Implement exceptions and exceptional handling Aim: To implement exceptions and exceptional landling in python. Algorithm: 1) Start the program. 2) initializes a list of grades (e.g (85,90,78,92,88]) 3) Prompts the user to entex the index of the grade they with tower 4) Attempts to displaythegrade at the specified index.

5) it the index is out of range realthes the indexessor and. Prints an error message, "Involid inder Hease enter a valid inder.

- noisboat

# initialize the list of grades. drage? =[82 140 128 145 188]

# Osplay thegrade 1911.

Patrit ("Grades 1871," grades)

# Prompt the over to enter the index of the grade. they want to view. try!

index = int limput l'Enter the index of the grade you

I Attempt to display thegrade at the specified index Posnt (of " The grade of index Eindex & index & is: Egradulindex](")

except index erroy:

# Handle the case where the index is out of range Point ("Invalled index. Please enter availed index.")

Except rape essox:

It Hondle the case where the inputs is not an integer Print l'Exmalia input. please enter a numera--cal index!)

all of the state bus scriptures trisinguit. I want on string output: Enter the nomerator:10. Enter the denominatorion + 51 p 248/11/11/16 ELECAS: Piningon By sono of Not allowed. 1881 SPIBEON 237 201018 -181 storport polation 4 (30/018 (42) 30 pools) ) tolle to xelive of retrient your of tomorg H tot agivor topa ford work shows entities xolorisolt returnity lugar this explin (If it is both one of the show port polyars of toporoun the 8 22 M X 3 ANT 1 9 300 morto tinto rate out overfor some out of brotheter production rather surely report 13 months Conso septiments

Deplew d.s han one genelobyed a bathen calculator brodien that beforms posts outstellage oberetten? . also the less texthonolities is to divide two number entered. by the viet. Algorithm.

1. stort the Fregram 2. Prompts the user to enter two numbers: anometator and advantable

3. Attempts to divide the numerator by the denominator.

u. It the denominator issess, cather the sew division error and displays an expor mexicoge: "error : Buiston

by zero & not allowed.

# torchan to perform division det divide-numberal); try:

# Prompt the uses to enter the none rator. numerator = float (input ("inter the numerator:"))

# from pt the usen to enter the denominator: "))

# Attempt to perform division result = monorary denominator

Part (f" Result: Eresults")

except sen division enos:

# Handledprisson by seno exter.

Print (, bush Dinizion pr sem & vot allarge; )

exept volle error:

# Handle invalid input that is not a number.

Print ("terros: please enter valid numbers.")

at call the function to execute the division operation

divide-nomber()

Droplew d.3: hor one polytierd a batton abbyggigu to determine Pta person is eligible to vote bud on their lange. According to the rules, only. Brainianal who one 18 heard or offer one allowed to vote. Algorithm?

- 1. Define the custom exception.
- 2. Prompt the used for input.
- 3. check if the age is below 18
- u. Raise on exception if the condition is met.
- 5. Handle the exception with a coulow exprinering.

Dodsow;

It define python user - defined exceptions

class frualid age exception (exception);

" paized when the input value is less than 18"

pass.

# you need to guess this number 120 Vaupos =18.

tsg: Lednow = in + (input (, tubir a nouped: ))

Pt input - num < number:

raise invalid Age exception.

ele: " (" Eligible to vote")

Except grouped age exception.

Print ("+xception occurred: Invalidage")

Result: Thus the program toppingstement excepting and exceptional handling lightweet and. vorified successfully. REORMANCE (5) SULTAND ANALYSIS (5)