Sample Mean and the Sample Error for the Mean (a.k.a. SEM)

the mean	the	between	means (that you
would obtain if y	ou took	from th	ne population.)

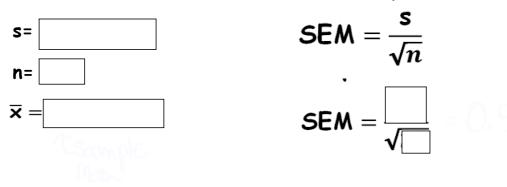
•	The standard error of the mean the variability	the variability			
	whereas the standard deviation the variability				
	within a sample.				
	SEM = s = s = s				
	n =				

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If the standard error of	the mea	n is	, or	close to	, tł	nen
the sample mean is	to be a			of the		
population .						

It is also importa	nt to note that the standard er	ror of the
mean will	when the standard deviation	and
the sample size	•	

The manager of a car dealership would like to determine the average years of ownership for a new vehicle. He found that a sample of 25 customers who bought new vehicles owned that vehicle for 7.8 years, with a standard deviation of 2.5 years. What is the standard error for this sample mean?



The true mean is years to the left and years to the right of the sample mean.