

Name: \_\_\_\_\_ Period: \_\_\_\_\_

## ACTIVITY:

### WEXLER'S SEARCH FOR THE HUNTINGTON'S GENE

The year was 1979, and Congress has just issued you the funding to study Huntington's disease- a disorder afflicting more than 50,000 Americans. Very little was known about the inheritance of Huntington's, but Dr. Nancy Wexler (whose mother died of it) knew about the incredibly high rate of the disease around a place called Lake Maracaibo, Venezuela. Here, you'll be a part of a team sent to Lake Maracaibo to study a large family (of more than 5,000 member!), and report your findings!

The family spans five generations. It is your job (as it was hers) to pedigree the family and see what's going on here!

Below is a fax that has arrived from Lake Maracaibo...

Dear scientists,

What follows are the results of our interviews with 38 members of the Gonzales family. See what you can make of it.

Sincerely,  
The Team

#### Generation V:

Luis, son of Zelda and Ramon. AFFLICTED

#### Generation IV:

Ramon, son of Ricardo and Lydia. AFFLICTED  
Zelda, married to Ramon. HEALTHY  
Felipe, brother of Ramon. AFFLICTED  
Juan, son of Miguel and Letty. AFFLICTED  
Cira, daughter of Miguel and Letty. HEALTHY  
Roberto, son of Miguel and Letty. HEALTHY  
Nora, daughter of Jesus and Margarita, AFFLICTED  
Alejandro, son of Pedro and Beatriz. AFFLICTED  
Delia, daughter of Dano and Andrea. AFFLICTED  
Tio, son of Dano and Andrea. AFFLICTED  
Maria, daughter of David and Guadalupe. AFFLICTED  
Nariza, daughter of David and Guadalupe. AFFLICTED

#### Generation III:

Lydia, daughter of Carlos and Imelda. AFFLICTED  
Ricardo, married to Lydia. HEALTHY  
Helga, daughter of Carlos and Imelda. HEALTHY  
Letty, daughter of Carlos and Imelda. AFFLICTED  
Miguel, married to Letty. HEALTHY  
Margarita, daughter of Carlos and Imelda. AFFLICTED

Jesus, married to Margarita. HEALTHY  
Beatriz, daughter of Carlos and Imelda. AFFLICTED  
Pedro, married to Beatriz. HEALTHY  
Juanita, daughter Javier and Bonita. AFFLICTED  
Benito, son of Javier and Bonita. HEALTHY  
Dano, son of Chito and Chelita. AFFLICTED  
Andrea, wife of Dano. HEALTHY  
David, son of Chito and Chelita. AFFLICTED  
Guadalupe, wife of David. HEALTHY  
Horatio, son of Chito and Chelita. HEALTHY  
Lucio, son of Chito and Chelita. HEALTHY

## **Generation II:**

Imelda, daughter of Rigo and Esmerelda. AFFLICTED  
Carlos, married to Imelda. HEALTHY  
Javier, son of Rigo and Esmerelda. AFFLICTED  
Bonita, married to Javier. HEALTHY  
Chito, son of Rigo and Esmerelda. AFFLICTED  
Chelita, married to Chito. HEALTHY

## **Generation I:**

Rigo. AFFLICTED  
Esmerelda. HEALTHY