Extra Credit Assignment 8

Due Friday, April 9, 11:59 PM

Using the definition of limits, prove the addition law. That is, assume that

$$\lim_{x \to a} f(x) = L$$
 and $\lim_{x \to a} g(x) = M$.

Prove to me that

$$\lim_{x \to a} (f(x) + g(x)) = L + M.$$