

## Deal or No Deal

## **Activity Directions**

Adapted from The Economics Network

Each student is given an envelope, inside which is written a sum of money. The sums range from \$1 to \$ 250,000. It is anonymous as to which envelopes contain which sums of money- the 22 sums of money are:

Deal or No Deal Sum Amounts	
\$1.00	\$3,000.00
\$10.00	\$5,000.00
\$25.00	\$10,000.00
\$50.00	\$15,000.00
\$75.00	\$20,000
\$100.00	\$35,000.00
\$250.00	\$50,000.00
\$500.00	\$75,000.00
\$750.00	\$100,000.00
\$1,000.00	\$250,000.00

One student is selected at random and comes out the front with his/her envelope. The student then selects one other student at a time. Each time the selected student opens his/her envelope and reveals the sum of money written on the slip inside. A board or paper displaying the available amounts will show available amounts as they are being

<sup>\*\*</sup>If there are fewer than 22 students in the group, then fewer envelopes need to be made up.



eliminated each round. The students can thus easily see which sums of money have been eliminated and which remain.

Every third round, the coordinator, playing the role of the Budgeting Buddy banker, makes the student at the front an offer for their envelope. The students aren't told the basis of the offer, but the Excel file is set up to show both the mean and various fractions of the mean of the remaining numbers. The offer can be adjusted according to the perceived risk attitude of the student: the higher the degree of risk aversion, the lower the percentage of the mean should be offered. Also a lower percentage can be chosen, the greater the spread of remaining numbers.

When made an offer, the student had to decide whether to accept the offer or not: in other words, to say "Deal" or "No Deal". If the decision is "No Deal", the game continues for a further three rounds, when a further banker's offer is made. This process continues as long as the student's decision is "No Deal" until there are just two envelopes left: the student's and one other. The student will be made one last offer and asked whether or not they want to deal. If the answer is still "No Deal" the student should then open their own envelope to see what they have won.

A simple prize could be given to the student, such candy: e.g. one piece of candy per \$10,000 or fraction thereof, or one per \$50,000, depending on how generous you are!

If at any stage the student selects "Deal", the prize can be awarded at that point, depending on the size of the banker's offer. The student can continue selecting students to open their envelopes and Budgeting Buddy banker's offers can be made until just the student's own envelope remains and it is opened. This can then be compared with the deal the student accepted to see whether or not it was a good move to have dealt rather than continued.



## Lesson Four Activity Discussion: Deal or No Deal

What causes you to choose "Deal or "No Deal?"
Assuming that the Budgeting Buddy banker wanted to decrease the payout, on what basis would you choose the offer?
How should the basis of the offer be adjusted according to the risk attitude of the contestants?
How should to besis of the offer be adjusted according to the remaining numbers yet to be eliminated?