz

Leader/Collaborator: Monique Peasley

Independent Variable (x-axis): age

Dependant Variable (y-axis): hours

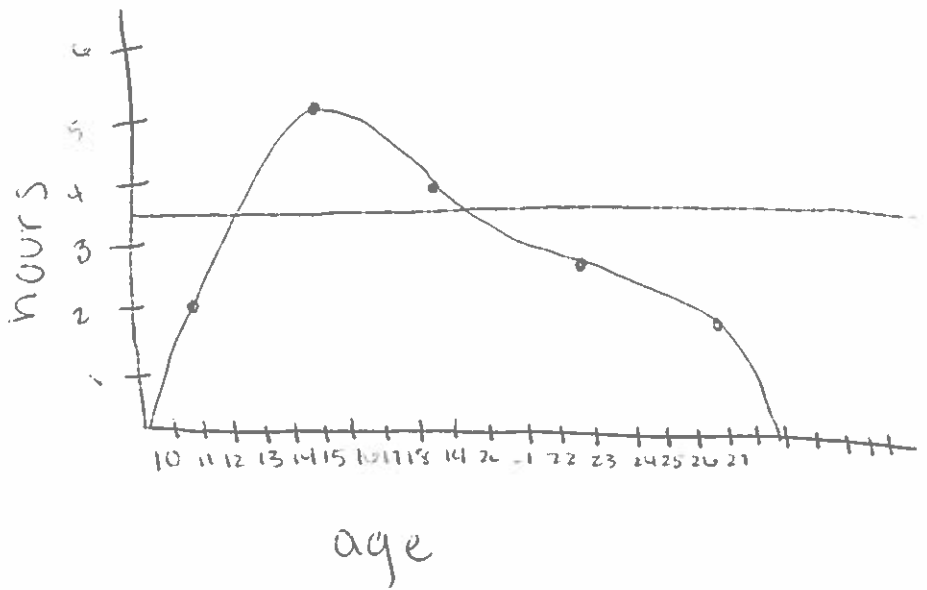
Conclusion (in words): I expect with quadric regression that at both ages of 20.63... and 12.25... years old they will spend 3.5 hours on social media

Supporting Work:

$$-6.510...x^4 + 0.546...x^3 + -1.696...x^2 + 22.77...x + -106.47...$$

$y = 3.5$ hours $x = 21.18...$ years old
 $x = 12.66...$ years old

$L_1(x)$	$L_2(y)$
11	2
15	5
19	4
23	3
27	2



GROUP NAME: Educating the mind

Date: 9/3/14

Student Names (First and Last)

Speaker/Presenter: Vivian Medina

Independent Variable (x-axis): age

Writer/Prep: Mackenzie Maurer

Dependent Variable (y-axis): hours on social media

Leader/Collaborator: Monique Beasley

Conclusion (in words): I expect with cubic regression that at the ages 12.66... and 21.18... years old they will spend 3.5 hours on social media

Supporting Work: Cubic

L1	L2(y)
11	2
15	5
19	4
23	3
27	2

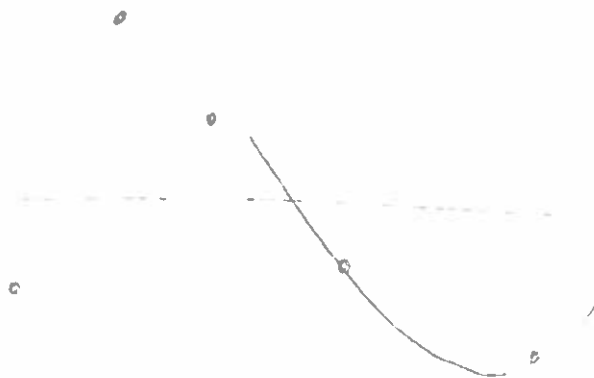
$$y = 0.005x^3 + 0.002x^2 - 0.001x + 37.94...$$

$$y = 3.5$$

$$x = 12.66 \text{ years}$$

$$x = 21.18 \text{ year}$$

hours on social media



ages

Christian Fajardo

GROUP NAME:

Odell

Student Names (First and Last)

Date: 7-1-11

Speaker/Presenter: Moss

Independent Variable (x-axis): time in years

Writer/Prep: Christian

Dependant Variable (y-axis): units sold

Leader/Collaborator: _____

Conclusion (in words): *I expect from the linear regression that a CoD game 6.5 will make \$22,380,000.*

Supporting Work:



Oddball

GROUP NAME:

Date: 9/3/11

Student Names (First and Last)

Speaker/Presenter: XXXX

Independent Variable (x-axis): 5 min

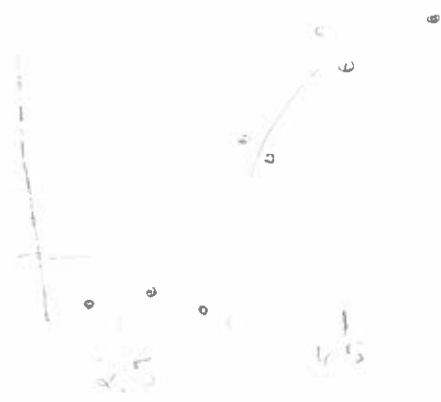
Writer/Prep: XXXX

Dependant Variable (y-axis): Games Sold

Leader/Collaborator: _____

Conclusion (in words): *Using the data from the program, we found that the program was successful in selling 65,000 games.*

Supporting Work:



GROUP NAME:

Student Names (First and Last)

Date: 9/3/14

Speaker/Presenter: Khalid

Independent Variable (x-axis): Age

Writer/Prep: Chelsea + Vagish

Dependant Variable (y-axis): # out of 100 liking "Get Lucky"

Leader/Collaborator: Lian

Conclusion (in words): I ~~enter~~ the graph below, ~~that~~ at the age 9.5, 50/100 kids will like Daft Punk's "Get Lucky" as seen with Cubic regression.

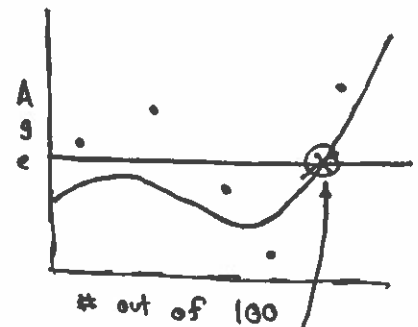
Supporting Work:

L_1	L_2
5	50
6	19
7	60
8	32
9	11
10	87

Plot 1

$$y_1 = 3.203703703703x^3 + (-66.940476190461x)^2 + 451.18915343904x + (-942.07936507909)$$

$$y_2 = 50$$



Using Cubic regression, we found that at age 9.54787234, a exactly (by estimate) 50 out of 100 kids at the age group "9" will like Daft Punk's, "Get Lucky"

interviewed



GROUP NAME:

White coats

Student Names (First and Last)

Date: 7/3

Speaker/Presenter: Khair

Independent Variable (x-axis): age

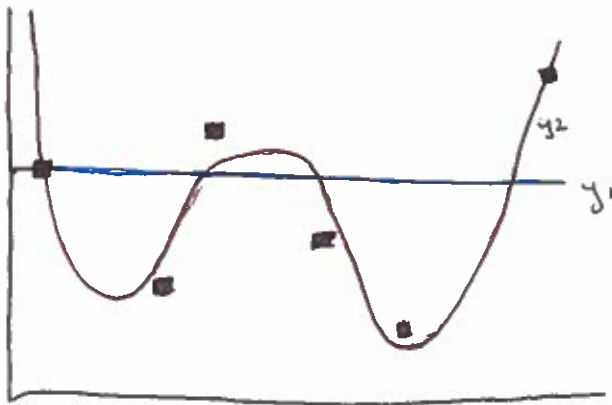
Writer/Prep: Chelsea Vagish

Dependant Variable (y-axis): # of people who live get lucky

Leader/Collaborator: Liam

Conclusion (in words):

Supporting Work: Using a quartic regression, when someone is 76 yrs old 50 out of 100 people will live the song "get lucky"



$$y_1 = 50$$

$$y_2 = 4.8750000000082x^4 + -143.04629629655x^3 + 1545.2916666697x^2 + -7279.167989431x + 12046.634928658$$

GROUP NAME: The struggle

Student Names (First and Last)

Date: Sept 3, 2014

Speaker/Presenter: Cynthia

Independent Variable (x-axis): years

Writer/Prep: Alyssa

Dependant Variable (y-axis): CASES OF L.D.

Leader/Collaborator: Adam

Conclusion (in words):

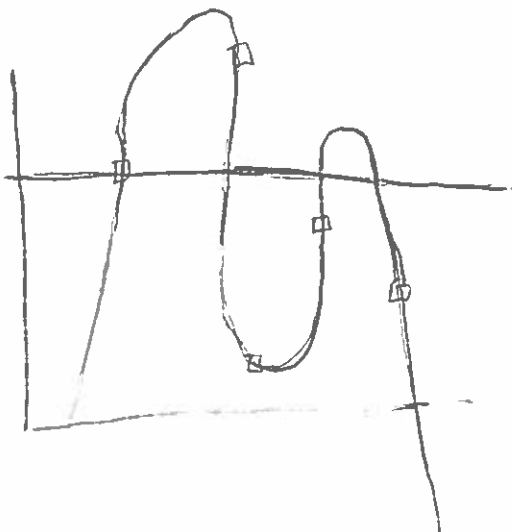
There are 35,000 cases of L.D. in the year of 2011 using a quartic regression

Supporting Work:

$$y = ax^4 + bx^3 + cx^2 + dx + e$$

$$y = -1.7208...x^4 + 69.225x^3 + -1036.521...x^2 + 6843.925x + -16771$$

L1	L2
8	35.1
9	38.0
10	29.1
11	33.9
12	31.4



GROUP NAME: The Struggle

Date: 9/3/14

Student Names (First and Last)

Speaker/Presenter: Adam Haines

Writer/Prep: Noah Ouslander

Independent Variable (x-axis): Years

Dependant Variable (y-axis): Cases of L.D.

Leader/Collaborator: Adam Haines

Conclusion (in words):

35,000 cases of Lyme Disease occurred in the year 2009 when using a cubic regression.

Supporting Work:

$$y = -375x^3 - 11.157x^2 + 108.218x - 307.99$$

x	y
8	35.1
9	38.0
10	27.9
11	33.1
12	31.4

